

Extent of Implementation of Health Protocols among Elementary Schools in Surigao City

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Abstract— This study aimed to identify the extent of implementation of health protocols in the elementary schools as perceived by the internal and external stakeholders on the implementation of the health protocols in terms of practices, policies and guidelines in managing school operations, physical environment, support mechanism, well-being and protection and home-school coordination. A descriptive research design was used in this study from 281 teachers, non-teaching personnel, parents and 429 stakeholders of Surigao City public elementary schools in the schools division of Surigao City using a modified questionnaire. Data was analyzed using Frequency and Percentage Count, Mean and Standard Deviation, One-way Analysis of Variance (ANOVA) for Independent Samples and One-way Analysis of Variance (ANOVA).

Result revealed that females comprise the majority of the teaching and non-teaching staff. The majority of them are between the ages of 21 and 30. The majority of the respondents don't have any co-morbidities and are considered healthy. The implementation of health protocols is highly implemented in terms of practices, policies and guidelines in managing school operations, physical environment, support mechanisms, well-being and protection and home-school coordination. There was no statistically significant difference found in the extent of implementation of health protocols in the elementary schools in Surigao City as to sex and type of school of the internal stakeholders. But it was found statistically significant in the respondents' age in terms of practices, policies, and guidelines in managing school operations; physical environment; support mechanisms; well-being and protection; and home-school coordination.

Thus, the schools may continue to implement or enhance their best practices and programs in providing a safe learning environment, strengthening existing school-based policies and programs on the implementation of health protocols.

Keywords— Health Protocols, Extent of Implementation, Correlational, Perceptions.

I. INTRODUCTION

Health protocol is essential in the event of an outbreak or pandemic to protect the community. These protocols are in place for the health, safety and well-being of the community. Everyone is responsible for following health protocol and creating a caring environment where everyone is working to protect one another.

Recently, the COVID-19 pandemic has been affecting everyone's lives, particularly the education sector. It forced the closure of schools across the country, but it did not stop the Department of Education from finding ways to reach out to the learners amidst the crisis. The Basic Education Learning Continuity Plan in the time of COVID-19, according to DepEd Secretary Briones, is the response of the Department to the challenges posed by COVID-19 in the field of education.

The Department of Education expounds comprehensively on D.O. No. 14, s. 2020, the Guidelines on the Required Health Standards in Basic Education and Schools include mandatory adherence to health protocols like wearing face masks and face shields, washing hands with soap and water, 70% ethyl alcohol, social distancing, work-from-home arrangements, and others. Tripathi et al. (2020) agreed that wearing face masks, hand hygiene, and social distancing are the most common preventive measures for COVID-19.

Stemming from Inter-Agency Task Force Resolutions, local government units have also issued corresponding orders to reiterate and localize ordinances and sanctions, in case violations thereof shall arise. Indeed, the schools in Surigao City have followed the safety protocols by virtue of the department orders issued in response to the COVID-19 pandemic. However, the matter that this study aims to uncover and establish through the scientific method is the extent of the implementation of such health protocols.

The researcher believes that if the COVID-19 health protocols are implemented well and their implementation sustained, the schools in Surigao City will effectively mitigate, or even stop, the spread of COVID-19. The schools will be prepared for the resumption of face-to-face classes.

Conceptual Framework

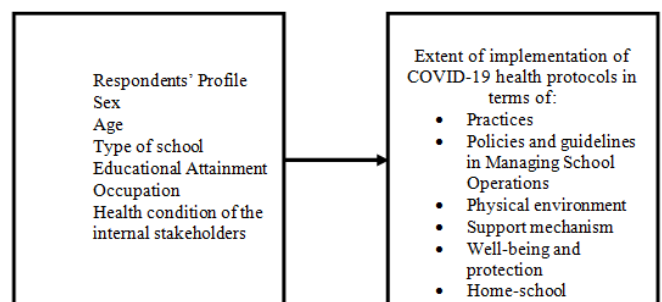


Fig. 1. Research Paradigm

Statement of the Problem

This study aimed to determine the extent of implementation of health protocols among elementary schools in Surigao City.

Specifically, the researcher intended to answer the following questions:

1. What is the profile of the respondents in terms of:
 - 1.1 Internal stakeholders (teaching and non-teaching personnel)
 - 1.1.1 sex;
 - 1.1.2 age;

- 1.1.3 type of school;
- 1.1.4 health condition?
- 1.2 External stakeholders (parents and other stakeholders)
 - 1.2.1 sex;
 - 1.2.2 age;
 - 1.2.3 educational attainment;
 - 1.2.4 occupation;
 - 1.2.5 health condition?
- 2. What is the extent of implementation of health protocols in terms of:
 - 2.1 practices;
 - 2.2 policies and guidelines in managing school operations;
 - 2.3 physical environment;
 - 2.4 support mechanism;
 - 2.5 well-being and protection; and
 - 2.6 home-school coordination?
- 3. Is there a significant difference in the extent of implementation of health protocols when grouped based on the profile variables displayed in question number 1?
- 4. Is there a significant difference in the perceived extent of implementation of health protocols between the two groups of respondents?

II. MATERIALS AND METHODS

Research Design

This study utilized a quantitative research design, specifically the descriptive survey method of research using a survey instrument. A random sampling method was used to select the respondents to better collate rich information.

Research Environment

This study was conducted in elementary schools in the Surigao City Division. There were 65 elementary schools in the division that were composed of central and non-central schools for each district; for district 1 there are 6 schools, district 2 has 5 schools, district 3 has 4 schools, district 4 has 7 schools, district 5 has 6 schools, district 6 has 7 schools, district 7 has 9 schools, district 8 has 5 schools, district 9 has 7 schools and district 10 has 9 schools.

Research Respondents

The respondents of this study were the teachers, non-teaching personnel, parents and stakeholders of Surigao City public elementary schools. The sample population for teaching and non-teaching personnel was 281 and 429 for parents and stakeholders.

Data Analyses

Frequency and Percent. These were used to summarize the profile of the external and internal stakeholders.

Mean and Standard Deviation. These tools were utilized to the described extent of implementation of health protocols among elementary schools in Surigao City

One-way ANOVA. This tool was used to examine the significant difference in the implementation of health

protocols when grouped based on the profile variables of the respondents.

Independent Samples t-test. This tool was used to determine the significant difference in the perceived extent of implementation of health protocols between the two groups of respondents.

III. RESULTS AND DISCUSSION

On the Profile of the Respondents

Table 1 illustrates the socio-demographic profile of the participants. It can be seen that 42 or 14.9 percent of the participants have an aged between 21-30 years old. 89 or 31.7 percent of them are between 31 – 40 years old, 85 or 30.2 percent of the participants belong to the age between 41 – 50 years old and 65 or 23.1 percent of the profiles of the respondents are above 50 years old.

TABLE 1. Profile of the Respondents

Internal Stakeholders		Frequency	Percent
Sex	Male	23	8.2
	Female	258	91.8
Age	21-30	42	14.9
	31-40	89	31.7
	41-50	85	30.2
	above 50	65	23.1
Type of school	Central	136	48.4
	Non-central	145	51.6
Health condition	With comorbidities	90	32
	No comorbidities	191	68

External Stakeholders		Frequency	Percent
Sex	Male	69	16.1
	Female	360	83.9
Age	17-25	21	4.9
	26-35	182	42.4
	36-45	154	35.9
	46-55	55	12.8
	Above 55	17	4
Highest educational attainment	Elementary graduate	13	3
	High school graduate	90	21
	College graduate	303	70.6
	Post graduate	23	5.4
Health condition	With comorbidities	54	12.6
	No comorbidities	375	87.4
Occupation	Accounting staff	1	0.2
	Accounting staff	3	0.7
	Appraiser	1	0.2
	Architect	1	0.2
	Asst. Supervisor	1	0.2
	Bank employee	1	0.2
	Barista	2	0.5
	Brgy. Health Worker	2	0.5
	Book keeper	1	0.2
	Brgy. Kagawad	1	0.2
	Business	18	4.2
	Cashier	11	2.6
	Clerical aide	1	0.2
	Clerk/ staff	11	2.6
	Computer technician	1	0.2
	Construction worker	1	0.2
	Dept. Supervisor	1	0.2
	Driver	10	2.3
	Electrician	1	0.2
	Encoder	1	0.2

External Stakeholders	Frequency	Percent
Engineer	2	0.5
Fireman	1	0.2
Firewoman	1	0.2
Fish vendor	1	0.2
Government employee	45	10.5
Hotel receptionist	1	0.2
Housewife	154	35.9
Instructor	9	2.1
IT	4	0.9
Labor	1	0.2
Manager	1	0.2
Marketing Profession	1	0.2
Med rep	1	0.2
Medical technologist	1	0.2
Midwife	2	0.5
Nurse	7	1.6
OFW	4	0.9
Online seller	12	2.8
Ore sampler	1	0.2
Phlebotomist	1	0.2
Police	4	0.9
Private employee	22	5.1
Product specialist	1	0.2
Production supervisor	1	0.2
Promodiser	1	0.2
Psychometrician	1	0.2
Radio announcer	1	0.2
Real estate agent	1	0.2
Sales agent	3	0.7
Saleslady	5	1.2
Sanitation inspector	1	0.2
Secretary	2	0.5
Security guard	6	1.4
Self employed	18	4.2
Student	1	0.2
Supervisor	1	0.2
Teacher	29	6.8
Technician	1	0.2
Therapist	1	0.2
Vendor	6	1.4
Virtual Assisstant	1	0.2
Waiter	1	0.2
Welder	1	0.2

Furthermore, with respect to sex there is 23 or 8.2 percent of the participants are male and 258 or 91.8 percent of the total participants are female. With respect to the type of school, there is 136 or 48.4 percent of the participants are from the central school and 145 or 51.6 percent belong to a non-central school. The table also reflects that most of the participants are with no comorbidities, comprising 191 respondents which are 68 percent of the total participants of the teaching and non-teaching personnel.

The table also reflects the socio-demographic profile of the external stakeholders' participants. It can be gleaned that most

of the participants are female with 360 or 83.9 percent of the total external stakeholder participants. The majority of them are within the 26-35 years old age bracket consisting of 182 or 42.4 percent of the total respondents. 303 or 70.6 percent are college graduates and 375 or 87.4 percent of the total external stakeholders are healthy and with no comorbidities. Furthermore, it revealed the different occupations of the external stakeholders. It can be seen that the majority of the participants are housewives with 154 or 35.9 percent of the total external stakeholders' participants. 45 or 10.5 percent are government employees, 29 or 6.9 percent are teachers, 22 or 5.1 percent are private employees and 18 or 4.2 percent are in business or managing their own business.

This study looked at the respondents' profiles to see who were vulnerable and who were following the COVID-19 health procedures that were being implemented in schools.

On the Extent of Implementation of Health Protocols

As observed from the results in table 2, the internal stakeholders perceived that the implementation of health protocols among elementary schools in Surigao City in terms of practices is high with an average rating of 3.83 (SD=0.32). In fact, all the indicators of the practice of health protocols were perceived as highly implemented by the internal stakeholders of the schools. The use of hand sanitizer or/and the alcohol-based solution obtained the greatest mean, 3.89, among the practices, described qualitatively as highly implemented.

Furthermore, the external stakeholders perceived high implementation of health protocols in terms of practices among the elementary schools in Surigao City, as depicted by the overall mean rating of 3.78 (SD=0.37). The use of hand sanitizer or/and alcohol-based solutions also obtained the greatest mean rating from the external stakeholders, 3.83, among the practices, described qualitatively as highly implemented. Results suggest that in the premises of the elementary schools of Surigao City, the use of hand sanitizer/alcohol-based solutions is the most commonly practiced health protocol.

The wearing of facemasks, handwashing and social distancing is especially important in situations like pandemic outbreaks because it interrupts the virus's transmission cycle. Hand hygiene is extremely important since it is quickly contaminated by airborne microbe droplets from coughs and sneezes. According to Jing et al., (2020) most people prefer to use hand sanitizers as they are handy and convenient.

TABLE 2. Extent of Implementation of Health Protocols

Implementation	Indicators	Internal Stakeholder			External Stakeholder		
		Mean	SD	QD	Mean	SD	QD
Practices	1. wear facemask/face shield properly at all times.	3.85	0.38	HI	3.78	0.46	HI
	2. wash my hands with soap and water regularly.	3.8	0.44	HI	3.77	0.48	HI
	3. allow myself for body temperature check upon entry.	3.79	0.47	HI	3.78	0.48	HI
	4. maintain physical/social distancing.	3.8	0.41	HI	3.76	0.49	HI
	5. use hand sanitizer or/and alcohol-based solution.	3.89	0.35	HI	3.83	0.4	HI
	Overall	3.83	0.32	HI	3.78	0.37	HI
policies and guidelines in	1. encourage virtual meetings through any available platforms among teachers, parents, and learners;	3.66	0.56	HI	3.53	0.6	HI

Implementation	Indicators	Internal Stakeholder			External Stakeholder		
		Mean	SD	QD	Mean	SD	QD
managing school operations	2. staggering break times and rotational skeletal work arrangement to limit exposure of school personnel;	3.6	0.55	HI	3.5	0.59	HI
	3. work from home arrangement of the Most-at-Risk Population including the elderly, pregnant women and individuals with underlying comorbidities;	3.67	0.59	HI	3.58	0.61	HI
	4. functional/operational school clinic and guidance office that provides basic health services;	3.55	0.61	HI	3.6	0.59	HI
	5. mobilizes resources and support from community stakeholders to meet the standards of the health and safety protocols.	3.64	0.52	HI	3.62	0.55	HI
	Overall	3.63	0.41	HI	3.57	0.46	HI
physical environment	1. hand washing stations/facility with adequate water and soaps in a strategic location (e.g., school entrance).	3.84	0.36	HI	3.79	0.44	HI
	2. temperature scanner, alcohol-based solutions or hand sanitizers at the entrance and exit of the school and classrooms.	3.83	0.37	HI	3.8	0.44	HI
	3. proper ventilation in all classrooms and offices (open windows and doors are preferred over air conditioning systems).	3.78	0.45	HI	3.74	0.48	HI
	4. set-up clear and easy-to-understand signage, preferably in local languages and mechanisms to strengthen observance of health protocols and protective measures in strategic location.	3.81	0.41	HI	3.72	0.5	HI
	5. signage for one way system in school corridors (entrance and exit).	3.82	0.41	HI	3.78	0.44	HI
Overall	3.82	0.3	HI	3.77	0.37	HI	
support mechanism	1. conducts webinars for protection and promotion of the mental health and general welfare of all learners and personnel.	3.56	0.58	HI	3.46	0.61	HI
	2. conducts webinar orientation for parents and learners on health protocols and safety measures.	3.56	0.6	HI	3.49	0.63	HI
	3. supports the health promotion programs like school-initiated programs to take a break and perform stretching exercises to promote the importance of physical activity on the physical and mental health.	3.57	0.53	HI	3.53	0.58	HI
	4. provides modules related to mental health for the first week of classes of the learners.	3.71	0.49	HI	3.57	0.58	HI
	5. promotes “school-life balance” through proper scheduling of schoolwork that will allow learners to enjoy quality time at home.	3.71	0.47	HI	3.62	0.52	HI
Overall	3.62	0.42	HI	3.53	0.49	HI	
well-being and protection	1. ensures that learners have enough learning material/resources (1:1 ratio of modules, learning activities to learners) to prevent spread of virus.	3.8	0.42	HI	3.69	0.51	HI
	2. ensures that there is enough supply of face masks, face shields, disinfection materials, and/or other COVID-19 materials.	3.69	0.5	HI	3.62	0.56	HI
	3. regularly cleans and disinfects school facilities, furniture, and equipment.	3.77	0.43	HI	3.68	0.54	HI
	4. establishes contact tracing procedures for COVID-19 verified positive cases' close contacts.	3.65	0.57	HI	3.56	0.64	HI
	5. assures that physical or face-to-face mass gatherings, group work, or activities that require close contact or where physical distancing is not possible are prohibited.	3.64	0.52	HI	3.55	0.6	HI
Overall	3.71	0.38	HI	3.62	0.48	HI	
home-school coordination	1. develops a plan in coordinating with the Barangay Local Government Unit (BLGU) or the Barangay Health Emergency Response Team (BHERT) in ensuring that protocols are observed properly.	3.7	0.47	HI	3.57	0.55	HI
	2. develops a strategy in orienting parents on health protocols and safety measures.	3.72	0.48	HI	3.61	0.53	HI
	3. coordinates with the Barangay Local Government Unit (BLGU) or the Barangay Health Emergency Response Team (BHERT) for an information drive through “Bandilyo” to remind the public to refrain from large gathering and parties.	3.61	0.55	HI	3.53	0.6	HI
	4. coordinates with the Barangay Local Government Unit (BLGU) or the Barangay Health Emergency Response Team (BHERT) in conducting home visitation and providing health kit to the learners.	3.61	0.55	HI	3.51	0.62	HI
	5. identifies a designated waiting area with proper ventilation for parents/guardians.	3.68	0.52	HI	3.59	0.58	HI
Overall	3.66	0.44	HI	3.56	0.52	HI	

Legend: 1-1.75 – Not implemented (NI); 1.76-2.5 – Less implemented (LI); 2.51-3.25 – Implemented (I); 3.26-4 – Highly implemented (HI)

The internal stakeholders perceived the policies and guidelines in managing school operations to be highly implemented, with an overall mean rating of 3.63 (SD=0.41). Among its indicators, work-from-home arrangements for the most-at-risk population including the elderly, pregnant women, and individuals with underlying comorbidities,

obtained the highest mean rating from the internal stakeholders, 3.67, described qualitatively as highly implemented. Indeed, it is very common for every school to arrange for their personnel, both teaching and nonteaching, to work from home if they have comorbidities or are at high risk of infection.

With regards to the perception of the external stakeholders, results showed that they perceived as highly implemented the health protocols as to policies and guidelines in managing school operations with the overall mean rating of 3.57 (SD=0.46). Moreover, their highest rating of implementation is on the indicator which states that they mobilize resources and support from community stakeholders to meet the standards of the health and safety protocols (mean=3.62, SD=0.55).

It is important that the school effectively handles school operations and implements policies and guidelines to ensure that everything runs smoothly. A policy like working from home, according to Okuyan and Begen (2021), is one of the most adaptable measures during the COVID-19 pandemic. It provided a great level of flexibility and opportunity during a pandemic for those who are able to do so. Furthermore, it also helps to reduce the spread of the disease by keeping most people at home.

Both internal and external stakeholders perceived the physical environment as highly implemented, with an overall mean rating of 3.82 (SD=0.30) for internal stakeholders, while the external stakeholder obtained a rating of 3.77 (SD= 0.37). Among its indicators, hand washing stations/facilities with adequate water and soap in a strategic location (e.g., school entrance) obtained the highest mean rating from the internal stakeholders, 3.84, described qualitatively as highly implemented. With regards to the perception of the external stakeholders, results showed that they perceived as highly implemented the temperature scanner, alcohol-based solutions, or hand sanitizers at the entrance and exit of the school and classrooms, with an overall mean rating of 3.80 (SD=0.44).

The physical arrangement of the school in the event of a pandemic is very necessary since all safety measures should be implemented to prevent the transmission of the virus inside the school premise. Escoghene and Ujiro (2013) emphasized the importance of handwashing facilities in preventing communicable diseases and that they should be a major priority in schools.

Both internal and external stakeholders perceived that the support mechanism was highly implemented, with an overall mean rating of 3.62 (SD=0.42) for internal stakeholder while the external stakeholder obtained a rating of 3.53 (SD= 0.49). Among its indicators, providing modules related to mental health for the first week of classes of the learners and promoting "school-life balance" through proper scheduling of schoolwork that will allow learners to enjoy quality time at home obtained the highest mean rating from the internal stakeholders, 3.71, described qualitatively as highly implemented. With regards to the perception of the external stakeholders, results showed that they perceived as highly implemented the balance through proper scheduling of schoolwork that will allow learners to enjoy quality time at home with the overall mean rating of 3.62 (SD=0.52)

In the event of a pandemic, the school ensures psychosocial support to learners and teachers, especially those who are positive, under isolation/quarantine, and classified as

suspect and probable. Barlett et al., (2020) stated that adults can also provide options for safe activities (e.g., outside play, blocks, modelling clay, art, music, games) and engage children in brainstorming other creative ideas. Children need ample time to engage in play and other joyful activities or learning experiences without worrying or talking about the pandemic.

Results showed that both internal and external stakeholders perceived that well-being and protection were highly implemented with an overall mean rating of 3.71 (SD=0.38) for the internal stakeholder, while the external stakeholder obtained an overall rating of 3.80 (SD= 0.42). Among its indicators, ensuring that learners have enough learning materials/resources (1:1 ratio of modules and learning activities to learners) to prevent the spread of the virus obtained the highest mean rating from the internal stakeholders, 3.71, described qualitatively as highly implemented. With regards to the perception of the external stakeholders, results showed that they were perceived as highly implemented to ensure that learners have enough learning material/resources (1:1 ratio of modules, learning activities to learners) to prevent the spread of the virus with an overall mean rating of 3.69 (SD=0.51).

The school makes sure that the mental health and protection of the teachers and learners are taken care of and encourages them to participate in activities that will help them deal more readily.

The results also revealed that both internal and external stakeholders perceived that the home-school coordination was highly implemented with an overall mean rating of 3.66 (SD=0.44) for internal stakeholder, while the external stakeholder obtained an overall rating of 3.56 (SD= 0.52). Among its indicators, developing a strategy for orienting parents on health protocols and safety measures obtained the highest mean rating from the internal stakeholders, 3.72, described qualitatively as highly implemented. With regards to the perception of the external stakeholders, results showed that they perceived as highly implemented the development of a strategy in orienting parents on health protocols and safety measures with an overall mean rating of 3.61 (SD=0.53).

The roles of parents and teachers are very important for the welfare of the learners. In fact, home-school coordination is the most effective strategy where parents and school personnel work together to implement interventions utilizing a two-way exchange of information and those involving communication between school and home (Cox, 2005).

On the Significant Difference in the Extent of Implementation of Health Protocols based on the Profile of the Respondents

As observed in the next table, when internal stakeholders were grouped according to their sex as well as the type of schools they were employed in, the calculated probability values, p , across all the factors of the dependent variables were greater than the 0.05 level of significance and hence the null hypothesis cannot be rejected.

TABLE 3. Significant Difference in the Implementation of health protocols when grouped based on the Internal Stakeholders and External Stakeholders Profile

Profile of Internal Stakeholders	Health protocols	F (1, 279)	p	Remark		
Sex	Practices	0.66	0.42	Not significant		
	policies and guidelines in managing school operations	0.54	0.46	Not significant		
	physical environment	3.05	0.08	Not significant		
	support mechanism;	0.76	0.38	Not significant		
	well-being and protection;	0.71	0.4	Not significant		
	home-school coordination	0.77	0.38	Not significant		
Type of school	Practices	0.24	0.62	Not significant		
	policies and guidelines in managing school operations	0.19	0.67	Not significant		
	physical environment	1.68	0.2	Not significant		
	support mechanism;	0.21	0.65	Not significant		
	well-being and protection;	0.25	0.62	Not significant		
	home-school coordination	0.31	0.58	Not significant		
Age		Mean	F (3, 277)	p	Remark	
	21-30	Practices	3.83 ^a	9.46	0.02	Significant
	31-40		3.77 ^b			
	41-50		3.83 ^a			
	above 50		3.89 ^a			
	21-30	policies and guidelines in managing school operations	3.51 ^a	5.55	0	Significant
	31-40		3.56 ^a			
	41-50		3.62 ^b			
	above 50		3.79 ^b			
	21-30	physical environment	3.84 ^a	5.97	0.02	Significant
	31-40		3.77 ^b			
	41-50		3.81 ^a			
	above 50		3.88 ^a			
	21-30	support mechanism;	3.60 ^a	3.27	0.02	Significant
	31-40		3.54 ^a			
	41-50		3.62 ^a			
	above 50		3.75 ^b			
	21-30	well-being and protection	3.67 ^a	3.12	0.03	Significant
	31-40		3.64 ^a			
	41-50		3.71 ^b			
	above 50		3.82 ^b			
	21-30	home-school coordination	3.65 ^a	15.04	0.01	Significant
	31-40		3.60 ^a			
	41-50		3.67 ^a			
above 50		3.75 ^b				

The difference is significant when p-value is less than 0.05 significance level

^{a,b} Letter code for homogeneous grouping in the pairwise comparison (Scheffe's Post hoc test)

This implies that there was no statistically significant difference found in the extent of implementation of health protocols in the elementary schools in Surigao City in terms of practices, policies, and guidelines in managing school operations, physical environment, support mechanisms, well-being and protection, and home-school coordination between male and female internal stakeholders.

In the same way, there was no statistically significant difference found in the extent of implementation of health protocols between the non-central and central elementary schools in Surigao City in terms of practices, policies and guidelines in managing school operations, physical environment, support mechanisms, well-being and protection, and home-school coordination.

The results of the analysis on the significant difference in the implementation of health protocols when grouped based on the internal stakeholders' age were performed using One-way ANOVA. Results revealed that, when internal stakeholders were grouped according to age, their perceived extent of implementation of health protocols among elementary schools of Surigao City statistically significantly varied in terms of practices (F(3, 277)=9.46, p=0.002),

policies and guidelines in managing school operations (F(3, 277)=5.55, p=0.00), physical environment (F(3, 277)=5.97, p=0.02), support mechanism (F(3, 277)=3.27, p = 0.02), well-being and protection (F(3, 277) = 3.12, p=0.03), and home-school coordination (F(3, 277)=15.04, p=0.01). Scheffe Post hoc Test results verified that with regards to the practices of health protocols and physical environment internal stakeholders of age groups 21-30, 41-50, and above 50 tend to perceive the same extent of implementation. However, the said age groups statistically significantly differ from the 31-40 years old group. In fact, the group 31-40 years old significantly perceived a higher extent of implementation of practices of health protocols and physical environment than the groups 21-30, 41-50, and above 50.

Post hoc test also revealed that in the extent of implementation in terms of policies and guidelines in managing school operations as well as in well-being and protection, internal stakeholders of age groups 21-30 and 31-40 tend to have similar perceptions while groups 41-50 and above 50 also tend to have the same perception. However, as depicted by the means, the group 21-40 years old was perceived higher than the group 41 years old and above in the

extent of implementation of health protocols as to policies and guidelines in managing school operations as well as in well-being and protection. Concerning the implementation in terms of support mechanisms and home-school coordination, internal stakeholders of age groups 21-30, 31-40 and 41-50 did not differ significantly in their perceived implementation. On the other hand, the group of age above 50 years old perceived a higher extent of implementation of health protocols in terms of support mechanisms, and home-school coordination than those groups of age 21-50 years old.

The age group of the respondents varied in their perceptions as to the extent of implementation of health protocols. In terms of practices and physical environment, those between the ages of 31 and 40 are thought to be more educated than the others, and they get their knowledge as to the prevention of being infected through social media since they are tech-savvy. Those between the ages of 21 and 40 are thought to be more knowledgeable and are more inclined to use the internet for any information on COVID-19 updates and risks than the other age groups in terms of policies and guidelines for managing school operations, well-being, and protection. Furthermore, the age group over 50 years old perceived higher than the others in terms of support mechanisms and home-school coordination because they are more vulnerable to this illness and more likely to succumb to the COVID-19 disease.

Moore, et al. (2021) stated that younger people were more self-centered, but middle-aged people were more concerned with family. The oldest and most vulnerable people were most anxious about their health. Younger people found it more difficult to find adequate space to self-isolate and manage their mental and physical health; middle-aged people were more concerned about childcare, and elderly people thought they could take sufficient precautions. School closures and reduced social connections have various effects on different age groups.

When internal stakeholders were grouped based on their health condition, there was no significant difference found in their perceived extent of implementation of the health protocols among elementary schools of Surigao City in terms of practices, physical environment, and support mechanism, as depicted by the calculated p - of the health protocols among elementary schools in Surigao City in terms of policies and guidelines in managing school operations ($F(1, 279)=7.835$, $p=0.005$), well-being and protection ($F(1, 279)=5.548$, $p=0.019$), and home -school coordination ($F(1, 279)=4.521$, $p=0.042$) between the group with comorbidities and the group with no comorbidities. As depicted by the mean rating of each group, those with comorbidities were perceived as higher than those with values of 0.279, 0.25, and 0.078, respectively, which are greater than 0.05 level of significance. On the contrary, there was a statistically significant difference in the extent of implementation and no comorbidities in the implementation of the health protocols as to policies and guidelines in managing school operations, well-being and protection, and home-school coordination. This would suggest that the implementation of such health protocols is more

apparent to the internal stakeholders with comorbidities than those with no comorbidities.

Individuals who have comorbidities tend to be more cautious about their health because they are more likely at risk when infected with COVID-19. According to Sanyaolu et al. (2020), there are multiple comorbidities that are associated with the severity of COVID-19 disease progression. Patients with comorbidities have more deteriorating outcomes compared with patients without, and it has been noted that people with underlying chronic illnesses are more likely to contract the virus and become severely ill. Individuals with comorbidities take all necessary precautions to avoid getting infected, as they usually have the worst prognosis.

One-way ANOVA was also performed to investigate the significant difference in the implementation of health protocols among elementary schools in Surigao City when grouped based on the External Stakeholders' profiles. As shown in the results, across all factors compared, the computed p -values are greater than the 0.05 level of significance and hence the null hypothesis cannot be rejected. It follows that there was no statistically significant difference found in the perceived extent of implementation of health protocols among elementary schools in Surigao City in terms of practices, policies and guidelines in managing school operations, physical environment, support mechanisms, well-being and protection, and occupation. Recall that in the descriptive summary of the mean rating of the external stakeholders in all the aforementioned aspects of health protocol, they perceived that all the health protocols were highly implemented among the elementary schools in Surigao City.

On the Significant Difference in the Perceived Extent of Implementation of Health Protocols between Two Group of Respondents

It can be seen in the next table that when it comes to practices as well as policies and guidelines in managing school operations, the p -values are 0.12 and 0.08 respectively, which are greater than the 0.05 level of significance. This indicates that there was no significant difference obtained between the external and the internal stakeholders in their perceived extent of implementation of health protocols in terms of practices, policies, and guidelines in managing school operations.

On the other hand, in terms of the physical environment, support mechanism, well-being and protection, and home-school coordination, since the p -values computed are less than 0.05 level of significance, the null hypothesis is rejected. This implies that there was a significant difference between external and internal stakeholders in their perceived extent of implementation of the health protocols among elementary schools in Surigao City in terms of the physical environment, support mechanism, well-being and protection, and home-school coordination. The groups' mean ratings suggest that the implementation is significantly higher for the internal stakeholders than the external stakeholders.

TABLE 4. Significant difference in the perceived extent of implementation of health protocols between the two groups of Respondents

Health protocols	Group	Mean	t (708)	p	Remark
Practices	External stakeholder	3.78	-1.575	0.12	Not significant
	Internal stakeholder	3.83			
policies and guidelines in managing school operations	External stakeholder	3.57	-1.778	0.08	Not significant
	Internal stakeholder	3.63			
physical environment	External stakeholder	3.77	-2.025	0.04	Significant
	Internal stakeholder	3.82			
support mechanism;	External stakeholder	3.53	-2.567	0.01	Significant
	Internal stakeholder	3.62			
well-being and protection;	External stakeholder	3.62	-2.741	0.01	Significant
	Internal stakeholder	3.71			
home-school coordination	External stakeholder	3.56	-2.701	0.01	Significant
	Internal stakeholder	3.66			

The difference is significant when p-value is less than 0.05 significance level.

The views of internal and external stakeholders in the far flung barangays and in the city differ. Since, the internal stakeholders are considered the frontliners of the schools in providing learning opportunities to learners amidst the pandemic. Therefore, they are more adherent with required health protocols for their own welfare since they are dealing with the stakeholders while they are in school. Sarmiento et al., (2021) reiterate the adherence to school health protocols as significant in following national and international guidelines in mitigating the effects of the COVID-19 pandemic as a public health crisis.

Across the extent of implementation of health protocols in elementary schools of Surigao City Division, it was evident that they were highly implemented. The government, through the Inter-Agency Task Force (IATF) for the Management of Emerging Infectious Diseases, responds to affairs concerning emerging infectious diseases such as COVID-19 in the country. The Deped Order No. 14 s. 2020, guidelines on the required health standards in basic education offices and schools, reiterate the commitment of the department to provide safe educational continuity amidst pandemics and emphasize that the health and safety of the learners, teaching and non-teaching personnel must be protected at all times.

IV. CONCLUSIONS AND RECCOMENDATIONS

Findings

1. Females comprise the majority of the teaching and non-teaching staff. The majority of them are between the ages of 21 and 30. Furthermore, the parents and other stakeholders are largely females, ranging in age from 26 to 35. The majority of them are housewives and college graduates. The majority of the respondents don't have any comorbidities and are considered healthy.
2. The implementation of health protocols is highly implemented in terms of practices, policies and guidelines in managing school operations, physical environment, support mechanisms, well-being and protection and home-school coordination.
3. There was no statistically significant difference found in the extent of implementation of health protocols in the elementary schools in Surigao City as to sex and type of school of the internal stakeholders. But it was found statistically significant in the respondents' age in terms of practices, policies, and guidelines in managing school

operations; physical environment; support mechanisms; well-being and protection; and home-school coordination. It was also statistically significant in the health condition in terms of policies and guidelines in managing school operations, well-being and protection, and home-school coordination. Furthermore, there was no significant difference in the extent of implementation of health protocols when grouped based on the profile of the external stakeholders.

4. Statistically, there was no significant difference in the perceived extent of implementation of health protocols between the internal and external stakeholders of elementary schools in Surigao City in terms of practices, policies and guidelines in managing school operations. On contrary, it was found statistically significant in terms of physical environment, support mechanisms, well-being and protection, and home-school coordination and the perceived extent of implementation between internal and external stakeholders.

Conclusions

Based on the findings of the study, the following conclusions were drawn:

1. The public elementary schools in Surigao City division have been relentless in the implementation of health protocol by providing the needed safety learning facilities, managing well school operations, and conducting educational activities to reduce and mitigate COVID-19. Regardless of the internal and external stakeholders' profile, both have been extensively implemented in terms of practices, managing school operations, physical environment, well-being and protection, and home-coordination.
2. The age group of teaching and non-teaching personnel (internal stakeholders) varied in their perceptions as to the extent of implementation of health protocols. In terms of practices, physical environment, policies and guidelines in managing school operations, well-being and protection, those between the ages of 21 and 40 are thought to be more knowledgeable and well informed on COVID-19 updates and risks than the other age groups. The over-50s and those with co morbidities perceived to be higher than the others since they are vulnerable and tend to be more cautious about their health because they are more likely to

contract the virus and become severely ill when infected with COVID-19.

- Both internal and external stakeholders are responsive to the practices, policies, and guidelines for health protocols since the pandemic outbreak brought an alarm to their lives. They have different outlooks on responding in terms of physical environment, support mechanism, well-being and protection, home-school coordination because the perceptions of the stakeholders in far flung barangays and in city varies. Those residents in far flung barangays were less likely to engage preventive practices and had a negative view toward their effectiveness. Information appraisal is an important factor that contributes to their differences in preventive behaviors against COVID-19 through their attitudes and perceptions.

Recommendations

In view of the findings and conclusions of the study, the following recommendations were given:

- The schools may continue to implement or enhance their best practices and programs in providing a safe learning environment, strengthening existing school-based policies and programs on the implementation of health protocols.
- School administrators must continue to involve teachers and encourage stakeholders' participation, including the PTA officials, in the implementation of the health protocols programs.
- Lessons and competencies in the curriculum related to safety and health protocols must be integrated across grade levels with emphasis on their relationship to COVID-19 to ensure that students learn, practice and sustain the fundamental concepts of safety and health protocols in response to said virus and other future concerns of the same kind.
- Schools must sustain the active implementation of safety and health protocols that are being implemented in schools today in preparation for the resumption of full face-to-face classes and in anticipation for health issues of the same kind in the future.

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