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School Heads' Perspectives on Instructional Resource Sufficiency in Public Schools

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Abstract: This study examined the perceived sufficiency of instructional learning resources and how school heads' perceptions influence decision-making on their allocation, distribution, and utilization. Specifically, it explored print-based materials, digital and multimedia resources, and manipulative learning materials, while identifying challenges in resource management and proposing evidence-based guidance for school heads. Using a descriptive-quantitative design, data were collected from school heads through surveys and structured interviews. Findings revealed varying levels of resource sufficiency. Print-based and digital materials were moderately sufficient, with supplementary reading materials and teaching guides rated highest, while textbooks, teachers' laptops, and learner access to digital devices showed gaps.

Manipulative learning materials were rated critically low, particularly in physical education, art, music, and Technical-Vocational-Livelihood tools. School heads assessed resource sufficiency through intuitive judgment, informal monitoring, teacher and property custodian feedback, and formal evaluation procedures. Their perceptions were found to significantly influence decision-making by guiding gap identification, prioritizing distribution, and informing financial planning for evidence-based allocation. Major challenges included the absence of structured tracking tools, limited provision and allotment of materials, constrained budgets, delayed procurement, substandard quality, and delayed delivery of resources. To address these issues, the study proposed the DARE-LRM Model, a cyclical framework encompassing Diagnose, Analyze, Respond, and Evaluate, designed to support systematic, responsive, and sustainable instructional resource management. The study concludes that targeted acquisition and equitable distribution of manipulative materials, combined with structured monitoring and the adoption of the DARE-LRM Model, can strengthen school-level management of instructional resources, enhance teaching effectiveness, and improve learning outcomes.

Keywords: *Instructional Resource Sufficiency, Digital and Multi-Media Resources, Manipulative Learning Materials, DARE – LRM Model, Teaching Effectiveness.*

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I. INTRODUCTION

Education is a fundamental human right and a cornerstone for sustainable development. It equips individuals with the knowledge, skills, and values necessary to participate fully in society, pursue meaningful employment, and contribute to national progress. Ensuring access to quality education promotes social equity, reduces poverty, and fosters inclusive growth, while empowers citizens to make informed decisions and exercise their rights responsibly.

Despite the recognized importance of education, the status of human capital in the Philippines reveals significant gaps. In the 2020 Human Capital Index released by the World Bank, the Philippines scored 0.52, indicating that children born in 2020 are expected to achieve only slightly more than half of their full human capital potential by age 18. The index, which ranges from 0 to 1, measures the expected accumulation of human capital based on health and education risks, with 1 representing complete education and full health. This score also reflects a decline from the country's 2018 score of 0.55, highlighting a deterioration in human capital development.

The United Nations Educational, Scientific and Cultural Organization (UNESCO) emphasizes that quality education entails appropriate skills development, gender parity, and the provision of relevant school infrastructure and equipment (UNESCO, n.d.). These principles are encapsulated in the United Nations Sustainable Development Goal 4 (SDG 4), which aims to ensure inclusive and equitable quality education and promote lifelong learning opportunities for all by 2030. Achieving

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these goals, however, depends heavily on the availability and adequacy of educational resources, making it essential to assess and address gaps in learning materials, facilities, personnel, and technology.

International studies and data provide valuable insights into the global status of school resources, which can help contextualize the situation in the Philippines. The UNESCO Institute for Statistics (UIS) offers comprehensive global data on education, including indicators related to school infrastructure, teacher allocation, and digital resources. Similarly, the Organization for Economic Co-operation and Development (OECD) publishes Education at a Glance, which provides detailed statistics on financial investment in education, learning environments, and school organization, with particular attention to equity in resource distribution. The OECD's Resourcing School Education Project further examines how policies on school resources are implemented across different countries, emphasizing strategies for digital transformation in schools. Additionally, UNESCO's World Education Statistics report summarizes key education indicators worldwide, offering a benchmark for comparing infrastructure, human resources, and budget allocations across nations. These international data sources highlight the importance of equitable and adequate educational resources and provide benchmarks that can inform policy and planning within the Philippine context.

In the Philippines, the 1987 Constitution mandates the establishment and maintenance of a complete, adequate, and integrated system of education. Despite this constitutional commitment, public schools continue to face challenges in ensuring the sufficiency of educational resources. The Department of Education (DepEd) is tasked with the provision and management of these resources. Notably, the Basic Education Facilities budget of DepEd decreased from the GAA 2021 allocation of PHP 11.15 billion to the GAA 2022 allocation of PHP 5.95 billion. In 2023, DepEd's approved budget was approximately ₱1.05 trillion, underscoring the government's prioritization of education. However, reports indicate that only 11% of the allocated funds for textbooks were utilized, raising concerns about the effective deployment of resources. Furthermore, the DepEd Computerization Program (DCP), initiated in 1996, aims to enhance ICT infrastructure in schools. Despite these efforts, a significant portion of the allocated ICT funds remains unspent, with only ₱2.075 billion utilized out of ₱11.36 billion in 2023.

In terms of physical infrastructure, a study by the Philippine Institute for Development Studies (PIDS) highlights the persistent spatial inequality in classroom-student ratios, with some regions experiencing overcrowded classrooms, which adversely affect the learning environment. In 2019, DepEd field offices assessed and estimated a total of 9,225 last mile schools across the country. If each of these schools is to be provided with at least five classrooms, a total of 46,125 classrooms would be required to meet the last mile classroom standard. DepEd set five classrooms per last mile school as a planning parameter, reasoning that the typically small number of learners in a multi-grade system, along with space requirements for a library or equipment corner, would need four classrooms, while the principal and teachers would require one additional room (Llego, 2020). School building programs implemented by the Department of Public Works and Highways (DPWH) under the Basic Education Facilities (BEF) initiative contributed to addressing this need. By June 2021, the DPWH reported that a total of 144,925 classrooms had been constructed over the past five years (Unite 2021).

Building on the challenges of classroom shortages and infrastructure gaps, the implementation of Executive Order No. 138 (s. 2021) mandates the full devolution of certain functions, including the construction and maintenance of school buildings, to local government units (LGUs). While this policy aims to enhance local accountability and responsiveness, it has also introduced complexities in addressing infrastructure needs, as some LGUs may face difficulties in meeting the standards and requirements set by DepEd. Consequently, the adequacy and quality of school facilities remain inconsistent across regions, underscoring the need for coordinated support between national and local authorities.

Alongside physical infrastructure, the adequacy of teaching and non-teaching personnel represents another critical factor influencing the quality of education. Despite having over 881,000 teachers in public schools, the allocation of resources per teacher, including support staff, instructional materials, and professional development, remains limited. This constraint can significantly affect the effectiveness of instruction and the provision of essential support services, highlighting the need for balanced investment in both human and physical resources to ensure a conducive learning environment.

In Sorsogon City, these national challenges are mirrored at the local level. School heads, as the primary administrators, are at the forefront of managing these resource constraints. Their perspectives are invaluable in assessing the sufficiency of educational resources and identifying areas requiring intervention. This study evaluated the adequacy of educational resources in public schools in Sorsogon City, focusing on learning materials, facilities, ICT infrastructure, personnel, and budget allocation. By examining these aspects, the research provided evidence-based recommendations to enhance the quality of education in the region.

➢ *Statement of the Problem*

This study aims to assess the sufficiency of educational resources in public schools in Sorsogon City by examining the perspectives of school heads. Specifically, it answered the following research questions:

- What is the perceived level of sufficiency of instructional learning resources in terms of print-based materials, digital and multimedia resources, and manipulatives ?
- How do school heads perceive the sufficiency of these resources?

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- In what ways do these perceptions influence decision-making on resource allocation, distribution, and utilization?
- What challenges do school heads encounter in managing instructional resources?
- What evidence-based model can guide school heads in making effective decisions on instructional resource management?

II. METHODOLOGY

➢ *Research Design*

This study employed a mixed-methods research design using a sequential multiphase approach, integrating both quantitative and qualitative data. Research Questions 1 and 4 were addressed using quantitative methods, with survey data analyzed through weighted mean, frequency count, and ranking to describe the sufficiency of instructional learning resources and identify patterns in their allocation and utilization (Creswell & Creswell, 2017). Following this, Research Questions 2 and 3 were explored using focus group discussions to capture school heads' perceptions, providing contextual insights that could not be fully explained by quantitative data alone. In a multiphase mixed-methods design, distinct phases of data collection and analysis are conducted sequentially, allowing one approach to build upon or complement the findings of the other, thereby enriching understanding of the research problem (Creswell & Plano Clark, 2018).

This approach was appropriate for assessing instructional resource sufficiency in public schools in Sorsogon City, as it enabled the researcher to quantify perceptions, describe current conditions, and examine how these perceptions influenced decision-making regarding the allocation, distribution, and utilization of resources. The study focused on three types of instructional resources, print-based materials, digital and multimedia resources, and manipulatives or learning kits, providing an evidence-based foundation for developing a model to guide effective resource management in the local educational context.

➢ *The Respondents*

The respondents of this study were school heads of public schools in Sorsogon City. For the quantitative phase, a cluster random sampling design was employed, with the four districts of the DepEd Sorsogon City Division used as clusters: Bacon East, Bacon West, Sorsogon East, and Sorsogon West. Eight school heads each were randomly selected from Bacon East and Sorsogon East, while nine school heads each were selected from Bacon West and Sorsogon West, as these districts have larger populations. A total of 34 school heads participated in the quantitative survey.

For the qualitative phase, particularly the focus group discussion (FGD), convenience sampling was used. School heads were asked about their availability, and those who were available at the same time were gathered, resulting in the selection of 12 participants. All school heads, regardless of their plantilla position, were eligible for selection.

This approach ensured that each district was represented while capturing the perspectives of those directly responsible for managing school operations, instructional resources, and personnel. By focusing on school heads, the study provided a representative and reliable assessment of the sufficiency of instructional learning resources and the decision-making practices of key school leaders across the division.

➢ *Research Instruments*

This study utilized two research instruments to collect data from school heads regarding the sufficiency of instructional learning resources in public schools in Sorsogon City.

The first instrument was a survey questionnaire, designed to systematically address the study's research questions. The questionnaire consisted of three parts: Part I gathered demographic information on the respondents; Part II focused on the perceived sufficiency of instructional learning resources, including print-based materials, digital and multimedia resources, and manipulatives or learning kits; and Part III focused on the challenges encountered in managing instructional resources.

The second instrument consisted of focus group discussion (FGD) questions, conducted at a later date. The FGD specifically explored how the school heads perceive the sufficiency of instructional learning resources and how school heads' perceptions influence decision-making on resource allocation, distribution, and utilization. This qualitative instrument provided deeper insight into the patterns observed in the survey, allowing the researcher to capture perspectives that could not be fully explained by quantitative data alone.

The use of these two instruments facilitated a mixed-methods approach, integrating quantitative and qualitative data to provide a comprehensive understanding of the research problem and generate actionable findings aligned with the study's objectives.

➢ *Data Collection Procedures*

The data for this study were collected systematically to ensure accuracy, reliability, and ethical compliance. Approval to conduct the study was obtained from the Schools Division Superintendent of Sorsogon City, and participation of the school heads was entirely voluntary.

The quantitative phase involved the administration of a printed survey questionnaire, which was the preferred format of the respondents. Clear instructions were provided to facilitate accurate responses, and respondents were given sufficient time to complete the questionnaire. After collection, the responses were reviewed for completeness and consistency, with clarification sought for any unclear items. The survey data were then coded, organized, and subjected to quantitative statistical analysis, including descriptive statistics such as frequency, mean, and standard deviation, as well as comparative analysis to examine differences across school types.

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The qualitative phase was conducted subsequently, through focus group discussions (FGDs) with selected school heads. The FGDs explored school heads' perceptions of instructional resource sufficiency, decision-making practices, and challenges encountered, providing deeper insights that could not be captured through the survey alone. Throughout both phases, confidentiality and ethical standards were strictly maintained to protect respondents' identities and ensure that the data accurately reflected their perspectives on the sufficiency of instructional learning resources in Sorsogon City.

➢ *Data Analysis Method*

This study employed a sequential mixed-methods multiphase research design, integrating both quantitative and qualitative approaches.

The quantitative data, collected through a printed survey questionnaire administered to the school heads, were systematically organized, coded, and summarized to ensure accuracy and clarity. The responses were tabulated and subjected to descriptive statistical analyses, including frequency counts, weighted mean, and ranking, to identify patterns and trends related to the sufficiency of instructional learning resources. This analysis allowed the study to evaluate school heads' perceptions across print-based materials, digital and multimedia resources, and manipulatives or learning kits, as well as to examine how these perceptions influenced decision-making in the allocation, distribution, and utilization of resources.

The qualitative data, collected through focus group discussions (FGDs) conducted after the survey, were analyzed thematically to provide deeper insights into school heads' perceptions, experiences, and decision-making practices. While the survey's open-ended questions offered initial qualitative clues, the FGD served as the main source of qualitative data, enabling a richer understanding of the patterns observed in the quantitative results. Integrating the qualitative findings with the quantitative results in a sequential approach enhanced the interpretation of the data, ensured that conclusions were comprehensive and data-driven, and supported the development of a practical model for instructional resource sufficiency.

➢ *Statistical Analysis /Quantitative Analysis/Qualitative Analysis*

The data collected in this study were analyzed using both quantitative and qualitative approaches, consistent with a sequential multiphase mixed-methods design.

Quantitative analysis was conducted for Research Questions 1 and 4. RQ1, which examined the perceived sufficiency of instructional learning resources, this was analyzed using weighted means from Likert-scale responses to quantify respondents' levels of agreement and identify overall trends across print-based materials, digital and multimedia resources, and manipulatives or learning kits. RQ4, which focused on the challenges encountered in managing instructional resources, and analyzed using frequency counts and ranking to identify the most reported challenges and determine their relative significance.

Qualitative analysis was conducted for Research Questions 2 and 3. RQ2, exploring school heads' perceptions of resource sufficiency, and RQ3, examining how these perceptions influenced decision-making on resource allocation, distribution, and utilization, were primarily analyzed through focus group discussions conducted after the survey. Thematic analysis was used to identify patterns, insights, and explanations for the trends observed in the quantitative data. The survey's open-ended questions also provided supplementary qualitative information to inform the FGD discussions.

By analyzing the quantitative and qualitative data in sequential phases, the study provided a comprehensive understanding of instructional resource sufficiency and school heads' decision-making practices, integrating numerical trends with contextual insights derived from participants' experiences and perceptions.

➢ *Quantification and Interpretation of Variables*

The quantification of instructional resources based on school heads' perceptions is presented below, outlining the descriptive levels, their meanings in practice, and the standardized basis for interpreting the computed mean scores.

Table 1 Quantification of Variables on Perceiving the Level of Sufficiency of Instructional Resources

Level	Descriptor	Meaning in Practice
Very High (4.60-5.00)	Instructional resources are perceived as abundant, diverse, and fully aligned with learning needs.	School heads consistently report that materials (texts, visuals, technology, manipulatives) are more than adequate, accessible, and supportive of differentiated instruction. No gaps are noted; resources enhance engagement and mastery.
High (3.60-4.59)	Resources are sufficient and generally meet instructional requirements with minor limitations.	School heads feel well-supported, most lessons have appropriate materials. Occasional adjustments or supplementation may be needed, but overall effectiveness is not compromised.
Moderate (2.60-3.59)	Resources are adequate but uneven in quality, quantity, or accessibility.	Instructional delivery is possible, but teachers often need to improvise, adapt, or supplement. Learners may experience occasional difficulty accessing or fully benefitting from materials.
Low (1.60-2.59)	Resources are insufficient, frequently limiting instructional effectiveness.	School heads regularly encounter gaps - missing materials, outdated references, or limited access. Instructional goals are compromised, and reliance on teacher improvisation is high.
Very Low	Resources are severely lacking,	School heads perceive a critical shortage. Lessons cannot be delivered as

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(1.00-1.59)	hindering meaningful instruction and learning.	intended; equity and quality are undermined. Learning outcomes are at risk due to systemic resource inadequacy.

III. RESULTS AND DISCUSSION

Table 2 Perceived Level of Sufficiency of Print-Based Materials

Indicator	Mean	Description
Providing relevant supplementary reading materials appropriate to the number of learners and teachers	3.32	Moderate
• Ensuring possession of teachers' teaching guides and curriculum guides	3.32	Moderate
• Maintaining adequate supply of learning modules for learners	3.29	Moderate
• Ensuring availability of learners' modules	3.23	Moderate
• Providing textbooks aligned with the curriculum	3.03	Moderate
Average	3.24	Moderate

➢ *Moderate Level of Perceived Sufficiency of Instructional Learning Resources:*

The findings suggest that school heads in Sorsogon City perceive the sufficiency of print-based instructional materials as moderate. While schools have access to some teaching guides, curriculum guides, supplementary reading materials, and learner modules, gaps remain in the adequacy and alignment of resources, particularly textbooks aligned with the curriculum. This perception reflects that, although materials are present, they may not fully meet the demands of all learners and teachers, affecting instructional effectiveness.

These findings align with prior research emphasizing the central role of print-based materials in supporting foundational literacy and learning. Strouse, et al. (2024) noted that textbooks, worksheets, and other printed media provide structured content that learners can consult repeatedly, aiding comprehension and critical thinking. In under-resourced or rural classrooms, print materials remain particularly important because they do not require electricity or internet connectivity, ensuring continuity of learning (Teachers Institute, n.d.; 2023).

Local studies further highlighted the challenges in resource adequacy. Teves, Sampang, and Candelario (2025) stressed that insufficient access to modules and guides limits effective teaching, while Navarro (2022) pointed to regional disparities in classroom materials across the Philippines, indicating that available resources may not always match the needs of learners. These insights underscored that availability alone is insufficient; equitable distribution, alignment with curriculum, and timely provision are equally critical to support teaching and learning (UNESCO, 2022; ABS-CBN News, 2024).

In sum, the moderate perception of print-based resource sufficiency suggests progress in resource provision but also highlights persistent gaps that may impact instructional quality. Addressing these gaps requires strategic planning, systematic monitoring, and timely allocation to ensure that all learners and teachers have consistent access to high-quality print materials, particularly in schools where digital resources are limited.

Table 3 Perceived Level of Sufficiency of Digital and Multimedia Resources

Indicator	Mean	Description
Providing adequate availability of smart TV sets	3.44	Moderate
Ensuring accessibility of digital platforms (LMS…)	3.15	Moderate
Installing internet connectivity to the schools	2.88	Moderate
Providing teachers with laptops	2.50	Low
Ensuring learners' opportunity to engage with digital devices	2.00	Low
Average	2.80	Moderate

In terms of providing adequate availability of smart TV sets, the mean of 3.44 reflects a Moderate level. Smart TVs are generally available in schools, supporting instructional delivery, multimedia presentations, and visual engagement. However, the number of devices may not fully meet the needs of all classrooms, requiring careful scheduling or sharing.

The indicator on ensuring accessibility of digital platforms such as LMS and DepEd Commons received a mean of 3.15, also indicating a Moderate level. Most teachers can access these platforms, yet connectivity issues, limited training, or inconsistent use may hinder full utilization in instructional planning and learner engagement.

For installing internet connectivity in schools, the mean of 2.88 suggests a Moderate level as well. While some schools have functional internet access, coverage, speed, and reliability vary, limiting teachers' and learners' ability to consistently integrate online resources and digital learning activities.

The provision of teachers with laptops obtained a mean of 2.50, indicating a Low level. This shows that a significant number of teachers still lack personal laptops for

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instructional preparation, digital content creation, or participation in online professional development, which can affect the efficiency and quality of teaching.

Finally, ensuring learners' opportunities to engage with digital devices received the lowest mean of 2.00, also reflecting a Low level. This indicates that many learners have limited or no access to devices, restricting their exposure to digital learning, online research, and interactive educational tools. Such limitations may widen the gap in ICT literacy and digital competencies among students.

Overall, the Moderate average rating of 2.80, combined with Low scores in key indicators, highlights a partially functional ICT environment in schools. While some resources such as smart TVs and digital platforms are moderately available, there is a critical need to improve access to devices, internet connectivity, and learner engagement with technology to fully support modern instructional practices and enhance learning outcomes.

Table 4 Perceived Level of Sufficiency of Manipulative Learning Materials

Indicator	Mean	Description
Ensuring availability of mathematics manipulatives	3.29	Moderate
Providing adequate science manipulatives	3.21	Moderate
Ensuring physical education materials and equipment	2.26	Low
Securing adequate art and music materials	2.03	Low
Sustaining sufficiency of tools and equipment in TVL	2.00	Low
Average	2.56	Low

For ensuring availability of mathematics manipulatives, the mean of 3.29 described as Moderate level. Mathematics manipulatives are generally available, allowing teachers to conduct hands-on activities and facilitate conceptual understanding. However, the number or variety of manipulatives may not be sufficient to fully support all learners or lessons.

Similarly, providing adequate science manipulatives received a mean of 3.21, and described as Moderate level. Basic science materials are accessible and allow experiments and inquiry-based activities, yet some equipment or kits may be limited, requiring improvisation or sharing among learners.

The indicator on ensuring physical education materials and equipment obtained a mean of 2.26, indicating a Low level. This suggests that PE activities are constrained due to insufficient equipment, limiting opportunities for learners to actively participate in sports and physical exercises.

Securing adequate art and music materials received a mean of 2.03, also at a Low level. This reflects a critical shortage in art and music resources, which may hinder creative learning experiences and the development of learners' artistic skills.

Finally, sustaining sufficiency of tools and equipment in the TVL track obtained the lowest mean of 2.00, indicating a Low level. This shows that learners and teachers in the Technical-Vocational-Livelihood track face significant challenges in accessing the necessary tools and equipment for practical skills development.

Overall, the Low average rating of 2.56 highlights a constrained resource environment, particularly in PE, art, music, and TVL. While mathematics and science manipulatives are moderately available, the limited provision of other subject-specific materials underscores the need for targeted support to ensure equity, enhance hands-on learning, and improve instructional effectiveness.

- *School Heads' Perceptions of Instructional Learning Resource Sufficiency*

The thematic analysis of qualitative data revealed that school heads in Sorsogon City employ a combination of intuitive judgment, informal monitoring, stakeholder feedback, and formal evaluation procedures to assess the sufficiency of instructional learning resources. These strategies reflect both the adaptive approaches of school leaders and the practical challenges of managing limited resources within local schools.

Reliance on professional intuition underscores the experiential knowledge school heads bring to resource management. In the absence of formal tools or clear guidelines, principals draw on their observations and classroom experience to evaluate whether materials are adequate for teaching and learning. This approach aligns with literature emphasizing the role of leadership expertise in effectively allocating educational resources, particularly when standardized assessment frameworks are limited (Caldwell & Spinks, 2013; Krausen et al., 2018).

Informal monitoring, such as classroom walkthroughs and inventory checks, allows school heads to engage directly with instructional practices and identify gaps in resources. This hands-on approach demonstrates a proactive management style that complements formal evaluation methods and supports timely decision-making. Research indicates that active oversight by school leaders enhances resource utilization and ensures that instructional materials contribute meaningfully to student learning outcomes (Willis et al., 2019; Garcia et al., 2024).

The reliance on teachers' feedback and property custodian reports reflects a collaborative approach to resource management. By integrating information from

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multiple stakeholders, school heads can make informed decisions about replenishment, allocation, and prioritization of resources. Studies highlight that such participatory strategies strengthen resource management, promote transparency, and improve equity in access to learning materials (Dibessa, 2021; Kaur et al. 2019).

Finally, the use of formal evaluation procedures, including inventories, checklists, and DepEd manuals, provides a structured method for assessing the quantity, quality, and relevance of resources. Structured assessment aligns with international and local best practices that recommend systematic monitoring to optimize resource utilization and enhance instructional effectiveness (Plata et al., 2024; UNESCO, 2022).

Overall, the findings indicate that school heads combine experiential knowledge, collaborative input, and formal procedures to manage instructional resources effectively. While challenges such as limited budgets and uneven resource distribution persist, these adaptive strategies enable school leaders to maintain resource sufficiency and support teaching and learning within their schools. The study highlights the importance of leadership competencies, monitoring practices, and stakeholder collaboration in ensuring that available instructional materials are utilized efficiently to improve educational outcomes.

- *Influence of School Heads' Perceptions on Decision-Making for Resource Allocation, Distribution, and Utilization*

The analysis revealed that school heads' perceptions of instructional learning resources play a crucial role in guiding their decisions on allocation, distribution, and utilization of materials. These perceptions provide a framework for school leaders to identify gaps, prioritize needs, and make informed financial and operational decisions that ensure resources are used effectively.

Understanding the sufficiency of instructional materials enables school heads to identify gaps at both classroom and school levels, which informs communication with higher governance authorities. By recognizing shortages or inequities, school leaders can initiate actions such as resource-sharing among teachers and schools, seeking support from local partners, or requesting additional allocations in the Annual Improvement Plan (AIP) or Annual Procurement Plan (APP). This demonstrates how perceptions of resource sufficiency directly translate into proactive measures that address unmet needs and enhance resource availability.

Perceptions of adequacy also guide school heads in prioritizing the distribution of instructional resources. Decisions on allocation are influenced by factors such as curriculum requirements, subject-specific needs, and grade-level demands. Limited resources are thus strategically directed toward areas with the highest impact, ensuring that both teachers and learners benefit optimally. This approach reflects evidence from educational management literature indicating that resource distribution based on assessed needs enhances efficiency and supports instructional effectiveness (UNESCO, 2022; Willis et al., 2019).

Finally, school heads' perceptions inform financial planning and the appropriation of the Maintenance and Other Operating Expenses (MOOE) intended for instructional resources. Accurate assessment of resource sufficiency allows the school finance team to allocate funds appropriately for procurement, replenishment, and maintenance of instructional materials. This ensures that budgeting decisions are evidence-based, addressing both immediate classroom needs and longer-term instructional priorities. Studies on school leadership emphasize that informed financial management, grounded in resource assessment, strengthens accountability, maximizes resource utilization, and supports the overall quality of education (Caldwell & Spinks, 2019; Dibessa, 2021).

In general, the findings indicate that school heads' perceptions are not merely reflective but operational, shaping decision-making processes that influence resource allocation, equitable distribution, and effective utilization. By linking perception with action, school leaders play a pivotal role in ensuring that available instructional materials are used efficiently, gaps are addressed strategically, and financial resources are appropriately directed to support teaching and learning outcomes.

Table 5 Influence of School Heads' Perceptions on Decision-Making for Resource Allocation, Distribution, and Utilization

Challenges	Frequency	Rank
Absence of structured tools for tracking the adequacy of instructional learning materials	32	1
Limited provision and allotment of instructional learning materials	30	2
Limited school budget	29	3.5
Delayed procurement process	29	3.5
Substandard quality of delivered instructional learning materials	27	5
Delayed delivery of instructional learning materials	26	6

- *Challenges Encountered by the School Heads in Managing Instructional Resources*

The study revealed that school heads in Sorsogon City faced multiple challenges in managing instructional learning resources. Among these, the absence of structured tools for tracking the adequacy of instructional materials was the most frequently reported issue, followed by limited provision and allotment of materials, constrained school budgets, and delayed procurement processes. These findings align with national and international literature emphasizing

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the critical role of resource availability, accessibility, and management in achieving quality learning outcomes (UNESCO, 2022; World Bank, 2018).

- *Absence of Structured Tools for Tracking the Adequacy of Instructional Learning Materials*

The lack of structured monitoring tools reflected broader concerns about resource management and transparency in schools. Garcia et al. (2024) highlighted that effective use of learning resources requires clear guidelines, quality assurance mechanisms, and training programs, without which disparities and inefficiencies persist. Similarly, Trinidad (2020) noted the need for consistent monitoring practices to ensure equitable distribution of instructional materials, reinforcing the challenges faced by Sorsogon City school heads.

- *Limited Provision and Allotment of Instructional Learning Materials and Limited School Budget*

Limited provision and allocation of instructional resources are consistent with findings by Teves et al., (2025), who identified inadequate materials and unreliable infrastructure as barriers to effective teaching, particularly in early literacy and foundational skill development. These constraints are compounded by insufficient financial resources, a challenge noted both locally and globally (Espiritu, 2020; Malipot, 2023). Strategic allocation of funds is critical, yet school heads often prioritize infrastructure recovery or essential maintenance, leaving instructional materials underfunded (Jacob-Dedumo et al., 2024).

- *Delayed Procurement Process*

The challenge of delayed procurement further affects resource sufficiency and timely delivery. ABS-CBN News (2024) emphasized the importance of early procurement initiatives to ensure that textbooks, learning tools, and other essential materials are available when needed, highlighting the potential consequences of administrative delays. Without timely access, teachers are forced to adapt lesson delivery, which may compromise the quality of instruction and student engagement (Strouse et al., 2024).

Underlying these challenges are systemic issues, including budgetary limitations, disparities in national and regional resource allocation, and gaps in school leadership support for resource management (Willis et al., 2019). These systemic constraints mirror the findings of Ondong (2024) and Garcia et al. (2024), who reported that principals often rely on adaptive strategies, community support, and multitasking to address shortages and manage resources effectively.

The findings underscore that the management of instructional learning resources is a complex task requiring not only sufficient materials but also structured systems for tracking, equitable allocation, timely procurement, and strategic financial management. The challenges encountered by school heads in Sorsogon City reflect both localized operational realities and broader patterns observed in the Philippine educational context and comparable international studies (Navarro, 2022; UNESCO, 2023; Teves et al., 2025). Addressing these challenges requires integrated approaches that combine adequate funding, professional training, clear monitoring tools, and strategic leadership to optimize resource utilization for improved teaching and learning outcomes.

- *Proposed Evidence-Based Model for Instructional Learning Resource Management:*

The DARE-LRM Model, which stands for Diagnose, Analyze, Respond, and Evaluate for Learning Resource Management, is an evidence-based framework anchored on the study's findings regarding resource sufficiency and challenges encountered by school heads. In the Diagnose stage, school heads systematically assess the sufficiency, quality, and accessibility of print-based, digital, and manipulative resources, addressing gaps revealed by the lack of structured tracking tools. The Analyze stage involves examining diagnostic data to identify underlying constraints such as limited budgets, delayed procurement, or inequitable distribution, enabling informed prioritization of resources based on instructional impact and learner needs. In the Respond stage, school heads implement strategic interventions aligned with available resources and policies, including targeted procurement, budget optimization, resource sharing, and digitization, addressing differentiated levels of resource sufficiency across types. Finally, the Evaluate stage focuses on monitoring outcomes, reviewing utilization, and refining strategies to ensure continuous improvement and sustainability.

- *Theoretical Implications*

The study contributes to the theoretical understanding of instructional learning resource management by demonstrating how school heads' perceptions and practices influence the allocation, distribution, and utilization of resources. It reinforces existing theories on evidence-based decision-making and school-based management by showing that systematic monitoring, combined with informal and formal assessment, shapes resource sufficiency and utilization. Moreover, the study highlights the applicability of cyclical decision-making models, such as the proposed DARE-LRM Model, in linking perception, evaluation, and strategic action, thereby extending theoretical frameworks on effective school leadership and resource governance.

- *Practical Implications*

Practically, the findings provided actionable guidance for school leaders, teachers, and policymakers. School heads can apply the DARE-LRM Model to systematically identify gaps, analyze constraints, implement interventions, and evaluate outcomes, leading to more efficient and equitable resource management. Teachers and property custodians can use the insights to improve feedback and reporting systems, enhancing the accuracy of resource assessments. At the administrative level, the study informs policy and program implementation by emphasizing the importance of structured tracking, timely procurement, and resource allocation aligned with actual school needs.

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➢ *Limitations of the Study*

Despite its contributions, the study has limitations. The research relied on a sample of school heads within a single division, which may limit the generalizability of the findings to other regions or educational contexts. The use of self-reported perceptions and qualitative data introduces potential bias, as responses may reflect subjective judgment rather than objective measures of resource sufficiency. Additionally, the study focused on specific categories of instructional resources, leaving other materials or emergent digital tools less examined.

IV. FINDINGS, CONCLUSIONS, AND RECOMMENDATIONS

➢ *Findings*

The perceived level of sufficiency of print-based materials was moderate with an overall mean of 3.24. Likewise, digital and multimedia resources were perceived moderately sufficient, with an overall mean of 2.80. Manipulative learning materials reported the lowest perceived level of sufficiency with an overall mean of 2.56, interpreted as low.

School heads perceived the sufficiency of instructional learning resources through intuitive judgment, informal monitoring, teachers' feedback, property custodian reports, and formal evaluation procedures, suggesting that while multiple strategies are employed, reliance on intuition and informal feedback may lead to inconsistencies in resource allocation and highlights the need for more systematic, data-driven monitoring to ensure equitable access and support effective teaching and learning outcomes.

School heads' perceptions of instructional learning resources influenced their decision-making on resource allocation, distribution, and utilization. School heads used their perceptions on resource sufficiency to identify gaps across classroom and school levels, which informs communication with higher authorities, resource-sharing initiatives, and requests for support, ensuring that unmet needs are addressed promptly. Perceptions of resource adequacy guide the prioritization of distribution, as school heads allocate limited resources to high-priority areas based on curriculum demands, subject requirements, and grade-level needs, while encouraging teachers to innovate and optimize the use of available materials. These perceptions inform financial planning and appropriation, enabling school heads to guide the school finance team in allocating the Maintenance and Other Operating Expenses effectively, ensuring that procurement and budgeting decisions are evidence-based and aligned with actual resource needs.

Among the challenges encountered by school heads in managing instructional learning resources, the most frequent challenge was the absence of structured tools for tracking the adequacy of instructional learning materials, reported by 32 respondents and ranked first. This was followed by the limited provision and allotment of instructional learning materials, reported by 30 respondents and ranked second. Limited school budgets and delayed procurement processes were reported by 29 respondents each and both the third rank. Substandard quality of delivered instructional learning materials was reported by 27 respondents and ranked fifth. These findings indicate that school heads face obstacles in monitoring, planning, and ensuring the timely and equitable distribution of resources, which can affect the sufficiency and utilization of instructional materials in schools.

The proposed DARE-LRM Model is an evidence-based framework designed to guide school heads in making effective decisions on instructional learning resource management. It consists of four cyclical stages: Diagnose, Analyze, Respond, and Evaluate. The model emphasizes systematic identification of resource gaps, analysis of underlying constraints, implementation of targeted interventions, and continuous evaluation of outcomes.

➢ *Conclusions*

The sufficiency of instructional learning resources varies, with print-based and digital materials moderately available, while manipulative learning materials remain critically low.

School heads perceive resource sufficiency through a combination of intuitive judgment, informal monitoring, feedback from teachers and property custodians, and formal evaluation procedures.

The perceptions of school heads on resource adequacy directly guide decision-making on allocation, distribution, and financial planning to address gaps and prioritize high-need areas.

The challenges encountered by school heads in managing resources include the absence of structured tracking tools, limited provision of materials, constrained budgets, delayed procurement, substandard quality, and delayed delivery.

The DARE-LRM Model offers a cyclical, evidence-based framework that enables school heads to systematically diagnose, analyze, respond to, and evaluate instructional learning resources for effective and sustainable management.

➢ *Recommendations*

Prioritize the acquisition and equitable distribution of manipulative learning materials to ensure holistic support for all subjects and grade levels.

The assessment of resource sufficiency be conducted using a combination of experience, informal monitoring, stakeholder feedback, and formal evaluation procedures.

Decisions on allocation, distribution, and financial planning of instructional resources be guided by school heads' informed perceptions and evidence-based data.

The implementation of structured tracking tools, procurement process be followed strictly, and timely

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delivery of instructional resources be ensured to address challenges in resource management.

The adoption of the DARE-LRM Model be piloted and promoted to guide systematic, evidence-based management of instructional learning resources for continuous improvement and sustainability.

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