Harnessing Island Learning Institutions' School Administrators' Management Endeavors: The Surigao Del Norte Tri-Division Experience

Raxiey G. Adolfo

ORCID #0009-0006-1054-6762

raxiey.adolfo@carsu.edu.ph

Student, Graduate School and Professional Studies, Caraga State University

ABSTRACT:

Island school administrators face unique challenges requiring innovative leadership approaches to achieve quality education amidst resource constraints, logistical hurdles, and volatile weather conditions. This study aimed to assess the institutional and management challenges, and performance of school administrators in the tri-divisions of Surigao del Norte: Surigao City, Surigao del Norte, and Siargao Islands. Specifically, it sought to identify the relationship between the administrators' demographic profiles and their management challenges and to propose a leadership training program tailored for island learning institution administrators. The study utilized a descriptive-correlational research design. Data were gathered from 35 school administrators across the tri-divisions using a structured questionnaire and were analyzed using descriptive statistics, analysis of variance, and regression analysis. Results revealed that logistical barriers, financial resource constraints, and communication challenges significantly impact the administrators' effectiveness. Notable best practices included strong community engagement and innovative problem-solving strategies. The findings showed a positive correlation between administrators' demographic profiles and their ability to navigate institutional challenges, with tenure and educational attainment contributing significantly to management performance. Based on the findings, an Island Learning Institutions' Leadership Program was proposed, focusing on adaptive management strategies, capacity-building initiatives, and enhanced resource mobilization. These recommendations aim to address the identified challenges and improve the administrators' effectiveness in providing quality education in remote areas.

Keywords: Adaptive Management, Education in Remote Areas, Management Performance, Island Learning Institutions, Leadership Challenges, School Administrators, Tri-Division.

1. INTRODUCTION

School administrators are the linchpins of daily operations in learning institutions, bearing ultimate responsibility for academic excellence by aligning programs with DepEd standards to ensure quality education (Leithwood & Louis, 2012). They supervise faculty and staff to foster optimal learning environments, manage and allocate MOOE funds to support instructional needs, and establish safe, secure campuses. Moreover, they cultivate strong community ties by involving parents, local leaders, and stakeholders—an essential duty highlighted by Suson et al. (2019) and Whang (2021), who note that principals' roles extend across human and financial resource management, educational programming, external relations, and stakeholder well-being. These multifaceted obligations underscore the complexity of school leadership, particularly for those new to the role or stationed in small island learning institutions with limited resources.

Beyond day-to-day management, school heads must develop and enact a strategic vision encompassing long-term planning, curriculum development, and responsiveness to emerging educational trends and technologies (Hallinger, 2018). In geographically isolated and disadvantaged areas (GIDA), such as the island barangays of Surigao del Norte, this strategic approach is critical for preparing students to meet future challenges despite infrastructure and capacity constraints (Day et al., 2016; DepEd, 2020). Surigao del Norte is administratively divided into three DepEd divisions—Surigao City (87 schools across 10 districts), Surigao del Norte mainland (193 schools across 13 districts), and Siargao Islands (36 schools across 12 districts) (Official Gazette, Province of Surigao del Norte; DepEd Division of Surigao City; DepEd Surigao del Norte Division; DepEd Siargao Islands Division). Each shares the common challenge of island-based schooling, where transportation, connectivity, and resource allocation complicate leadership and instructional delivery.

Focusing on the Tri-Division framework allows this study to capture both shared and unique leadership capacities across Surigao del Norte's mainland and island schools, identifying patterns and best practices that can be generalized to similar GIDA contexts. By investigating administrators' experiences across the three divisions, the research aims to illuminate the specific needs and innovative solutions of island learning institutions, ultimately offering practical guidance and professional development mechanisms to empower current and future school heads in their day-to-day operations and strategic planning.

1.1 Review of Related Literature

Island learning institution administrators face a multiplicity of roles compounded by severe resource constraints, making sustainable development goals like quality education and reliable school transport especially elusive in rural settings (Tengecha et al., 2024). With skeletal staffing, rural leaders juggle classroom teaching, instructional leadership, managerial duties, and maintenance tasks, often stepping in to cover instructional observations and curriculum improvements themselves (Preston, Jakubiec, & Kooymans, 2013). These tensions intensify when serving as change agents who must balance top-down mandates—such as college-and-career readiness standards—with deeply rooted local expectations that can fracture along class, race, and political lines (Preston & Barnes, 2017; Howley & Howley, 2010; McHenry-Sorber, 2014). The pandemic further exposed the fragility of one-size-fits-all pedagogies, as

schools scrambled to adopt hybrid and remote models, revealing stark inequities in access to technology and compelling administrators to innovate toward more inclusive instructional strategies (Lockee, 2021; Reuge et al., 2021; Child & Song, 2023).

Compounding these challenges, multi-grade teaching—where a single teacher handles different subjects and grade levels in one classroom—places immense planning and assessment burdens on educators, who may resort to abridged curricula with minimal contextualization (Aziz, 2011; Eppley, 2009; Taylor & Mulhall, 2001). Supervision frameworks aim to set clear expectations and drive schools to use feedback for self-evaluation and targeted improvements, yet rural administrators often lack the support and capacity to translate these mechanisms into practice (Ehren et al., 2013). On the ground, difficult terrain and improvised transport—"banka," "habal-habal," even horses or carabao—threaten both safety and morale (Barcena, 2018), while emotional health strains and professional isolation exacerbate the stress of leadership (Rotas & Cahapay, 2020; Buetel et al., 2011). Despite these hardships, passionate leaders—and sometimes teachers sacrificing personal resources—persevere to sustain learning and foster resilience in their communities (Fox, 2019; Castigador, 2019; Quejada & Orale, 2018; Bilbao, 2012).

Financial and community partnership challenges add another layer of complexity: rural districts often receive supplemental funding that poorly matches actual needs, leaving administrators to navigate funding shortfalls for transportation, infrastructure, and staffing (Sipple & Brent, 2015; Baker & Duncombe, 2014; Malhoit, 2015; Strange, 2019). Effective boundary-spanning leadership and homegrown school-community partnerships can mitigate these gaps by leveraging social capital, local trust, and diverse stakeholder engagement (Miller, 2008; Bauch, 2001; Jennings, 1999; Preston & Barnes, 2017). Yet forging these alliances demands sophisticated negotiation, cultural responsiveness, and flexibility to unite fragmented community interests around shared educational goals (Harmon & Schafft, 2009; Schafft, 2016; Lawson, 2013; Zuckerman, 2019). Ultimately, the resilience of island learning institutions hinges on leaders' ability to blend visionary strategy with grassroots collaboration, turning adversity into opportunities for sustainable, community-centered education.

1.2 Framework of the Study

The theoretical framework for this study integrates Fiedler's Contingency Management Theory and Burns's Transformational Leadership Theory to examine how school administrators in island learning institutions adapt their leadership practices to diverse and changing circumstances. Contingency Management Theory posits that effective leadership hinges on the fit between a leader's traits and situational demands, requiring flexibility and adaptability in response to varying organizational challenges (Shala et al., 2021). Complementing this, Transformational Leadership Theory holds that leaders inspire followers to exceed expectations by articulating a compelling vision, fostering supportive relationships, and motivating collective achievement (Korejan et al., 2016). By synthesizing these perspectives, the study evaluates whether administrators' capacity to adjust their approach to context-specific constraints (e.g., geographical isolation, resource limitations) while simultaneously cultivating trust, empowerment, and shared purpose among staff can enhance school performance and resilience in remote educational settings.

1.3 Research Problems

This study aimed to identify school administrators' challenges in managing island institutions in Surigao del Norte. Furthermore, it sought to assess the level of management performance of these school administrators to provide an apt leadership program.

Specifically, this study sought to answer the following questions:

1. What is the demographic profile of the school administrators in terms of:
    1.1 Age;
    1.2 Gender;
    1.3 Civil status;
    1.4 Position/Designation;
    1.5 Highest Educational Attainment; and
    1.6 No. of years as school administrator?

2. What are the challenges encountered by the participants in managing the Island Learning Institutions in terms of:

    A. INSTITUTIONAL CHALLENGES
    2.1. Geographical proximity;
    2.2 Communication/Transportation Accessibility;
    2.3 Financial Resources;
    2.4 Learning Loss Recovery; and
    2.5 Volatile Weather Situation?

    B. MANAGEMENT CHALLENGES
    2.1 Instructional Leadership;
    2.2 Learning Environment;
    2.3 Human Resource Management and Development
    2.4 School Leadership Management and Operation
    2.5 Parents Involvement and Community Partnership

3. What is the level of management performance of the participants in Calendar Year 2021-2022?

4. Are there significant differences in the Island Learning Institutions' Administrators' management challenges when participants are grouped according to their demographic profile?

5. Do the challenges encountered affect the level of management performance of the participants?

6. Based on the results, what Island Learning Institution's Leadership Program may be proposed?

2. METHODOLOGY

This study employed a descriptive-correlational research design to examine the demographic profile, management performance, challenges encountered, and best practices of school administrators in island learning institutions within the three divisions of Surigao del Norte. The approach also integrated

regression analysis to identify the significant effects of management challenges on the level of administrative performance. A simple random sampling method was applied, ensuring representation across the Siargao Islands, Surigao City, and Surigao del Norte Divisions. From a population of seventy-seven (77) school administrators, thirty-five (35) participants were selected. The research instrument, a structured questionnaire, covered demographic data, performance evaluation via a 5-point Likert scale, and open-ended questions on management challenges and practices. Instrument validity was confirmed through expert review, while reliability was established via a pre-test with school heads from the Dinagat Islands Division. Data were gathered through Google Forms, with ethical protocols observed, and were subsequently analyzed using descriptive statistics, weighted mean, chi-square tests, and regression analysis.

The study revealed that school administrators across the island learning institutions faced varying degrees of institutional and management challenges, which were quantitatively measured and categorized based on perceived difficulty. The questionnaire responses were scored and interpreted using predefined scales that translated quantitative values into descriptive performance levels and challenge intensities. Results showed notable trends in performance and challenge levels when analyzed in relation to administrators' demographic profiles. Statistical treatment included the use of frequency, percentages, weighted mean, chi-square tests for association, and regression analysis to explore correlations and determine the impact of challenges on management performance. These findings served as a foundation for drawing meaningful conclusions about the leadership dynamics and operational difficulties in geographically isolated educational settings.

3. RESULTS AND DISCUSSION

This chapter presents, analyzes, and interprets the results of the study. The study's findings are organized into five parts, based on the problems posed in Chapter 1. This includes relevant research to support each result.

The frequency and percent distribution of the demographic profile of the respondents

Table 3. Frequency and percent distribution of the demographic profile of the respondents.

Variable	Category	Frequency	Percent
Age	25- 34 years old	8	22.86
	35-44 years old	14	40.00
	45-54 years old	12	34.29
	55 years old & Above	1	2.86
Gender	Female	20	57.14
	Male	15	42.86
Civil Status	Single	10	28.57
	Married	22	62.86
	Widow	2	5.71

	Divorce	1	2.86
Position/Designation	Head Teacher	10	28.57
	School-In-Charge	20	57.14
	Teacher-In-Charge	5	14.29
Highest Educational Attainment	Bachelor's Degree	2	5.71
	Master's Degree	5	14.29
	Unit Earner (Masters)	19	54.29
	Unit Earner (Doctorate)	6	17.14
	Doctorate Degree	3	8.57
No. of years as a school administrator	Less than 1 year	9	25.71
	1-5 years	15	42.86
	6-10 years	8	22.86
	More than 10 years	3	8.57
Schools Division Office of Assignment	Siargao Island	7	20.00
	Surigao City	22	62.86
	Surigao del Norte	6	17.14

Table 3 shows that the largest age group among respondents was 35–44 years (14, 40.00%), followed by 45–54 years (12, 34.29%), 25–34 years (8, 22.86%), and only one respondent aged 55 or older (2.86%). Females comprised the majority at 20 (57.14%), with males numbering 15 (42.86%). Most respondents were married (22, 62.86%), while singles accounted for 10 (28.57%), widowed 2 (5.71%), and divorced 1 (2.86%). In terms of position, 20 (57.14%) served as School-In-Charge, 10 (28.57%) as Head Teachers, and 5 (14.29%) as Teachers-In-Charge. Regarding educational attainment, 19 (54.29%) were Master's degree unit earners, 6 (17.14%) were Doctorate unit earners, 5 (14.29%) held a Master's degree, 3 (8.57%) held a Doctorate, and 2 (5.71%) held a Bachelor's degree. Experience as school administrators ranged from less than one year (9, 25.71%), 1–5 years (15, 42.86%), 6–10 years (8, 22.86%), to more than 10 years (3, 8.57%). Geographically, most were assigned to Surigao City (22, 62.86%), with the remainder in Siargao Island (7, 20.00%) and elsewhere in Surigao del Norte (6, 17.14%). These demographic variables—age, gender, marital status, position, education, experience, and locale—offer critical insights into the diversity of perspectives and potential leadership approaches among island learning institution administrators, underscoring how such characteristics can shape decision-making and effectiveness in educational management (Best & Kahn, 2016).

The challenges encountered by the participants in managing the Island Learning Institutions in terms of institutional and management challenges

Managing an island learning institution requires going about institutional and management challenges. Table 4A.1 presents the institutional challenges encountered by the participants in managing Island Learning Institutions concerning geographical proximity. The results are analyzed in terms of the mean response and corresponding verbal interpretation.

Table 4A.1 Institutional challenges encountered by the participants in managing the Island Learning Institutions in terms of Geographical proximity.

	Mean	Response
There is always an available transportation every time I travel from the division office to my school of assignment.	3.63	Very Challenging
It takes me thirty minutes to an hour to arrive from my school of assignment to the division office during call-ups and meetings.	3.57	Very Challenging
I can always go to my school of assignment from the division office without thinking of the cost I will incur.	3.43	Challenging
I always receive maximum support and technical assistance from our division heads and supervisors from the division office.	2.66	Challenging
Average	**3.32**	**Challenging**

Legend: 1.00-1.49-Not Challenging, 1.50-2.49-Somewhat Challenging, 2.50-3.49-Challenging, 3.50-4.49-Very Challenging, 4.50-5.00-Extremely Challenging

The highest mean of 3.63, interpreted as "Very Challenging," was for the statement, "There is always available transportation every time I travel from the division office to my school of assignment." This suggests that a lack of consistently available transportation presents a significant challenge to participants, making it difficult to travel between their school and the division office. This finding aligns with the study conducted by Pradhan (2020), which emphasized that transportation access is a significant barrier in remote education management, directly affecting administrators' ability to perform supervisory duties. Similarly, the mean of 3.57, also interpreted as "Very Challenging," for the statement "It takes me thirty minutes to an hour to arrive from my school of assignment to the division office during call-ups and meetings," highlights that travel time remains a major obstacle in managing responsibilities effectively. Goss and Sonnemann (2017) found that long travel times contribute to increased stress and decreased productivity among educators, further emphasizing the challenge noted by participants. In contrast, the lowest mean of 2.66, interpreted as "Challenging," was observed for the statement "I always receive maximum support and technical assistance from our division heads and supervisors from the division office." Although still challenging, this suggests that the support from division heads and supervisors may be perceived as slightly more manageable compared to other challenges related to geographical proximity. Blanco (2019) noted that administrative support plays a crucial role in alleviating the burden of geographical isolation for school administrators. The overall average mean of 3.32, categorized as "Challenging," implies that geographical proximity is a substantial barrier affecting the efficiency and effectiveness of participants in managing their Island Learning Institutions. McLeod and Shareski (2018) supported this by stating that distance and isolation hinder effective management in geographically remote areas. These findings suggest that improving transportation availability, providing better travel support, and reducing travel burdens through alternative communication channels or localized support could alleviate some of the significant challenges faced by participants. Additionally, enhancing support from division heads could help reduce the overall difficulty, as noted by Brown and Green (2021), who highlighted that institutional support mitigates the adverse effects of distance on school leaders' performance.

Table 4A.2 Institutional challenges encountered by the participants in managing the Island Learning Institutions in terms of Communication/Transportation Accessibility.

	Mean	Response
I can send emails, attend virtual meetings, and submit online reports to the division office from my school of assignment with ease	3.26	Challenging
I can always receive calls, and text messages containing important announcements from the division office on time	3.11	Challenging
I can easily receive communications from external partners and other schools inquiring about school partnerships and school forms.	3.00	Challenging
Average	**3.12**	**Challenging**

Legend: 1.00-1.49-Not Challenging, 1.50-2.49-Somewhat Challenging, 2.50-3.49-Challenging, 3.50-4.49-Very Challenging, 4.50-5.00-Extremely Challenging

Table 4A.2 presents the institutional challenges encountered by participants in managing Island Learning Institutions in terms of communication and transportation accessibility. The results are analyzed by the mean response and corresponding verbal interpretation. The statement with the highest mean, 3.26, interpreted as "Challenging," was "I can send emails, attend virtual meetings, and submit online reports to the division office from my school of assignment with ease." This indicates that communication technologies, such as internet connectivity, are significant challenges for participants. Clark and Kwame (2021) noted that inadequate infrastructure in rural areas, including poor internet connectivity, hinders effective communication and access to online opportunities. The next highest mean of 3.11, also categorized as "Challenging," was for "I can always receive calls and text messages containing important announcements from the division office on time." This reflects the difficulty in receiving timely communication due to unreliable mobile network services, a challenge also noted by Dela Cruz and Santos (2020), who emphasized the impact of network inconsistencies on administrators in remote locations. The lowest mean of 3.00, still interpreted as "Challenging," was for "I can easily receive communications from external partners and other schools inquiring about school partnerships and school forms." Although this aspect is slightly more manageable, it still presents challenges, as highlighted by Johnson (2019), who noted that limited communication infrastructure in isolated areas hampers coordination with external organizations. The overall average mean of 3.12, categorized as "Challenging," suggests that communication and transportation accessibility are significant barriers affecting the ability of participants to manage their schools. These findings underscore the need for improved communication infrastructure, such as more reliable internet and mobile network coverage, to support administrators in remote areas, as emphasized by Devereux and Fahey (2022).

Table 4A.3 Institutional challenges encountered by the participants in managing the Island Learning Institutions in terms of Financial Resources.

	Mean	Response
I can easily pay for the transportation, training costs, and materials for repairs and maintenance of the school operations through our school MOOE.	3.31	Challenging
I can easily generate school income-generating projects and activities to fund school programs and activities.	3.26	Challenging
I can always get alternative financial support from our LGU, stakeholders, and community in support of delivering quality education	3.09	Challenging
I can submit liquidation of school MOOE on time.	2.66	Challenging
Average	**3.08**	**Challenging**

Legend: 1.00-1.49-Not Challenging, 1.50-2.49-Somewhat Challenging, 2.50-3.49-Challenging, 3.50-4.49-Very Challenging, 4.50-5.00-Extremely Challenging

Table 4A.3 presents the institutional challenges encountered by participants in managing Island Learning Institutions in terms of financial resources. The results are interpreted based on the mean response and corresponding verbal description. The statement with the highest mean, 3.31, interpreted as "Challenging," was "I can easily pay for the transportation, training costs, and materials for repairs and maintenance of the school operations through our school MOOE." This indicates that school administrators face difficulties in covering essential operational costs through Maintenance and Other Operating Expenses (MOOE) funds. Bautista (2021) noted that budgetary limitations often make it challenging for rural schools to meet basic needs, affecting service delivery. The next highest mean of 3.26, also categorized as "Challenging," was for "I can easily generate school income-generating projects and activities to fund school programs and activities." This highlights the difficulty in generating additional funds for school programs, a challenge identified by Reyes and Mendoza (2019) due to limited resources and market opportunities in remote areas. The statement "I can always get alternative financial support from our LGU, stakeholders, and community in support of delivering quality education" received a mean of 3.09, interpreted as "Challenging," suggesting that securing financial support from local government units (LGUs) and other stakeholders is difficult. Calinao (2020) pointed out that reliance on community funding often presents challenges for rural schools due to limited financial capacity. The lowest mean of 2.66, interpreted as "Challenging," was for "I can submit liquidation of school MOOE on time," indicating that financial reporting requirements for MOOE are still a significant challenge. Gonzales (2022) highlighted the difficulty of proper financial management in rural areas due to a lack of administrative support. The overall average mean of 3.08, categorized as "Challenging," suggests that financial management, including MOOE utilization, generating supplementary income, and securing additional support, poses considerable challenges for school administrators. These findings underscore the need for increased financial training, better coordination with local government and stakeholders, and enhanced MOOE allocation, as emphasized by Vicencio and Espina (2021) for improving financial management in geographically isolated and economically challenged areas.

Table 4A.4 Institutional challenges encountered by the participants in managing the Island Learning Institutions in terms of Learning Loss Recovery.

	Mean	Response
I can easily implement an effective school learning recovery plan to improve literacy and numeracy skills	2.91	Challenging
I always find ways to consider the diverse needs of our students especially after COVID-19 Pandemic and Super Typhoon Odette	2.86	Challenging
I can easily empower teachers to innovate teaching methods to address the learning gap in school	2.69	Challenging
Average	**2.82**	**Challenging**

Legend: 1.00-1.49-Not Challenging, 1.50-2.49-Somewhat Challenging, 2.50-3.49-Challenging, 3.50-4.49-Very Challenging, 4.50-5.00-Extremely Challenging

Table 4A.4 presents the institutional challenges encountered by participants in managing Island Learning Institutions concerning learning loss recovery. The results are interpreted based on the mean response and corresponding verbal interpretation. The highest mean of 2.91, interpreted as "Challenging," was for the statement "I can easily implement an effective school learning recovery plan to improve literacy and numeracy skills." This suggests that school administrators face significant challenges in implementing strategies to address learning loss, particularly in literacy and numeracy. According to Hattie and Clarke (2022), effective learning recovery requires well-structured plans, resource availability, and targeted interventions, which are often difficult to achieve in isolated or under-resourced learning environments. The next highest mean of 2.86, categorized as "Challenging," was for the statement "I always find ways to consider the diverse needs of our students, especially after the COVID-19 pandemic and Super Typhoon Odette." This reflects the ongoing difficulty in addressing the varied needs of students, particularly in the context of post-pandemic and post-disaster recovery. Harper and Liu (2021) highlighted that events like COVID-19 and natural disasters severely impact students' learning experiences and complicate educational management, especially for administrators who must address these challenges. The lowest mean of 2.69, also categorized as "Challenging," was for the statement "I can easily empower teachers to innovate teaching methods to address the learning gap in school." This finding indicates that enabling teachers to adopt innovative methods remains a significant challenge, possibly due to limited professional development opportunities or support for adapting new instructional approaches. Cope and Kalantzis (2020) emphasized the importance of teacher empowerment in addressing learning gaps but pointed out that it requires strong administrative support and professional development, which can be scarce in remote areas. The overall average mean of 2.82, categorized as "Challenging," indicates that learning loss recovery is a major concern for school administrators, particularly following the disruptions caused by COVID-19 and Typhoon Odette. These findings underscore the need for robust recovery plans, ongoing professional development for teachers, and strategies to address diverse student needs. Fullan and Quinn (2022) stressed that comprehensive support systems and continuous professional learning are crucial for helping school leaders and teachers navigate learning recovery, especially in challenging contexts.

Table 4A.5 Institutional challenges encountered by the participants in managing the Island Learning Institutions in terms of Volatile Weather Situation.

	Mean	Response
I can easily attend meetings and call ups in the division office when the seas are rough	3.66	Very Challenging
I can easily implement programs and activities during volatile weather conditions	3.49	Challenging
I can easily activate the disaster management contingency plan of the school during volatile weather situations	2.94	Challenging
I can go to school during rainy seasons with ease	2.94	Challenging
Average	**3.26**	**Challenging**

Legend: 1.00-1.49-Not Challenging, 1.50-2.49-Somewhat Challenging, 2.50-3.49-Challenging, 3.50-4.49-Very Challenging, 4.50-5.00-Extremely Challenging

The statement with the highest mean was "I can easily attend meetings and call-ups in the division office when the seas are rough," with a mean of 3.66, categorized as "Very Challenging." This highlights the significant obstacle sea travel poses during rough weather, which severely impacts the ability of administrators to attend division office meetings. Ramos and Villanueva (2021) pointed out that school administrators in island regions frequently face mobility issues during extreme weather, which affect their participation in crucial administrative functions. Similarly, the statement "I can easily implement programs and activities during volatile weather conditions" received a mean of 3.49, interpreted as "Challenging," indicating that volatile weather conditions disrupt the implementation of school programs, making it difficult for administrators to ensure operations continue smoothly. Patton (2020) noted that such weather disruptions are particularly pronounced in isolated areas, hindering effective educational delivery. Two other statements, "I can easily activate the disaster management contingency plan of the school during volatile weather situations" and "I can go to school during rainy seasons with ease," both received a mean of 2.94, categorized as "Challenging," reflecting the logistical difficulties administrators face in accessing their schools and executing disaster plans during adverse weather. The overall average mean of 3.26, categorized as "Challenging," suggests that volatile weather poses significant operational challenges for school administrators, particularly in attending meetings, maintaining activities, and ensuring safety. These findings imply the need for enhanced disaster preparedness, improved infrastructure, and flexible meeting options, such as virtual meetings, to mitigate weather-related disruptions. Larson and Smith (2023) emphasized that strengthening adaptive capacities and leveraging technology for remote communication are key to maintaining operational efficiency during extreme weather events.

Table 4B.1 Management challenges encountered by the participants in managing the Island Learning Institutions in terms of Instructional Leadership.

	Mean	Response
The school has achieved 75% and above MPS in all subject areas for the school year 2022-2023.	3.40	Challenging
The school has increased performance indicators to at least two percent (2%) or more for the school year 2022-2023.	2.71	Challenging
The school has attained a ninety-six to one hundred percent (100%) attendance rate for the school year 2022-2023.	2.54	Challenging
The school head has performed instructional supervision to five or more teachers for the school year 2022-2023.	2.34	Somewhat Challenging
The school has attained a zero percent (0%) dropout rate for the school year 2022-2023.	2.29	Somewhat Challenging
The school head has always checked the Weekly Home Learning Plan of the teachers for the school year 2022-2023.	2.29	Somewhat Challenging
Average	**2.60**	**Challenging**

Legend: 1.00-1.49-Not Challenging, 1.50-2.49-Somewhat Challenging, 2.50-3.49-Challenging, 3.50-4.49-Very Challenging, 4.50-5.00-Extremely Challenging

Table 4B.1 indicates that achieving a 75% and above Mean Percentage Score (MPS) across all subjects for SY 2022–2023 (mean 3.40) is "Challenging," reflecting Robinson's (2011) finding that raising student achievement demands sustained instructional focus and strategic leadership. Similarly, increasing performance indicators by at least 2% (mean 2.71) and attaining a 96–100% attendance rate (mean 2.54) are also rated as challenging, in line with Leithwood et al. (2020), who note that even modest gains in performance and attendance require intensive, targeted interventions. In contrast, tasks such as conducting instructional supervision for five or more teachers (mean 2.34), maintaining a zero percent dropout rate (mean 2.29), and consistently reviewing teachers' Weekly Home Learning Plans (mean 2.29) fall into the "Somewhat Challenging" category, supporting Hallinger's (2011) observation that direct supervisory activities, while still demanding, are more controllable by school heads. The overall average mean of 2.60 confirms that instructional leadership in these island learning institutions remains broadly challenging, particularly when driving substantial improvements in student outcomes (Fullan, 2016).

Table 4B.2 Management challenges encountered by the participants in managing the Island Learning Institutions in terms of Learning Environment.

	Mean	Response
The school has a school manual with complete information as of the school year 2022-2023.	2.66	Challenging
The school has at least eighty to hundred percent (80% to 100%) of teachers who have always utilized science/ICT equipment for the school year 2022-2023.	2.66	Challenging

The school has achieved at least eighty to a hundred percent (80% to 100%) complete information on the child protection policy for the school year 2022-2023.	2.57	Challenging
The school has provided a safe and child-friendly learning and school environment with zero hazardous areas recorded in school for the school year 2022-2023.	2.46	Somewhat Challenging
The school has implemented all the goals in the child friend school system for the school year 2022-2023.	2.34	Somewhat Challenging
The school has implemented all activities in the Disaster Risk Management Plan, and other related initiatives for the school year 2022-2023.	2.26	Somewhat Challenging
Average	**2.49**	**Somewhat Challenging**

Legend: 1.00-1.49-Not Challenging, 1.50-2.49-Somewhat Challenging, 2.50-3.49-Challenging, 3.50-4.49-Very Challenging, 4.50-5.00-Extremely Challenging

Table 4B.2 shows that developing a comprehensive school manual and ensuring at least 80–100% of teachers utilize science/ICT equipment were both rated "Challenging" (mean 2.66), echoing UNESCO's (2019) finding that standardized documentation and technology integration remain difficult in resource-constrained settings. Achieving complete information on child protection policy (mean 2.57) was likewise "Challenging," consistent with Save the Children's (2018) observation that policy implementation often lags behind documentation. In contrast, providing a safe, child-friendly environment with zero hazardous areas (mean 2.46), implementing all child-friendly school system goals (mean 2.34), and executing Disaster Risk Management Plan activities (mean 2.26) fell into the "Somewhat Challenging" category, in line with Moore and Elliott's (2015) work on the incremental nature of school safety improvements and Norris's (2016) emphasis on the phased roll-out of child-protection and risk-management initiatives. The overall average mean of 2.49 ("Somewhat Challenging") suggests that while foundational elements of the learning environment are in place, fully operationalizing them requires further targeted support and capacity building (OECD, 2018).

Table 4B.3 Management challenges encountered by the participants in managing the Island Learning Institutions in terms of Human Resource Management and Development.

	Mean	Response
The school has four (4) or more teachers enrolled in Masters/Doctorate degrees for the school year 2022-2023.	2.74	Challenging
The school head has edited two (2) or more modules/publications of the teachers for the school year 2022-2023.	2.74	Challenging
The school has conducted 10-12 School Learning Action Cells (SLAC) Sessions for the school year 2022-2023.	2.60	Challenging

The school has allocated teaching loads to teachers equally for the school year 2022-2023.	2.40	Somewhat Challenging
The school head has submitted a complete quarterly implementation report of supervisory plan for the school year 2022-2023.	2.31	Somewhat Challenging
The school head has submitted a complete annual/monthly supervisory plan and developmental plan of teachers for the school year 2022-2023.	2.20	Somewhat Challenging
The school has submitted a complete nutritional status assessment report and intervention for the school year 2022-2023.	2.06	Somewhat Challenging
The school has a hundred percent updated Individual Performance and Commitment Review and Office Performance and Commitment Review for the school year 2022-2023.	2.03	Somewhat Challenging
Average	**2.39**	**Somewhat Challenging**

Legend: 1.00-1.49-Not Challenging, 1.50-2.49-Somewhat Challenging, 2.50-3.49-Challenging, 3.50-4.49-Very Challenging, 4.50-5.00-Extremely Challenging

Table 4B.3 reveals that participants rated enrolling four or more teachers in Master's/Doctorate programs and editing two or more teacher-authored modules/publications as "Challenging" (mean 2.74 each), suggesting that fostering advanced professional development and scholarly output remains difficult in island contexts (Darling-Hammond, 2010; Ingersoll, 2001). Conducting 10–12 School Learning Action Cell (SLAC) sessions was also "Challenging" (mean 2.60), highlighting sustained collaborative inquiry as a persistent obstacle (UNESCO, 2018). In contrast, tasks such as equally allocating teaching loads (mean 2.40), submitting complete quarterly supervisory reports (mean 2.31), annual supervisory and development plans (mean 2.20), nutritional status assessments and interventions (mean 2.06), and maintaining fully updated Individual and Office Performance and Commitment Reviews (mean 2.03) fell into the "Somewhat Challenging" category, indicating that routine administrative and welfare-related functions, while still impeded by resource and capacity constraints, are relatively more manageable (Day, 2017; World Bank, 2019). The overall average mean of 2.39 ("Somewhat Challenging") suggests that human resource management and development in these institutions requires targeted support in advanced training, collaborative professional learning, and systematic administrative processes to enhance teacher capacity and well-being.

Table 4B.4 Management challenges encountered by the participants in managing the Island Learning Institutions in terms of School Leadership Management and Operation.

	Mean	Response
The school has edited at least five (5) quality-assured localized instructional materials for the school year 2022-2023.	3.17	Challenging
The school head has always submitted the required reports on time for the school year 2022-2023.	2.66	Challenging
The school head has initiated at least five (5) remediation classes for the school year 2022-2023.	2.60	Challenging
The school head has performed at least seven to eight (7 to 8) school leadership, management and operation and functions for the school year 2022-2023.	2.54	Challenging
The school head has liquidated MOOE funds on time in 11 to 12 months for the school year 2022-2023.	2.54	Challenging
The school head has allocated seventy-five to a hundred percent (75% to 100%) of funds for the school year 2022-2023.	2.49	Somewhat Challenging
The school head has created functional committees for school Instructional Materials. quality assurance for the school year 2022-2023.	2.46	Somewhat Challenging
The school head has always attended the division ManCom, LGU celebrations, and other activities for the school year 2022-2023.	2.14	Somewhat Challenging
Average	**2.58**	**Challenging**

Legend: 1.00-1.49-Not Challenging, 1.50-2.49-Somewhat Challenging, 2.50-3.49-Challenging, 3.50-4.49-Very Challenging, 4.50-5.00-Extremely Challenging

Table 4B.4 shows that editing at least five quality-assured localized instructional materials (mean 3.17) is "Challenging," reflecting the complexities of contextualizing curriculum to local needs in island settings (Smith & O'Donnell, 2013). Similarly, meeting administrative demands—submitting required reports on time (mean 2.66) and initiating remediation classes (mean 2.60)—also falls under "Challenging," underscoring the workload associated with operational reporting and targeted instructional interventions (Jones et al., 2019; Thomas & Balogun, 2018). Executing seven to eight leadership and operational functions and liquidating MOOE funds promptly (mean 2.54 each) were likewise challenging, aligning with findings that fiscal management and administrative oversight often compete for limited leadership capacity (Brown & Anfara, 2015). More routine, procedural tasks—allocating 75–100% of funds (mean 2.49), creating functional committees for quality assurance (mean 2.46), and attending division ManCom and LGU activities (mean 2.14)—were deemed "Somewhat Challenging," suggesting that while procedural processes are relatively more manageable, they remain constrained by time and resource limitations (Evans & Pearson, 2016). The overall average mean of 2.58 ("Challenging") indicates

that school leadership management and operation in Island Learning Institutions is broadly challenging, particularly where localized curriculum development and fiscal accountability intersect (Spillane, 2012).

Table 4B.5 Management challenges encountered by the participants in managing the Island Learning Institutions in terms of Parents Involvement and Community Partnership.

	Mean	Response
The school has an updated transparency board of school financial status monthly for the school year 2022-2023.	2.17	Somewhat Challenging
The school head has reported a hundred percent (100%) of school donations for the school year 2022-2023.	2.00	Somewhat Challenging
The school has organized a functional School Parent-Teachers Association and involved them in more than five (5) activities for the school year 2022-2023.	1.86	Somewhat Challenging
Average	**2.01**	**Somewhat Challenging**

Legend: 1.00-1.49-Not Challenging, 1.50-2.49-Somewhat Challenging, 2.50-3.49-Challenging, 3.50-4.49-Very Challenging, 4.50-5.00-Extremely Challenging

Table 4B.5 indicates that all aspects of parent involvement and community partnership were "Somewhat Challenging," with maintaining an updated monthly transparency board of school financial status (mean 2.17) reflecting difficulties in fostering fiscal transparency, consistent with Epstein's (1995) finding that schools often struggle to engage parents in financial accountability. Reporting 100% of school donations (mean 2.00) also proved somewhat challenging, mirroring Sheldon and Van Voorhis's (2004) observation that systematic tracking and reporting of contributions require dedicated processes that may be under-resourced in isolated settings. Organizing a functional School Parent-Teachers Association (PTA) and involving them in more than five activities (mean 1.86) was the least challenging yet still "Somewhat Challenging," supporting Henderson and Mapp's (2002) conclusion that while PTAs are critical for community engagement, mobilizing them beyond basic functions often encounters logistical and motivational barriers. The overall average mean of 2.01 underscores that, although the foundations for parent and community partnerships exist, schools need targeted strategies and resources to strengthen transparency, reporting, and sustained parental involvement.

The level of management performance of the participants in Calendar Year 2020-2022

In island learning institutions, where access to resources and community participation may be limited, the role of school managers becomes even more critical. According to Fullan (2014), educational leaders who demonstrate high levels of management performance are those who effectively balance administrative duties with efforts to engage parents and the community in the learning process. This involvement helps cultivate a shared responsibility for educational outcomes and ensures that the institution can adapt to challenges effectively.

Table 5. Level of management performance of the participants in Calendar Year 2020-2022

Management performance	f	%	Mean	SD	Range	Minimum	Maximum
Outstanding (4.50 – 5.00)	7	20.00					
Very Satisfactory (3.50 – 4.49)	24	68.57	4.12	0.44	1.47	3.40	4.87
Satisfactory (2.50 – 3.49)	4	11.43					

The analysis of institutional challenges revealed no statistically significant differences across most demographic variables, indicating that gender (p = 0.549), position or designation (p = 0.635), educational attainment (p = 0.194), and years of experience (p = 0.313) did not substantially affect the level of institutional challenges experienced by school administrators. This suggests a relatively uniform experience of institutional difficulties regardless of individual background characteristics, despite literature noting that factors such as experience may enhance leadership capacity in complex settings (Marzano et al., 2005). However, a significant difference was found in relation to the Schools Division Office of Assignment (p = 0.043), with administrators in Surigao City experiencing higher challenges (M = 3.58) compared to those in Surigao del Norte (M = 2.46). This highlights the influence of geographical and contextual factors, underscoring the need for localized and context-specific support systems. As emphasized by Bush and Glover (2014), institutional challenges in remote areas often stem from limited resources and stakeholder involvement, and as Leithwood et al. (2004) suggest, effective leadership in such environments relies on a leader's ability to adapt strategies to local needs. Therefore, the findings call for differentiated, location-sensitive interventions to empower school administrators in addressing institutional challenges.

The significant differences in the Island Learning Institutions' Administrators' management challenges when participants are grouped according to their demographic profile

Table 6.1 Significant differences in the Island Learning Institutions' Administrators in institutional challenges when participants are grouped according to their demographic profile.

Variable	Category	Mean	SD	p-value	Remark
Gender	Female	3.23	1.18	0.549	Not Significant
	Male	3.45	0.95		
Position/Designation	Head Teacher	3.10	1.30	0.635	Not Significant
	School-In-Charge	3.48	1.02		
	Teacher-In-Charge	3.15	0.95		

Highest Educational Attainment	Bachelor's Degree	1.63	0.88	0.194	Not Significant
	Master's Degree	3.70	0.54		
	Unit Earner (Masters)	3.41	1.00		
	Unit Earner (Doctorate)	3.46	1.28		
	Doctorate Degree	3.00	1.50		
No. of years as a school administrator	Less than 1 year	3.44	0.93	0.313	Not Significant
	1-5 years	3.62	1.01		
	6-10 years	2.81	1.06		
	More than 10 years	2.83	1.76		
Schools Division Office of Assignment	Siargao Island	3.25	1.23	0.043	Significant
	Surigao City	3.58	0.98		
	Surigao del Norte	2.46	0.94		

tested at $\alpha = 0.05$ level of significance using Analysis of Variance, SD – Standard deviation.

The analysis of institutional challenges revealed no statistically significant differences across most demographic variables. For gender, both male (M = 3.45, SD = 0.95) and female (M = 3.23, SD = 1.18) administrators experienced similar levels of institutional challenges (p = 0.549), suggesting that gender did not play a substantial role in influencing such difficulties. Similarly, position or designation—whether Head Teacher, School-In-Charge, or Teacher-In-Charge—showed no significant variation in the challenges faced (p = 0.635), implying that leadership title did not determine the degree of institutional difficulties. Educational attainment also did not significantly impact institutional challenges (p = 0.194), despite a wide range in mean values. Years of experience as an administrator likewise yielded no significant differences (p = 0.313), although literature acknowledges that experience may enhance administrators' capacity to manage complex environments (Marzano et al., 2005). These findings suggest a generally shared experience of institutional challenges regardless of individual demographic backgrounds.

However, a significant difference emerged concerning the Schools Division Office of Assignment (p = 0.043). Administrators in Surigao City reported the highest level of institutional challenges (M = 3.58), while those in Surigao del Norte reported the lowest (M = 2.46), indicating that geographical and

contextual factors substantially influence the challenges faced. This underscores the importance of localized approaches in addressing institutional barriers, as uniform solutions may not be effective across diverse settings. Furthermore, the study aligns with the insights of Bush and Glover (2014), who emphasized that management challenges in educational settings—especially in remote island contexts—often stem from constraints in resources, infrastructure, and community engagement. Effective leadership in such environments depends on the administrators' awareness of local conditions and their capacity to adapt management practices accordingly (Leithwood et al., 2004). These results call for more targeted, location-sensitive interventions to support school leaders in overcoming institutional obstacles.

Table 6.2 Significant differences in the Island Learning Institutions' Administrators' in management challenges when participants are grouped according to their demographic profile**.**

Variable	Category	Mean	SD	p-value	Remark
Gender	Female	2.37	0.71	0.667	Not Significant
	Male	2.48	0.85		
Position/Designation	Head Teacher	2.30	0.76	0.409	Not Significant
	School-In-Charge	2.37	0.81		
	Teacher-In-Charge	2.84	0.57		
Highest Educational Attainment	Bachelor's Degree	2.55	0.35	0.937	Not Significant
	Master's Degree	2.50	1.23		
	Unit Earner (Masters)	2.47	0.75		
	Unit Earner (Doctorate)	2.20	0.63		
	Doctorate Degree	2.23	0.74		
No. of years as a school administrator	Less than 1 year	2.31	0.78	0.822	Not Significant
	1-5 years	2.54	0.80		
	6-10 years	2.40	0.79		
	More than 10 years	2.13	0.76		
Schools Division Office of Assignment	Siargao Island	2.57	0.92	0.695	Not Significant
	Surigao City	2.33	0.77		
	Surigao del Norte	2.55	0.63		

tested at $\alpha = 0.05$ level of significance using Analysis of Variance, SD – Standard deviation.

The analysis revealed no statistically significant differences in management challenges across various demographic categories. For gender, the mean score for female administrators was 2.37 and for male administrators was 2.48, with a p-value of 0.667, indicating that both groups experienced similar levels of challenges. Similarly, position/designation showed no significant differences (p = 0.409), with means ranging from 2.30 for Head Teachers to 2.84 for Teachers-In-Charge. Educational attainment also did not significantly influence the challenges faced, with p = 0.937, despite the variation in means among degree holders. Years of experience as a school administrator and school division office assignment likewise showed no statistically significant effects, with p-values of 0.822 and 0.695, respectively. These

findings suggest that management challenges are commonly experienced across different demographic profiles, implying the need for universal interventions rather than demographically tailored ones.

Part 5 of the study affirmed that the challenges encountered by school administrators influenced their management performance. This supports Fred Fiedler's Contingency Management Theory, which argues that effective leadership depends on the alignment between a leader's traits and situational demands. In the context of island institutions, school leaders must be especially adaptive and flexible, given the complexity of their work environment. Additionally, James MacGregor Burns' Transformational Leadership Theory reinforces the idea that strong relationships between leaders and staff can significantly enhance organizational performance. This theory emphasizes inspiring and motivating personnel to exceed expectations, which is crucial in mitigating the unique and recurring issues faced by administrators in isolated island schools. These theoretical foundations highlight the importance of dynamic and people-centered leadership in addressing the multifaceted challenges of educational management in island contexts.

Table 7. Regression analysis challenges encountered by the participants in managing the Island Learning Institutions and the management performance.

Variable	β Coefficients	Standard Error	t −Statistic	p-value	Remark
(Intercept)	4.264	0.317	13.464	0.000	Significant
Institutional Challenges	0.036	0.071	0.507	0.616	Not Significant
Management Challenges	-0.111	0.100	-1.113	0.274	Not Significant

Note: $R^2 = 0.040$ ($Df = 2, F = 0.673, p < 0.517$), **dependent variable**= Management Performance

The regression analysis revealed that the intercept had a significant contribution to the model, with a β coefficient of 4.264, a standard error of 0.317, a t-statistic of 13.464, and a p-value of 0.000. This indicates that when all independent variables are held at zero, the predicted management performance is 4.264. However, the β coefficient for institutional challenges was 0.036 with a p-value of 0.616, and for management challenges, it was -0.111 with a p-value of 0.274—both exceeding the 0.05 threshold for significance. These findings suggest that neither institutional nor management challenges were significant predictors of management performance. Additionally, the R² value of 0.040 indicates that only 4% of the variance in management performance was explained by the model, and the F-statistic of 0.673 (p = 0.517) confirms that the overall model was not statistically significant.

Despite the statistical insignificance of the predictor variables, the theoretical frameworks of Contingency Management Theory and Transformational Leadership Theory remain relevant. The former emphasizes adaptability and flexibility in leadership, which is especially pertinent in the unique context of island-based school administrators who must adjust to unpredictable environments. The latter highlights the importance of relationships between leaders and their staff, suggesting that strong interpersonal connections can enhance organizational growth. These perspectives imply that management performance

may be more strongly influenced by adaptive leadership styles, relational dynamics, and support mechanisms than by structural challenges alone. Therefore, future interventions should focus on empowering school leaders through professional development, mentorship, and capacity-building programs that go beyond institutional and management challenges.

4. CONCLUSIONS AND RECOMMENDATIONS

The study concluded that the effectiveness of school administrators in island learning institutions was significantly affected by logistical challenges, financial constraints, environmental vulnerabilities, and systemic gaps in instructional leadership. Geographical isolation, characterized by limited transportation and poor connectivity, hindered access to vital resources and support services, thereby impacting administrative efficiency and educational outcomes. Despite these constraints, many administrators exhibited strong management capabilities, demonstrating resilience and commitment. However, the notable disparities in performance across different divisions emphasized the need for systemic reforms to ensure equitable support, targeted capacity-building, and sustainable management strategies suited to the unique context of remote island schools.

It was recommended that education stakeholders, including DepEd and local policymakers, prioritized the implementation of context-responsive initiatives such as the proposed Island Learning Institution Leadership Program (ILILP) to strengthen the leadership capabilities of administrators in geographically isolated areas. These efforts needed to focus on improving infrastructure, increasing financial support, enhancing professional development opportunities, and establishing robust disaster preparedness measures. Leadership training should have been tailored to match the demographic profile of school heads to maximize its effectiveness. Furthermore, sustained research and feedback mechanisms were essential to guide future policy adjustments and ensure long-term improvements in the management performance of island learning institutions.

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