

CHAPTER III

METHODOLOGY

3.1. Introduction

The plan and procedure are the pillars of success in every successful activity. Research methodology is a crucial component of every research activity. Research encounters a series of steps, which include the selection of a research topic, the formulation of research questions that determine the nature of the problem to be carried out in the planned study, and the objectives intended to be achieved through the study. It is also through the research methodology that the audience gets detailed explanations about the techniques of sample selection, the determination of the population of the Study, the construction of suitable tools for data collection, the procedures of data collection, and the in-depth data analysis plan. Thus, the researcher used the following methodology to conduct a study on educational practices in the post-fundamental schools of Burundi.

3.2. Research Design

The study followed a descriptive survey method. According to Siedlecki (2020), descriptive studies describe people, things, or circumstances in their natural settings. They examine a population's characteristics, problems within a group, organisation, or population, or differences in traits or customs between institutions or nations.

3.3. Population of the Study

The population for the present study consisted of all the post-fundamental schools of Burundi. The illustration of the said population can be seen in the following table:

Table 3.1: Population of the Study Province-Wise

The population of the present study per province				
Series	Provinces	Total number of schools	Total number of students	Total Number of Principals

1	Bubanza	38	7952	38
2	Bujumbura	62	18642	62
3	Bujumbura-Mairie	59	39050	59
4	Bururi	69	26872	69
5	Cankuzo	31	5763	31
6	Cibitoke	49	12891	49
7	Gitega	112	20011	112
8	Karusi	39	8653	39
9	Kayanza	56	12845	56
10	Kirundo	39	7480	39
11	Makamba	86	10926	86
12	Muramvya	39	12374	39
13	Muyinga	54	14900	54
14	Mwaro	45	15661	45
15	Ngozi	61	19312	61
16	Rumonge	60	13361	61
17	Rutana	56	7581	56
18	Ruyigi	46	7460	46
19	Total	1001	261734	1001

3.4. Sample of the Study

During the study, the researcher applied a stratified random sampling technique. Burundi's eighteen (18) provinces were divided into four zones, i.e., North, South, East, and West. The researcher randomly selected one province in each zone, of which twenty per cent (20%) of the total schools were chosen to constitute the study's sample. The study sample was all the principals and ten (10) students, teachers, and parents from each selected school. The numbers stated in the following chart constituted the study's final sample.

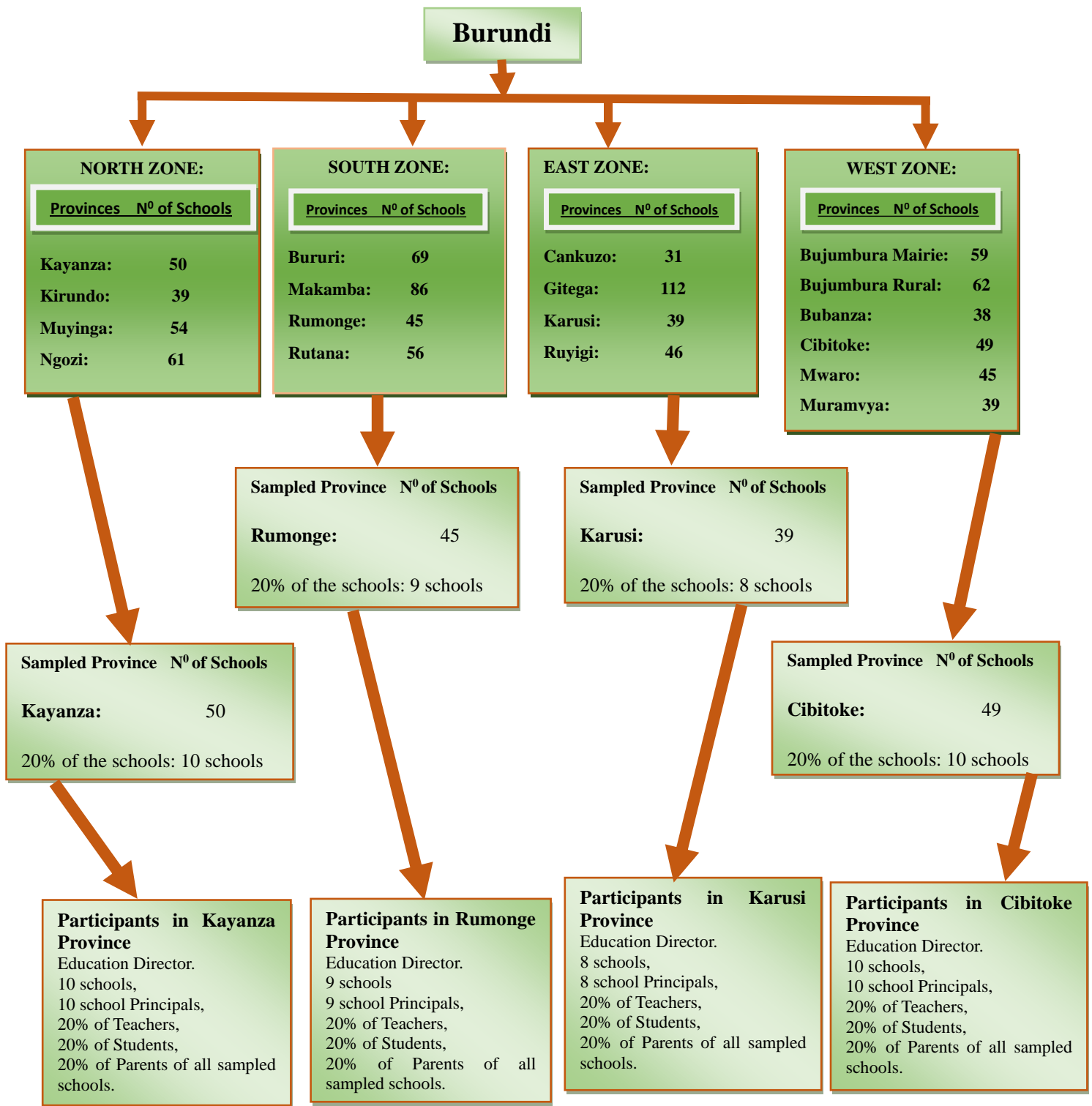


Chart 2: Overall Sample Selection Procedure

Table 3.2: Final Sample of Participants Per Province

Provinces	CIBITOKE	KARUSI	KAYANZA	RUMONGE	Total
Participants					
Number of Schools	10	8	10	9	37
Education Directors	1	1	1	1	4
Principals	10	8	10	9	37
Teachers	98	72	92	83	345
Students	105	92	112	96	405
Parents	114	81	120	80	395
Total	328	254	335	269	1186

3.5. Description of Tools

Tools are imperative to carry out a study requiring data collection. A good tool procures accurate data from respondents and helps the researcher ease the work, targeting the generation of new findings/theories. For the present study, the researcher used the following tools:

1. Questionnaires;
2. Perception scales;
3. Observation schedule;
4. Semi-Structured Interviews.

For the researcher to carry out a study examining the educational practices in the post-fundamental schools of Burundi, the construction of the tools mentioned above was among other requirements. According to those who participated in the study, some provided data through questionnaires, while others performed the same task through perception scales, observation schedules and interviews. It should be noted that some participants used more than one tool to provide data regarding the topic under Study. The following table shows the objectives each tool targeted, their corresponding data collection tools, and the participants.

Table 3.3: Synoptic View and Sources of Data Objective-Wise

Objectives	Tools	Participants
Objective 1		
To examine the educational practices in the post-fundamental schools of Burundi with respect to: (viii) Curriculum; (ix) Pedagogy; (x) Evaluation procedure; (xi) School infrastructure; (xii) Administrative practices; (xiii) Human resources; (xiv) Community participation.	Semi-Structured Interview	1. Provincial Director of Education
	Questionnaire	2. Principals 3. Teachers
	Observation Scale	1. Researcher
Objective 2	Perception Scale	1. Principals
To measure the perception of teachers, students, principals, and parents towards educational practices in the post-fundamental schools of Burundi.		2. Teachers 3. Students 4. Parents
Objective 3	Semi-Structured Interview	1. Provincial Director of Education
To study the problems encountered in the educational practices by the stakeholders of the post-fundamental schools of Burundi.		2. Principals 3. Teachers
Objective 4	Semi-Structured Interview	1. Provincial Director of Education
To suggest measures for improving various educational practices by different stakeholders in the post-fundamental schools of Burundi.		2. Principals 3. Teachers

3.6. Questionnaire for Teachers and Principals

The researcher constructed the questionnaire for teachers and principals to collect data related to educational practices performed in the post-fundamental schools of Burundi. The questionnaire focused on aspects including curriculum, pedagogy, evaluation procedures, school infrastructure, administrative practices, human resource management, and community participation. Due to the nature of the questions, the questionnaire included questions arranged in a logical order, as subsequent answers to some questions were just follow-ups of the previous ones.

3.6.1. Questionnaire for Teachers

The questionnaire for teachers included open-ended and closed-ended questions. It comprised 98 questions for the six (6) dimensions except school infrastructure. All the questions under objective one were close-ended, as they had options for answers except those under the school infrastructure dimension, which consisted of observing what was available in each sampled school through an observation schedule. Questions under objectives three (3) and four (4) were all open-ended, as the respondents were requested to find out the problems found in Burundi's post-fundamental schools and suggest strategies for improving the situation.

Table 3.4: Dimensions and Components in Questionnaire for Teachers

Series	Dimension	Components	Questions Number	Number of Questions
1	Curriculum	<ul style="list-style-type: none"> ❖ Curriculum objectives ❖ Curriculum content and implementation ❖ Co-curricular activities ❖ Curriculum evaluation 	<p>Q1-Q2</p> <p>Q1-Q11</p> <p>Q1-Q6</p> <p>Q1-Q7</p>	26
2	Pedagogy	<ul style="list-style-type: none"> ❖ Types of teaching methods ❖ Resources used in teaching ❖ Teaching-learning techniques. 	Q1-Q9	9
3	Evaluation Procedures	<ul style="list-style-type: none"> ❖ Types and Frequency of Assessments 		6

		❖ Motivation of students through evaluation	Q1-Q6	
4	Administrative Practices	❖ Admission Procedures ❖ Recruitment Procedures ❖ Supervision Procedure ❖ Grievance Redressal	Q1-Q7 Q1-Q7 Q1-Q4 Q1-Q3	21
5	Human Resource Management	❖ Teaching Staff Qualifications ❖ Professional Development ❖ Working Conditions	Q1-Q8 Q1-Q5 Q1-Q7	20
6	Community Participation	❖ Parents Involvement ❖ Parent-Teacher Association ❖ School Industry Interface	Q1-Q5 Q1-Q5 Q1-Q3	13

3.6.2. Questionnaire for Principals

The questionnaire for principals presented huge similarities with the one for teachers. They were set to be administered to the same respondents, except for some differences in the formulation of questions. The questionnaire for principals was made of 115 questions and was meant to cover six (6) dimensions of the study, excluding the school infrastructure, which was performed under the observation schedule. The questionnaire included open-ended and closed-ended questions. All the questions under objective one were close-ended, as they had options for answers. Questions under objectives three (3) and four (4) were all open-ended, as the respondents were requested to find out the problems found in Burundi's post-fundamental schools and suggest strategies for improving the situation.

Table 3.5: Dimensions and Components in Questionnaire for Principals

Series	Dimension	Components	Questions Number	Number of Questions
1	Curriculum	<ul style="list-style-type: none"> ❖ Curriculum objectives ❖ Curriculum content and implementation ❖ Co-curricular activities ❖ Curriculum evaluation 	<p>Q1-Q2</p> <p>Q1-Q10</p> <p>Q1-Q6</p> <p>Q1-Q7</p>	25
2	Pedagogy	<ul style="list-style-type: none"> ❖ Types of teaching methods ❖ Resources used in teaching ❖ Teaching-learning techniques. 	Q1-Q9	9
3	Evaluation Procedures	<ul style="list-style-type: none"> ❖ Types and Frequency of Assessments ❖ Motivation of students through evaluation 	Q1-Q6	6
4	Administrative Practices	<ul style="list-style-type: none"> ❖ Admission Procedures ❖ Recruitment Procedures ❖ Supervision Procedure ❖ Financial Management ❖ Grievance Redressal 	<p>Q1-Q7</p> <p>Q1-Q9</p> <p>Q1-Q4</p> <p>Q1-Q9</p> <p>Q1-Q4</p>	33
5	Human Resource Management	<ul style="list-style-type: none"> ❖ Teaching Staff Qualifications ❖ Non-teaching staff management ❖ Professional Development ❖ Working Conditions 	<p>Q1-Q10</p> <p>Q1-Q4</p> <p>Q1-Q6</p> <p>Q1-Q9</p>	29
6	Community Participation	<ul style="list-style-type: none"> ❖ Parents Involvement ❖ Parent-Teacher Association ❖ School Industry Interface 	<p>Q1-Q5</p> <p>Q1-Q5</p> <p>Q1-Q3</p>	13

3.6.3. Observation Schedule

During data collection, under the dimension of School Infrastructure, no questions were prepared to avoid information bias. Instead, an observation schedule was set to observe and note down which school materials and infrastructure are available in each sample school. Four aspects were studied: rooms, furniture, ICT facilities, documents, leisure, and hygienic facilities. The details are shown in the following chart and table.

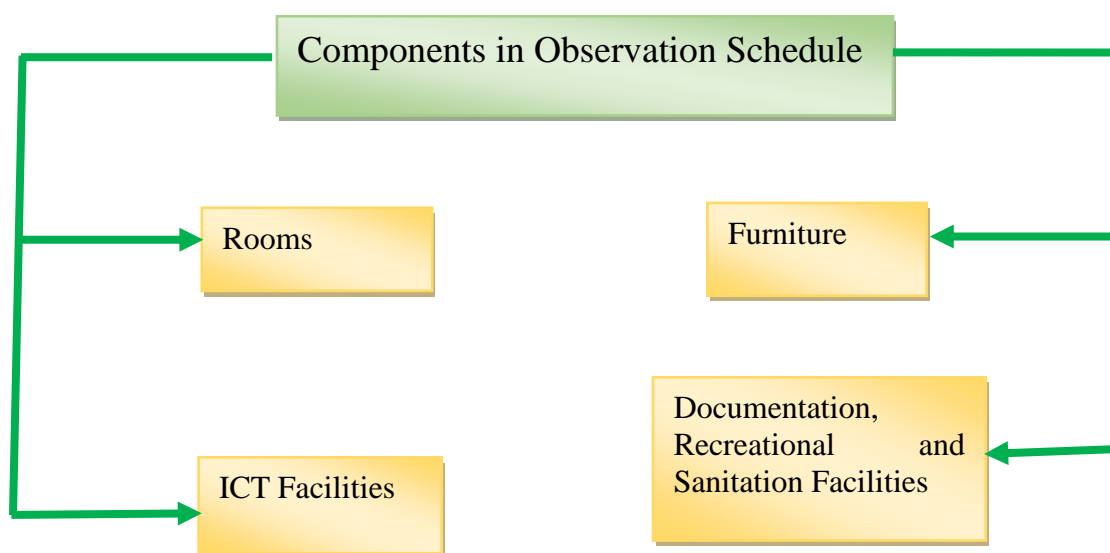


Chart 3: Components in Observation Schedule

Observation Schedule to Monitor the School Infrastructure

Table 3.6. Observation Schedule to Monitor the Rooms

Sr. N°	Infrastructures	Availability		Quantity	Adequacy			Remarks
		Yes	No		Less	Adequate	More	
1	Spacious and lightened classes							
2	Assembly hall							
3	Auditoriums with ICT Installations							
4	Well-equipped library							

5	Well-equipped laboratory							
6	Store for storage(s)							
7	Guidance and Counselling Centre							

Table 3.7: Observation Schedule to Monitor the Furniture

Sr. N ^o	Infrastructures	Availability		Quantity	Adequacy			Remarks
		Yes	No		Less	Adequate	More	
1	Teachers rooms							
2	Teachers tables							
3	Teachers chairs							
4	Shelves							
5	Students desks							
6	Cupboards							
7	Writing boards							
8	Notice board							
9	Any Other							

Table 3.8: Observation Schedule to Monitor the ICT Facilities

Sr. N ^o	Infrastructures	Availability		Quantity	Adequacy			Remarks
		Yes	No		Less	Adequate	More	
1	ICT Laboratory							
2	Class projector							
3	Digital writing board							
4	Scanner							
5	Printer							
6	Laptops							
7	Desktop							
8	Telephone							
9	Film							
10	Internet							

Table 3.9: Observation Schedule to Monitor Documents, Recreational, and Sanitation Facilities

Sr. N ^o	Infrastructures	Availability		Quantity	Adequacy			Remarks
		Yes	No		Less	Adequate	More	
1	Teachers books							
2	Students books							
3	Preparation books							
4	Curriculum copy							
5	School regulations							
6	Daily/weekly newspapers							
7	Playgrounds and halls							
8	Sport items facilities							
9	Staff Sanitation facility							
10	Students sanitation facility							
11	Drinking Water Facility							
12	Files of records							
13	Any other							

Table 3.10: Components of Observation Schedule

Series	Components	Description	Item Number	Number of Items
1	Rooms	<ul style="list-style-type: none"> ❖ Spacious and lightened classes ❖ Assembly hall ❖ Auditoriums with ICT Installations ❖ Well-equipped library and labs ❖ Guidance and Counselling Centre 	1-7	7
2	Furniture	<ul style="list-style-type: none"> ❖ Teachers' tables, chairs, Shelves, students desks, Cupboard, Writing Board, and Notice Board 	1-9	9

3	ICT Facilities	❖ ICT Laboratory, Class projector, Digital writing board, Scanner, Printer, Laptops, Desktops, Phone, Internet.	1-10	10
4	Documentations, Recreational and Sanitation Facilities	Teachers' books, students' books, preparation books, curriculum copy, school regulations, newspapers, playground, sports items and facilities, staff and students sanitation.	1-13	13

3.6.4. Perception Scales

The perception scales implemented within the current study comprised the perception scale for principals, the perception scale for teachers, the perception scale for parents, and the perception scale for students. These four (4) perception scales were related to the following aspects: curriculum, pedagogy, Evaluation procedures, school infrastructure, administrative practices, human resource management, and community participation in school activities. These perception scales aimed to measure the perception of teachers, students, principals, and parents towards educational practices in the post-fundamental schools of Burundi.

3.6.4.1. Scoring Key

The perception scales were made of five (5) Likert scales arranged from strongly agree to strongly disagree. Each statement had five points for ratings 5,4,3,2,1, representing Strongly Agree (**S.A.**), Agree (**A**), Undecided (**U.D.**), Disagree (**D**), and Strongly Disagree (**S.D.**). The perception scales comprised 30 items for teachers and principals and 25 for students and parents, and no time was allocated to fill out the scale. A copy of each perception scale is attached in the Appendix.

3.6.4.2. Perception Scale for Teachers

The teachers' perception scale considered the aspects related to curriculum, pedagogy, Evaluation procedures, school infrastructure, administrative practices, human resource management, and community participation in school activities in its content. Teachers are one of the critical

components of the teaching-learning environment, as they are aware of every detail related to teaching, teachers and school management, from learning to students' regulatory measures.

Table 3.11: Dimensions and Components of Perception Scale for Teachers

Series	Dimension	Components	Item Number	Number of Items
1	Curriculum	<ul style="list-style-type: none"> ❖ Curriculum relevance ❖ Subjects continuity ❖ Connection of curriculum objectives to societal needs ❖ Knowledge of the curriculum aim ❖ Need for co-curricular activities. 	1-5	5
2	Pedagogy	<ul style="list-style-type: none"> ❖ Pedagogy appropriateness ❖ Innovation in teaching methods ❖ ICT integration in class activities ❖ Use of new teaching methods ❖ Preparation of students for real-world challenges. 	6-10	5
3	Evaluation procedures	<ul style="list-style-type: none"> ❖ Fairness of students' assessment ❖ Regularity of formative assessment ❖ Motivation of students through evaluation ❖ Change of teaching method based on assessments ❖ Evaluation of the assessment style. 	11-15	5
4	School Infrastructure	<ul style="list-style-type: none"> ❖ Effective utilisation of school facilities ❖ Adequacy of school infrastructure ❖ Availability of guidance and counselling centres 	16-20	5

		<ul style="list-style-type: none"> ❖ Quality and management of school canteen ❖ Overcrowdness of schools. 		
5	Administrative Practices & Human Resource Management	<ul style="list-style-type: none"> ❖ Appreciation of teachers' performance ❖ Participation in professional development programmes ❖ Effectiveness of teachers ❖ Recognition of non-teaching staff in schools ❖ Teachers' salary satisfaction. 	21-25	5
6	Community Participation	<ul style="list-style-type: none"> ❖ Involvement of parents in school activities ❖ Effectiveness of parents' involvement in school activities ❖ Creation of parents-teachers association ❖ Regularity of parents-teachers association meetings ❖ Effectiveness of school-industry interface. 	26-30	5

3.6.4.3. Perception Scale for Principals

The perception scale for principals aimed to assess the perceptions of school principals on the seven (7) aspects under study, i.e. curriculum, pedagogy, evaluation procedures, school infrastructure, administrative practices, human resource management, and community participation in school activities. Principals, as crucial actors in any educational institution, have expressed their perceptions of educational practices in the post-fundamental schools of Burundi. The dimensions and components they expressed their perceptions are given in the table below.

Table 3.12: Dimensions and Components of Perception Scale for Principals

Series	Dimension	Components	Item Number	Number of Items
1	Curriculum	<ul style="list-style-type: none"> ❖ Curriculum relevance ❖ Subjects continuity ❖ Connection of curriculum objectives to societal needs ❖ Knowledge of curriculum aim ❖ Need for co-curricular activities. 	1-5	5
2	Pedagogy	<ul style="list-style-type: none"> ❖ Pedagogy appropriateness ❖ Innovation in teaching methods ❖ ICT integration in class activities ❖ Use of new teaching methods ❖ Preparation of students for real-world challenges. 	6-10	5
3	Evaluation procedures	<ul style="list-style-type: none"> ❖ Fairness of students' assessment ❖ Regularity of formative assessment ❖ Motivation of students through evaluation ❖ Change in teaching methods based on assessments ❖ Evaluation of the assessment style. 	11-15	5
4	School Infrastructure	<ul style="list-style-type: none"> ❖ Effective utilisation of school facilities ❖ Adequacy of school infrastructure ❖ Availability of guidance and counselling centres ❖ Quality and management of school canteen ❖ Overcrowdness of classes. 	16-20	5

5	Administrative Practices & Human Resource Management	<ul style="list-style-type: none"> ❖ Appreciation of teachers' performance ❖ Participation in professional development programmes ❖ Effectiveness of teachers ❖ Recognition of non-teaching staff in schools ❖ Teachers' salary satisfaction. 	21-25	5
6	Community Participation	<ul style="list-style-type: none"> ❖ Involvement of parents in school activities ❖ Effectiveness of parents' involvement in school activities ❖ Creation of parents-teachers association ❖ Regularity of parents-teachers association meetings ❖ Effectiveness of school-industry interface. 	26-30	5

3.6.4.4. Perception Scale for Students

The perception scale for students was focused on collecting the perceptions from the critical components of the learning situation: students regarding curriculum, pedagogy, evaluation procedures, school infrastructure, and community participation in school activities. Even though they are involved in every procedure and activity of the school, students cannot understand how administrative tasks are performed or how school teaching and non-teaching staff are managed. Therefore, the researcher did not mention any item related to those two (2) aspects in the students' perception scale.

Table 3.13: Dimensions and Components of Perception Scale for Students

Series	Dimension	Components	Item Number	Number of Items
1	Curriculum	<ul style="list-style-type: none"> ❖ Curriculum relevance ❖ Subjects continuity ❖ Connection of curriculum objectives to societal needs ❖ Knowledge of the curriculum aim ❖ Importance of co-curricular activities. 	1-5	5
2	Pedagogy	<ul style="list-style-type: none"> ❖ Pedagogy appropriateness ❖ Innovation in teaching methods ❖ ICT integration in class activities ❖ Use of new teaching methods ❖ Preparation of students for real-world challenges. 	6-10	5
3	Evaluation procedures	<ul style="list-style-type: none"> ❖ Fairness of students' assessment ❖ Regularity of formative assessment ❖ Motivation of students through evaluation ❖ Change in teaching methods based on assessments ❖ Evaluation of the assessment style. 	11-15	5
4	School Infrastructure	<ul style="list-style-type: none"> ❖ Effective utilisation of school facilities ❖ Adequacy of school infrastructure ❖ Availability of guidance and counselling centres ❖ Quality and management of school canteen 	16-20	5

		❖ Overcrowdness of schools.		
5	Community Participation	<ul style="list-style-type: none"> ❖ Involvement of parents in school activities ❖ Effectiveness of parents' involvement in school activities ❖ Creation of parents-teachers association ❖ Regularity of parents-teachers association meetings ❖ Effectiveness of school-industry interface. 	21-25	5

3.6.4.5. Perception Scale for Parents

The perception scale for parents focused on curriculum, pedagogy, school infrastructure, administrative practices, and community participation in school activities. The Evaluation procedures and human resources management aspects were not included in the parent's perception scale, given that parents are not in an excellent position to monitor the school's assessment implementation. Also, asking parents how schools manage their human resources will be unethical as they cannot intervene in managing schools' teaching and non-teaching staff. However, curriculum and pedagogy are aspects that are strange to some parents. Still, their children discuss with them daily the content taught and how it is implemented. Thus, they were subject to express what they perceived on the same. The details are given in the below table.

Table 3.14: Dimensions and Components of Perception Scale for Parents

Series	Dimension	Components	Item Number	Number of Items
1	Curriculum	<ul style="list-style-type: none"> ❖ Curriculum relevance ❖ Subjects continuity ❖ Connection of curriculum objectives to societal needs 	1-5	5

		<ul style="list-style-type: none"> ❖ Knowledge of the curriculum aim ❖ Need for co-curricular activities. 		
2	Pedagogy	<ul style="list-style-type: none"> ❖ Pedagogy appropriateness ❖ Innovation in teaching methods ❖ ICT integration in class activities ❖ Use of new teaching methods ❖ Preparation of students for real-world challenges. 	6-10	5
3	School Infrastructure	<ul style="list-style-type: none"> ❖ Effective utilisation of school facilities ❖ Adequacy of school infrastructure ❖ Availability of guidance and counselling centres ❖ Quality and management of school canteen ❖ Overcrowdness of schools. 	11-15	5
4	Administrative Practices & Human Resource Management	<ul style="list-style-type: none"> ❖ Appreciation of teachers' performance ❖ Effectiveness of teachers ❖ Recognition of non-teaching staff in schools ❖ Fairness in treating students. 	16-20	5
5	Community Participation	<ul style="list-style-type: none"> ❖ Involvement of parents in school activities ❖ Effectiveness of parents' involvement in school activities ❖ Creation of parents-teachers association ❖ Regularity of parents-teachers association meetings ❖ Effectiveness of school-industry interface. 	21-25	5

3.7. Semi-Structured Interviews

In Burundi, the education system has subdivisions in provinces and communes. Each province's education bureau works independently, but it does so per the instruction of the Ministry of Education, the country's general education manager. Thus, the researcher needed to get insights from the provincial directors of education regarding the educational practices in the post-fundamental schools under their responsibility. It should be noted that only provincial directors of the sampled provinces participated in the semi-structured interview.

The semi-structured interview schedules comprised a set of twenty-two (22) questions, which were directed to provincial directors orally, and the answers were recorded and transcribed by the researcher. Questions were arranged by aspects under Study, i.e. curriculum, pedagogy, Evaluation procedures, school infrastructure, administrative practices, human resource management, and community participation in school activities. As the interview contained only open-ended questions, the respondents were requested to answer freely, and all their answers were compiled and interpreted as they were, making them ready for analysis by the researcher—questions in the semi-structured interview schedule covered objective 1, objective 3, and objective 4.

3.8. Validation of the Tools

To ensure the collection of valid data, the researcher submitted the constructed tools to four (4) experts in the field of education for content validity. The researcher requested the experts go through the tools, analyse them, study them thoroughly, and generate their views, observations, and remarks to improve them. The experts' observations and comments can be found in the following tables.

3.8.1. Experts for Content Validity

Table 3.15: Details of Content Validity Experts

Series	Expert's Name	Institution	Function
1	Prof. (Dr.) N. Pradhan	The M.S. University of Baroda	Senior Professor
2	Prof. (Dr.) Anitha	Gujarat Public High School	School Principal

3	Prof. (Dr.) Ntwari Innocent	University of Burundi	Dean Faculty of Psychology and Educational Sciences; Expert in curricula content development and analysis.
4	Prof Dusabe Bernard	Kananira High School	Teaching Programme Prefect

3.8.2. Experts' Remarks on Data Collection Tools

Table 3.16: Remarks from Experts during Content Validity

Series	Tools	Aspects	Experts' Remarks
1	Questionnaire & Observation Scale	Curriculum	Co-curricular activities must be added.
		Pedagogy	Two items are to be included in human resources.
		Evaluation procedures	Ask how frequently assessments are conducted.
		School Infrastructure	Observe instead of asking them.
		Administrative Practices	Ask in sub-aspects.
		Human Resource	Separate teaching and non-teaching staff.
		Community Participation	Include industry-school interface.
2	Perception Scale	Curriculum	Separate it from pedagogy.
		Pedagogy	Separate it from the curriculum.
		Evaluation procedures	Exclude it from the parents' scale.
		School Infrastructure	Ask if they utilise whichever infrastructure they dispose of.
		Administrative Practices	Students and parents shouldn't answer about it.
		Human Resource	Exclude it from the students' perception scale.

		Community Participation	It looks good.
3	Interview Schedule	Curriculum	Cover all aspects of the curriculum.
		Pedagogy	Cover all aspects of the pedagogy.
		Evaluation procedures	Cover all aspects of the assessment.
		School Infrastructure	Check if what you observe is what they mention in the interview.
		Administrative Practices	Ask about all detailed aspects of office work and the staff's rentability.
		Human Resource	Monitor the teaching and non-teaching staff's working conditions, investigate each party's role and how they collaborate inside a school.
		Community Participation	Ask if they initiate a school-industry interface or if they own industries that generate funds for the schools.

3.9. Data Collection Procedures

Before the data collection process, the researcher sought prior permission from the Ministry of Education. Once this was given, it was the turn of provincial directors of education and school principals to allow the researcher to perform the data collection act. After receiving their consent, the researcher distributed the tools to the concerned respondents. The researcher administered the constructed tools, i.e. questionnaires, perception scales, observation schedules, and semi-structured interviews, to the respondents for data collection. The questionnaires were meant to collect data from teachers and principals regarding the educational practices in the post-fundamental schools of Burundi. The perception scales measure the perception of teachers, principals, students, and parents concerning the educational practices in the post-fundamental schools of Burundi. An observation schedule was also constructed to observe and collect data related to school infrastructure in the post-fundamental schools of Burundi. In the final point, the researcher developed a semi-structured interview to collect data from provincial directors of education regarding the same aspects under the current study. After answering the questionnaires independently, the principals and teachers returned them to the researcher. After that, teachers,

principals, parents, and students participated in measuring their perceptions regarding the same aspects under study. The researcher collected data school-wise to ensure that convenient instructions were given and to explain them to the respondents. The data was collected for three (3) months from March to May 2023.

3.10. Data Analysis

The data collected were qualitative and quantitative. Thus, descriptive analysis techniques were used, including frequency, percentage, and intensity index. Thematic analysis was employed to analyse qualitative data. The following table shows tools used to collect data and the analysis techniques employed to analyse data per objective.

Table 3.17: Analysis Techniques Objective-Wise

Series	Objectives	Tools	Analysis Techniques
1	Objective 1	Questionnaire Semi-structured interview schedule Observation Schedule	- Frequency & Percentage - Thematic Analysis - Content Analysis
2	Objective 2	Perception Scale	- Frequency - Percentage - Intensity Index
3	Objective 3	Questionnaire Semi-structured interview schedule	- Frequency & Percentage - Thematic Analysis
4	Objective 4	Questionnaire Semi-structured interview schedule	- Frequency & Percentage - Thematic Analysis

The data relating to objectives one, three and four were analysed using frequency, percentage, and thematic analysis. The second objective required a perception scale as a data collection tool, and apart from frequency and percentage, an intensity index was used to measure the weightage

of the items contained in the scale. The items were aligned per aspect, each containing five (5) items with an intensity index calculated for each item. The average intensity index was also calculated to show the strength of the set of five items together. The intensity index and the average intensity index were calculated using the following formula:

$$\text{For each Statement, Intensity Index (SII)} = \frac{F_1*5+F_2*4+F_3*3+F_4*2+F_5*1}{N}$$

For each aspect, an Average Index was calculated using the following formula:

$$\frac{SII_1+SII_2+SII_3+SII_4+SII_5}{n}$$

Whereas:

SII: Statement Intensity Index

F1: Frequency of Strongly Agree

F2: Frequency of Agree

F3: Frequency of Undecided

F4: Frequency of Disagree

F5: Frequency of Strongly Disagree

N: Number of Respondents

n: Number of Statements per Aspect

and 5,4,3,2,1 are score points assigned respectively to S.A., A, U.D., D, and S.D.

3.11. Conclusion

The present chapter constituted a core point for the research to conduct his Study. The methodology followed throughout the study is described in this chapter. The researcher explained the Study's objectives, the construction of the tools, and the implementation of tools to collect data as per the nature of the objective and related data. In the last lines of the chapter, the researcher showed the analysis techniques utilised to analyse the collected data objective-wise. The analysed data can be found in the next chapter, which is reserved for data analysis and interpretation.