

Full Length Research Paper

Class Size and Caregivers' Management Planning and Organization of Early Childhood Classrooms in Public Childcare Centres in Rivers State

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ABSTRACT: This study investigated the influence of class size and caregivers' management planning and organization of early childhood classrooms for educational development in public childcare centres in Rivers State. The study adopted the descriptive survey design. The population of the study comprised of all the 1,119 caregivers in 521 early childcare centres in Rivers State. A total of 295 caregivers (171 handling large class sizes and 124 handling small class sizes) participated in the study. A validated structured questionnaire titled, "Class size and Caregivers' Classroom Management Planning and Organization Questionnaire" (CCCMP and OQ) was used for the study. The reliability of the instruments was established using the Cronbach's alpha reliability test and a reliability coefficient of 0.71 was obtained. This study was guided by 2 research questions and hypotheses each. The research questions were answered using mean and standard deviation, while the hypotheses were tested using the independent t-test at 0.05 level of significance. Results of the study revealed significant differences between the influence and large class size and small class sizes on the planning and organization of childhood classroom in public childcare centres in Rivers State. It was therefore recommended that, the Government should make haste to provide adequate classroom facilities to ensure that early childhood classrooms are not over crowded. Caregivers' should endeavor to begin the management of early childhood classroom with adequate planning and organization as well as ensure that the physical structures of the early childhood classroom are properly positioned for better management to ensure adequate teaching and learning.

Keywords: Class size, caregivers, classroom, planning, organization and childcare centres

INTRODUCTION

The academic outcome of preschoolers in terms of their all-round development is greatly hinged on the caregivers' ability to efficiently plan and organize activities in the early childhood classroom (Ganesha et al., 2012). Similarly, how the numerous intellectual skills such as language, verbal, numeracy and scientific skills of preschoolers are developed is a function of the

caregivers' planning and organizational skills. Therefore, when caregivers are embedded with the required classroom planning and organizational skills, they will be able to effectively coordinate the activities of teaching and learning in the class which will in turn translate into the actual acquisition of these developmental skills by the preschoolers. No meaningful learning can take place in a

classroom with an atmosphere that is not well planned and organized (Ganesh Bhatta et al., 2012).

According to Keller (2018) classroom management plan is a set of rules and procedures put in place to ensure efficient classroom management and it is the foundation to the educational system. These authors explained that a strong management plan will result in an efficient and engaged learning environment. Therefore, a classroom management plan is a necessity that every teacher must adhere to, for it is the law of the educational classroom. It is the plan that sets the expectations for every preschooler (Keller, 2018). Consequently, for a classroom management plan to be successful, there must be a complete understanding from the student on each of the guidelines set in place by the teacher or caregiver (Keller, 2018).

Classroom organization, focuses on the physical environment. Effective caregivers organize a safe classroom environment. It involves the caregiver to strategically place furniture and materials in learning centres in order to optimize preschoolers' learning and reduce distractions (Stronge et al., 2004). Similarly, the caregivers organizing function among others entails primarily the structuring of students or preschoolers into sub groups and defining of rules, as well as making preparations for the implementing of plans. Therefore, the organizing role expects teachers or caregivers to make arrangements and develop an orderly structure to combine all elements in the classroom activities into a unified whole (Ganesh Bhatta et al., 2012).

Class size refers to the number of students in a given course or classroom. Specifically, it could refer to the number of preschoolers a caregiver faces during a given period of instruction. It could also extend to the number of preschoolers participating in learning experiences that may not take place in a traditional classroom setting. It could also refer to the total number of preschoolers in a particular grade level or class in a school (Boozer and Rouse, 2001). Consequently, Adeyemi (2008), categorized two forms of class sizes that may exist in a preschool classroom situation, such as the large and small class size. Thus, the smaller the class size, the greater is the likelihood that a teacher will spend more time with individual pupils. However, large classes present more challenges for classroom planning and organization as caregivers are put under more strain when faced with this condition.

Blatchford and Lai (2012), opined that the number of pupils per caregiver is generally associated with class size and it is mainly believed that a classroom with a relatively small population will provide a better teaching and learning with less management planning and organizational challenges. In the case of Nigeria and Rivers State in particular, class size is normally used to compare with established national educational policy (FRN, 2004). The National policy on Education (FRN, 2004) in Nigeria recommended a teacher/student ratio of

25:1 for pre-primary school, 40:1 in the primary schools and 35:1 for secondary school but in the higher institution, there is no specific number. A low-class size suggests that each caregiver has to be responsible for a small number of preschoolers and it gives a higher relative access to pupils. A lower teacher/student ratio signifies smaller classes which have the tendency to enable the caregiver to pay more attention to individual preschoolers and this may enhance a better classroom planning and organization to achieve their educational development.

It is on the premise of the above situation that this study was initiated and seeks to investigate the influence of class size on caregiver's management planning and organization of early childhood classroom in public childcare centers in Rivers State. To fulfil the aim of this study, two research questions and hypotheses each were utilized.

Research questions

What was the influence of class size on caregivers' management planning of early childhood classroom in public childcare centres in Rivers State?

How does class size influence caregivers' classroom organization of early childhood classroom in public childcare centres in Rivers State?

Research hypotheses

There is no significant difference between the influence of large and small class sizes on caregivers' management planning of early childhood classroom in public childcare centres in Rivers State.

There is no significant difference between the influence of large and small class sizes on caregivers' classroom organization of early childhood classroom in public childcare centres in Rivers State.

METHODOLOGY

Research design

The descriptive survey research design was utilized for this study. This design was suitable for this study because, according to Ezeji (2004) it is one which involves the assessment of public opinion using collection of detailed descriptions of existing phenomena with the intent of using the data to justify current conditions and practices or to make better plans for improving phenomenal. This design is suitable for this study because it uses questionnaire to seek information from respondents.

Area of the study

The study area was River State in Nigeria. River State is one of the states in the Niger Delta Region situated at the South-south Geo-political zone of the Federal Republic of Nigeria. According to the census figure in 2006, the state has a population 5,198,716, making it the sixth most populated state in Nigeria (NPC, 2006). It shares a boundary to the North with Imo State, to the North-East with Abia State, to the East with Akwa Ibom State, to the South-West with Bayelsa State, to the North-West with Delta State and to the South with the Atlantic Ocean.

Population of the study

A total of one thousand one hundred and nineteen (1,119) caregivers in the entire five hundred and twenty-one (521) early childhood centers (often described as day-care centres, day nursery schools, nursery schools, or crèche) in Rivers State constituted the population of the study. This population comprised of only the caregivers of the public early childhood centers in Rivers State (RSUBEP, 2017/2018).

Sample and sampling technique

A total of three hundred (300) caregivers in the early childhood centers in Rivers State representing about 30% of the total population constituted the sample size for the study. The caregivers were disproportionately selected from the sampled childhood centers. The multi-stage sampling technique was adopted. First, the stratified sampling technique was used to divide the population of caregivers according to the childhood centers in the three senatorial districts (Rivers East, Rivers South and Rivers South West) and three (3) Local Government Areas (LGAs) was selected from each of the three senatorial districts. The simple random sampling technique was further used to select the three hundred (300) caregivers from the sampled early childhood centers through the adoption of the balloting procedure.

Instrument for data collection

The instrument used for data collection was a structured questionnaire, titled, "Class size and Caregivers' Classroom Management Planning and Organization Questionnaire" (CCCMP and OQ). The questionnaire comprised of three (3) sections A, B and C. Section A sort to obtain information on the Socio-demographic characteristics of the caregivers. Section B with 1- 5 item questions, elicit information on caregivers efficient Management planning strategies in early childhood classroom in early childhood centers. Section B with 6- 10 item questions, elicit information on caregivers' efficient organizational strategies in early childhood

classroom in early childhood centers. The instrument adapted a four-point Likert scale as the respondents were required to Strongly Agree (SA) – 4; Agree (A) – 3; Disagree (DA) – 2 or Strongly Disagree (SD) - 1

Validity and Reliability of the instrument

In order to establish the face and content validity of the instrument, a draft was given to three (3) experts: two (2) experts in the Department of Early Childhood and Primary Education, Ignatius Ajuru University of Education and the other one given to an expert in the Department of Early Childhood and Primary Education, University of Port Harcourt.

The reliability of the instrument titled, "Class size and Caregivers' Classroom Management Planning and Organization Questionnaire" (CCCMP and OQ) was ascertained by conducting a pilot study and analyzed by using the Cronbach's alpha reliability test model to measure the internal consistency and to obtain the reliability index for the instrument. A total of twenty (20) respondents were selected outside the population for the study. At the end of the study a reliability coefficient of 0.73 was obtained.

Procedure for data collection

The three hundred (300) questionnaires were distributed to the respondents through the assistance of three (3) research assistance. The respondents were guided and requested to respond to the questions in the questionnaire accordingly, having been assured of its confidentiality. Out of the three hundred (300) questionnaires distributed two hundred and ninety-five (295) questionnaires were received representing a percentage retrieval of 93.33%.

Procedure for data analysis

The data collected from the administration of the questionnaires were used to answer and test hypotheses formulated for the studies. The research questions were answered using the mean and standard deviation, while the hypotheses were tested using the independent t-test at the significant level of 0.05%.

RESULTS AND DISCUSSION

Presentation of results

Research question 1: What is the influence of class size on caregivers' management planning of early childhood classroom in public childcare centres in Rivers State?

Table 1: Mean and standard deviation on the influence of class size on caregivers' management planning of early childhood classroom in public childcare centres in Rivers State.

Caregivers' Classroom Planning	Large Class, N=171		Small Class, N=124	
	Mean	SD	Mean	SD
Classroom planning creates rule for smooth management of early childhood classroom	2.92	1.01	3.61	0.67
Planning sets the foundation for early childhood classroom management	2.95	0.90	3.60	0.68
The procedure for properly managing early childhood classroom is possibly through planning	2.57	1.11	3.18	1.02
A strong management plan will result in engaged learning environment	2.87	1.01	3.59	0.71
Class room management plan sets expectation for caregivers and preschoolers	2.66	1.12	3.31	0.93.
Grand mean	2.79	0.65	3.46	0.56

Criterion cut off = 2.5.

Table 2: Mean, standard deviation and independent sample t-test on the influence of class size on caregivers' management planning of early childhood classroom in public childcare centres in Rivers State

Caregivers' Classroom Planning	Large Class, N=171		Small Class, N=124		df = 293	
	Mean	SD	Mean	SD	t	p-value
Classroom planning creates rule for smooth management of early childhood classroom	2.92	1.01	3.61	0.67	-6.60	0.00
Planning sets the foundation for early childhood classroom management	2.95	0.90	3.60	0.68	-6.81	0.00
The procedure for properly managing early childhood classroom is possibly through planning	2.57	1.11	3.18	1.02	-4.77	0.00
A strong management plan will result in engaged learning environment	2.87	1.01	3.59	0.71	-6.86	0.00
Class room management plan sets expectation for caregivers and preschoolers	2.66	1.12	3.31	0.93	-5.25	0.00
Grand mean	2.79	0.65	3.46	0.56	-9.13	0.00

Table 3: Mean and standard deviation on the influence of class size on caregivers' classroom organization of early childhood classroom in public childcare centres in Rivers state.

Caregivers' Classroom Planning	Large Class, N=171		Small Class, N=124	
	Mean	SD	Mean	SD
Classroom organization focuses on physical arrangement of the early childhood learning environment	3.13	0.92	3.91	0.29
A well-organized early childhood early childhood classroom ensures safety of preschoolers	2.85	0.94	3.80	0.48
A decently organized early childhood classroom reduces learning distractions	2.92	0.96	3.93	0.29
A well-organized early childhood classroom ensures effective communication and optimize learning	2.97	0.94	3.68	0.56
A flexible organized classroom enhances caregiver preschooler relationship	2.96	0.94	3.68	0.56
Grand mean	2.97	0.55	3.85	0.19

Criterion cut off = 2.5

Table 1 shows that the mean and standard deviation on the influence of class size on caregivers' management planning of early childhood classroom in public childcare centres in Rivers state were 2.79, SD=0.65 and 3.46, SD=0.56 for large and small class size respectively. The key management planning for large class size was that planning sets the foundation for early childhood classroom management (M=2.95, SD=0.90) whereas that for small class size was that classroom planning creates rules for caregivers' smooth management of early childhood classroom (M=3.61, SD).

H₀₁: There is no significant difference between the influence of large and small class size on caregivers' management planning of early childhood classroom in public childcare centres in Rivers State.

Table 2 shows the mean, standard deviation and independent sample t-test on the influence of class size on caregiver' management planning of early childhood classroom in public childcare in Rivers State were 2.79, SD = 0.65 and 3.46, SD = 0.56 for large and small class

size respectively. The key management planning for large class size was that planning set the foundation for early childhood classroom management (M = 2.95, SD = 0.90) whereas that for small class size was that classroom planning creates rules for caregiver's smooth management of early childhood classroom (M = 3.61, SD = 0.67). The result of the independent sample t-test showed that there is a significant difference between the influence of large and small class sizes on caregivers' management planning of early childhood classroom in public childcare centers in Rivers state (df = 293, F= 9.13: $P < .05$). The null hypothesis was rejected at the 0.05 alpha levels.

Research question 2: How does class size influence caregivers' classroom organization of early childhood classroom in public childcare centres in Rivers State?

Table 3 shows that the mean and standard deviation on the influence of class size on caregivers' classroom organization of early childhood classroom in public childcare centres in Rivers State were 2.97, SD = 0.55

Table 4: Mean, standard deviation and independent sample t-test on the influence of class size on caregivers' classroom organization of early childhood classroom in public childcare centres in Rivers State.

Caregivers' Classroom Planning	Large Class, N=171		Small Class, N=124		df = 293	
	Mean	SD	Mean	SD	t	p-value
Classroom organization focuses on physical arrangement of the early childhood learning environment	3.13	0.92	3.91	0.29	-9.18	0.00
A well-organized early childhood classroom ensures safety of preschoolers	2.85	0.94	3.80	0.48	-10.29	0.00
A decently organized early childhood classroom reduces learning distractions	2.92	0.96	3.93	0.29	-11.33	0.00
A well-organized early childhood classroom ensures effective communication and optimize learning	2.97	0.94	3.92	0.30	-10.88	0.00
A flexible organized classroom enhances caregiver preschooler relationship	2.96	0.94	3.68	0.56	-7.52	0.00
Grand mean	2.97	0.55	3.85	0.19	-17.02	0.00

and 3.85, SD = 0.19 for large class size was that classroom organization focuses on the physical arrangement of the early childhood learning environment (M=3.13, SD=0.92) whereas that for small class size was a decently organized early childhood classroom reduces learning distractions (M=3.39, SD = 0.29).

H₀₂: There is no significant difference between the influence of large and small class sizes on caregivers' classroom organization of early childhood classroom in public childcare centres in Rivers state.

Table 4. shows that the mean, standard deviation and independent sample t-test on the influence of class size on caregivers' classroom organization of early childhood classroom in public childcare centres in Rivers state were 2.97, SD = 0.55 and 3.85, SD = 0.19 for large and small class size respectively. The key caregivers' classroom organization for class size was that classroom organization focuses on the physical arrangement of the early childhood learning environment (M = 3.13, SD = 0.92) whereas that for small class size was a decently organized early childhood classroom reduces learning distractions (M = 3.93, SD = 0.29). the result of the independent sample t-test showed that there is a significant difference between the influence of large and small class sizes on caregivers' classroom organization of early childhood classroom in public childcare centres in Rivers State (df = 293, F = 17.02, P< 0.05). the null hypothesis was rejected at 0.05 alpha levels.

Influence of class size on caregivers' management planning of early childhood classroom in public childcare centres in Rivers State.

Finding in (Table 2) shows that the mean, standard deviation and independent sample t-test on the influence of class size on caregivers' management planning of early childhood classroom in public childcare centres in Rivers State were 2.79, SD = 0.65 and 3.46, SD = 0.56 for large and small class size respectively. The key management planning for large class size was that Planning sets the foundation for early childhood classroom management (M = 2.95, SD = 0.90) whereas that for small class size was that Classroom planning

creates rules for caregivers' smooth management of early childhood classrooms (M =3.61, SD = 0.67). The result of the independent sample t-test showed that there is a significant difference between the influence of large and small class size on caregivers' management planning of early childhood classroom in public childcare centres in Rivers State (df = 293, F = 9.13, P< 0.05). The null hypothesis was rejected at 0.05 alpha levels. The finding indicated that there is considerable difference in planning a large and small early childhood classroom by preschoolers as small class size tends to make planning easier as compared to large class size. This finding is consistent with that of Adeyemi (2008) who in a study on the influence of class-size on the planning and quality of output revealed that schools having an average class-size of 35 and below were better planned and obtained better results in the Senior Secondary Certificate (SSC) examinations than schools having more than 35 students per class indicating a better planning and quality output. The mean scores were higher in schools having an average class size of 35 and below. The interviewees' responses supported the findings as they supported small class-sizes in schools. Ayeni and Olowe (2016), also in a study on the implication of Large Class Size in the planning, teaching and learning revealed that large class size has negative implications on effective planning, teaching and learning of Business Education in tertiary institutions. The relationship between large class and effective planning, teaching and learning is low. Ruggles, (2003) concluded that class size reduction programs, aided teacher preparation or planning, curriculum and early childhood education.

Influence of class size on caregivers' classroom organization of early childhood classroom in public childcare centres in River State.

Results in (Table 4) shows that the mean, standard deviation and independent sample t-test on the influence of class size on caregivers' classroom organization of early childhood classroom in public childcare centres in Rivers State were 2.97, SD = 0.55 and 3.85, SD = 0.19 for large and small class size respectively. The key caregivers' classroom organization for large class size was that Classroom organization focuses on the physical

arrangement of the early childhood learning environment ($M=3.31$, $SD = 0.92$) whereas that for small class size was a decently organized early childhood classroom reduces learning distraction ($M = 3.93$, $SD = 0.29$). The result of the independent sample t-test showed that there is a significant difference between the influence of large and small class sizes on caregivers' classroom organization of early childhood classroom in public childcare centres in Rivers State ($df = 293$, $F = 17.02$, $P < 0.05$). The null hypothesis was rejected at 0.05 alpha levels. The result implied the organization of early childhood classroom is greatly dependent on the size of the classroom as the small class sizes appears to favour effective organization of the early childhood classroom in contrast to large class size. This result agrees with that of Blatchford and Lai (2012) who conducted a study on examining the effect of class size on classroom engagement, organization and teacher-pupil interaction and reported that classroom engagement and organization decreased in larger classes but contrary to expectation, this was particularly marked for lower attaining pupils. Low attaining pupils can therefore benefit from smaller classes in terms of more individual attention and facilitating engagement and organization in learning. Kabunga and Kihoro (2016), investigated the effect of Class size on classroom organization and Learning Outcomes and concluded that class size in isolation cannot have an impact on learners' achievement. It should be complemented by classroom organization, quality teacher preparation, more individualization, provision of resources and improving the quality of interaction in the classroom. The study recommended hiring of more Early Childhood Education teachers to reduce class sizes and therefore improve classroom organization and learning outcomes. Moluayonge and Park (2017) were of the view that challenges associated with the size of a class have an effect on the teaching practices of a science teacher and the organization of the classroom.

Conclusion

Conclusively, the findings from this study indicated that there were significant differences between the influence of large and small sizes on caregivers' classroom management planning and caregivers' classroom organization of early childhood centres in Rivers State. Consequently, it was explicitly clear that small class sizes of preschoolers had a better influence on the caregivers' ability to effectively plan and organize early childhood classrooms in public childcare centres in River State.

Recommendations

The Government should make haste to provide adequate classroom facilities to ensure that early childhood

classrooms are not over crowded.

Caregivers' should endeavor to begin the management of early childhood classroom with adequate planning and organization.

Caregivers' should ensure that the physical structures of the early childhood classroom properly positioned for better management.

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