Scalability: A Diagnosis on Potentiality of Scaling Program for Strengthening Public Schools

Situ Shrestha
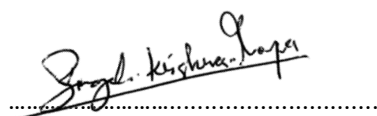
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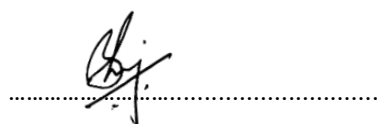
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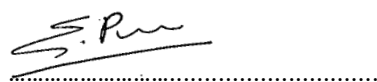Supervisor   Date: 8th November 2022

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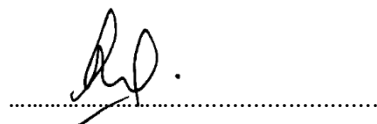Associate Dean, School of Arts   Date: 10th November 2022

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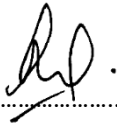
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Declaration

I hereby declare that the report entitled "Scalability: Diagnosis on Potentiality of Scaling Program for Strengthening public school" is my own work and has not been submitted to any academic institution for any other degree

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Abstract

In this report, entitled "Diagnosing the Potentiality of Scaling Program for Strengthening Public Schools," the work completed during the internship in scalability has been described. The internship was based on a project from Kathmandu University's (KU) School of Arts, Learning Innovation, and Knowledge Exchange Lab titled "Effectiveness and Scalability of Programs for Children Who Are Out of School and at Risk of Dropping Out in Bangladesh, Bhutan, and Nepal," which selected two interventions to understand Scaling Sciences. The internship was held in the Rautahat district. This report has compiled the findings and identified the possibility, indicators, and strategy for scaling a program with Scaling Science to examine and assess the institute's readiness for scaling. As previously stated, two interventions were chosen for this. Intervention I is titled "Campaign through action groups to improve inclusive access to public schools for OOSC and children at risk of dropping out," and Intervention II is titled "ECA after School."

According to the existing literature review, scaling science can be utilized in various developmental works, research, and projects. Moreover, a new paradigm has been introduced and used with time, providing different guiding principles, indicators, and components. Despite the literature, it has been discovered that neither the practice nor its application is widespread. Therefore, the main goal of this report is to understand the scaling strategy goal, identify the project's two initiatives and examine if they are progressing toward their outcome and what are the impacts of scale procedures in those institutions, as well as how scaling decisions can be made using scaling science. This report also identifies and provides access to actions that will strengthen and advance the institutionalization efforts of the two interventions mentioned above.

In this study, two main methodology tools have been used for this purpose: the Scaling Strategy Worksheet and the Institutionalization Tracker. Initially, a scaling strategy worksheet was used to determine the scaling strategy, goal, scale impact, and how scaling decisions should be made by interviewing the innovators. After that, using an in-depth interview with the innovator, implementer, and stakeholders involved in those interventions, an institutionalization tracker was used to assess the progress, elements, and institutional readiness for scaling of those two interventions.

The study has discovered that scaling can be done using scaling science and existing strategies, which supports the understanding of any development work, its progress, and challenges with a mitigation strategy. In addition, this study, through scaling science and its strategy, enables innovators to understand their implementation, attention required area, and institute readiness. As this study has attempted to assimilate the learning from the previous four years of undergraduate studies in the field, this report also incorporated the learning-by-doing method, the use of updated theory, and bringing them to action/practice.

Acknowledgement

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Acronyms and Abbreviations

CUE	Center for Universal Education
HH	House hold
IDRC	International Development Research Center
KU	Kathmandu University
OOSC	Out of School Children
PTA	Parent Teacher Association
RM	Rural municipality
SDG	Sustainable Development Goals
SMC	School Management Committee
VDCs	Village Development Committee

Introduction

1.1 Background

Scaling science refers to a cutting-edge "Scaling" paradigm. Scaling can be defined as any object, process, or feeling in a measurable form. There are various definitions of "scaling," but this study focuses on scaling as framed in research for development - R4D (social science) or Scaling Science. Scaling is a long-term and complex process of learning and identifying appropriate impacts, outcomes, and issues related to various topics. Scaling has also been used to identify educational impacts, issues, and outcomes because this research primarily concerns the education sector. Similarly, scaling facilitates collaboration among practitioners, researchers, stakeholders, and innovators involved in quality education and development.

Scaling science, which refers to a systematic, principle-based science of scaling that can increase the likelihood of success, is primarily used to determine the impact of any research (innovation to benefit society). Scaling science, as previously stated, is a new paradigm that has emerged from a review of IDRC work aimed at advancing a scientific or critical approach to scaling. The work of the IDRC in this area refers to clinical trials and other accepted approaches to scaling up solutions to end the Ebola crisis in various ways.

The IDRC collaborating innovators discover that scaling in research for development (R4D) aims to achieve a scale of impact to a board system of development change. Also, how will the research findings reach those who can use and support them? The science of scaling investigates desirable change and significant impact. Scaling impact, in this context, refers to a collective impact effort at an optimal scale that can only be undertaken if it is morally justified and supported by dynamic evaluation. According to the IDRC, "scaling science" is an approach that focuses on impact rather than actions. It is based on the experience of innovators from the global south, which includes creating knowledge, applying it to real-world challenges, and ensuring that the solution that aims for is implemented. Here, it is being used in research to guide new policy (extend policy) to improve program quality and increase access to goods and services. The key is to make a justified and coordinated effort to achieve maximum impact. The ultimate goal of the Scaling initiative is to improve people's lives by broadening and deepening the impact. Collecting the impacts at the optimal scale also aids moral justification and evidence-based decision-making. In other words, this is also a planning step in the scaling process. In this context, the impact is defined as one or more unintended or intended consequences of an action or action. Innovators strive to create meaningful impacts for people; however, not all impacts are meaningful, and people may interpret them differently. Moreover, for this

intervention, the purpose of the scaling initiative is to improve people's lives and development; it also collects impact and can be used in various ways.

The scaling process is described in various ways throughout the development discourse. These are frequently applicable terms for sharpening one's thinking and planning actions. They are also helpful in communicating the scaling process to others. Figures depict some common conceptions of scaling using the metaphor of growing fruit. We then compare them to Scaling Science. Those scaling measures can be measured in various ways: scale up, scale out, & scale deep. Based on these and connecting them to the research, the research application of scaling mainly focuses on two significant issues as a result of this initiative: What can be done to encourage students to attend school? Moreover, what are the responsibilities of school/community to bridge the gap regarding political issues and community leadership? Should we scale up, scale out, or scale deep?

In the global context, numerous projects, works, and initiatives for development are being carried out on a small to large scale in sectors such as education, health, agriculture, infrastructure, livelihood, social protection, and others. However, the desired result and outcome are not found because the projects are completed and are invested solely in development with no research, scaling strategy, or direction. While this is true, scaling science and research are already helping to build evidence about "what works" and "how" to work at scale or effectively bring it to scale and its extent. Scaling science is used to determine the impacts of any research for development initiative or project (socio-science). In this regard, we can consider Ebola and the mid-day meal in the global and Nepali contexts. For a brief explanation, let us take an example of the West African Ebola outbreak experience, demonstrating that complex scaling of impact was carried out. As a result, various actors, changing conditions, and knowledge gaps were identified. This complication was discovered amid a crisis and in ordinary, everyday life. Scaling science attempted to navigate the complexity of scaling. Scaling science assists innovators in creating a map to guide their work in this way. We cannot plan precise directions for every scaling journey, but as we progress, the conditions change, and so should our route, speed, mode of transportation, and even destination. A map, however, built from the experience of others who have navigated the same ground, can assist us in planning a journey and evaluating a position. So, Scaling science encourages innovators to think about what it means to scale impact and how scaling decisions should be made to find its potentiality.

It also encourages us to evaluate the scaling paradigm and find how the new pedagogical can be used for research and development. This scaling science encourages and invites enthusiastic individuals and organizations to contribute to our understanding of scaling in general and scaling science in particular. How else can the science of scaling be scaled?

Hence, this research, titled "Scalability: Diagnosis on the Potentiality of Scaling Program for Strengthening Public Schools", has been conducted to understand scaling science better. The primary goal of this research has been to identify the possibility, indicators, and strategy for scaling a program. This research also examines and assesses any institute's readiness for scaling. Moreover, two

initiatives/interventions of the project initiated by the PhD student have been chosen for this study.

Moreover, the intervention is primarily based on a project from Kathmandu University's (KU) School of Arts, Learning Innovation and Knowledge Exchange Lab titled "Effectiveness and Scalability of Programs for Children Who Are Out of School and at Risk of Dropping Out in Bangladesh, Bhutan, and Nepal". This thirty-one-month project seeks evidence on what works and does not, such as practices, methods, and tools for identifying out-of-school children and those at risk of dropping out. The intervention and project sites are in Nepal's Rautahat District, where this research's potential scaling strategy and examination of institute readiness have been carried out. The two interventions initiated by the two PhD students have been briefly explained, examined, and evaluated to know the potential of scaling as Intervention I and Intervention II. Here, Intervention I is "Campaign through action groups enhancing inclusive access to public schools for OOSC and children at risk of dropping out", and Intervention II is "ECA after School".

As an outline, this chapter starts by explaining why this research was conducted through a statement of the problem, core objective, research question, scope, and limitation of the study. This chapter is followed by other chapters, namely a literature review with a conceptual framework, a chapter on methodology and the chosen study site. Finally, it offers a findings and analysis chapter, followed by the conclusion.

1.2   Problem Statement

In today's world, a great deal of investment and research is conducted in the development sectors. Pilot testing is always done with investment and the initial phase, which usually helps the innovator identify potential challenges, output, and positive outcomes. When the same project is scaled up, the expected outcome and result are never achieved or met. As a result, we can see investment misuse, development collapse, and energy and resource loss. We discover that when projects and initiatives are undertaken, most resources are provided or invested solely in physical infrastructure as they scale up. However, there may be circumstances and times when scaling up are unnecessary.

The scaling solution for any intervention or circumstance is ineffective, as we discover when we relate this with thematic problems associated with scaling science. For instance, there are no pre-existing, evidence-based interventions or solutions for any developmental work or circumstances. Another problem is the context (John & Robert, 2017: Stanford Social Innovation Review). For those, the traditional approach to delivering at scale begins with the assumption that a reliable solution will emerge from a favorable context. The traditional approach accelerates social change during nineteenth-century industrial expansion, twentieth-century pharmaceutical regulation, and twenty-first-century technology startups. However, it has been discovered that most interventions are scaled by providing resources. However, always providing resources is not the solution because it may not be required, resulting in a wicked problem and the intervention's or any project's expected result or output not being achieved. According to Cynthia (2003), when it comes to rethinking scale, the issue of

"scale" is still under-theorized in the literature. She believes that the definition and practice of scaling are limited in scope and are primarily used to increase the number of resources rather than the depth, quality, and sustainability of any intervention. Further, Cynthia (2003) argues that the traditional definition and implementation of scaling carry significant weight, framing most empirical studies and forming the foundation of many philosophical discussions.

As a result, we can assume that despite having them, most current interventions lack the new paradigm. Following the traditional scaling paradigms, new paradigms and re-conceptualizing scales are available, but they need to be seen in use or practice. One of the alternatives to the existing paradigm is the scaling science that offers a path towards a scaling theory of change. This pathway, with time, assists innovators in putting four major guiding principles into action, intending to develop a new approach to creating a theory of change as a path to scale, a response to scale, and scale partners. The four guiding principles are moral justification, optimal scale, inclusive coordination, and dynamic evaluation. Likewise, Cynthia (2003) has conceptualized four interrelated dimensions regarding re-conceptualizing scale: depth, sustainability, spread, and shifts in reform ownership. We can argue that we have a concept of scale but that it is not being used in literature and practice.

Determining and evaluating the already-existing indicators and developing a plan for program scaling is thus necessary to increase the potential of any intervention or program. Along with this, the existing trackers and worksheets for determining the readiness of any institution for scaling should be used by adhering to, comprehending, and evaluating the existing principle. Justifying the impact, measuring them on an optimal scale, inclusively coordinating, and dynamic evaluation are all helpful in diagnosing the potential of scaling any program. Moreover, in doing so, we can achieve the desired results by properly using research and scaling the initiative or project for development. This will help to support, bring inclusive coordination, allocate necessary resources, and make the best use of development investment.

1.3   Rationale of the Research (Significant)

The rationale/significance of this research is to understand and evaluate the existing scaling strategy and goal, as well as to determine whether the proposed initiative is progressing - toward the goal. This research aims to understand better what it means to scale and how scaling decisions should be made using a new scalability paradigm. Finally, after evaluating the scaling strategy, this research examines the potential, progress, readiness, and elements of institutionalization, intending to determine actions to strengthen and advance institutionalization efforts. Furthermore, with its findings, this research is expected to help innovators, educators, and investors understand and work thoroughly while creating an intervention or investing in a project for development. This research also signifies data collection and results about the current situation of children out of school, risk of dropping out, educational institute's current situation, challenges, and barriers which will eventually help reform policy and positive action for positive change and development.

1.4   Objective

The main objective of this research is to understand the scaling strategy and goal and to identify the two RESEARCH initiatives of the project, if it is progressing toward the goal, and what it means or impacts scale, as well as how scaling decisions should be made. This research also aims to identify and assess actions that will strengthen and advance institutionalization efforts. The initiative/intervention denotes: Campaigning through action groups enhancing inclusive access to public schools of OOSC and children at risk of dropping out and ECA after school. As a result, the following are the objectives of this study:

a) To evaluate the indicators and strategy for scaling "Campaign through action groups enhancing inclusive access to public schools for OOSC and children at risk of dropping out" and "ECA after School" interventions under ESP Project.

b) To examine and assess institutions' readiness for scaling the mentioned interventions.

1.5   Research Questions

The following research questions have been developed following the two primary objectives of this study, as stated above:

a) How can the determined indicators of scaling be evaluated?

b) How can scaling strategy be implemented towards knowing the readiness and potentiality of scaling the program (framing)?

1.6   Scope of the Study

This study aims to identify how scaling is done by evaluating the indicators and strategies for scaling a program. It also aims to find the readiness and examine the institute for scaling. Here, any initiative and institution's barriers, opportunities, and vision will also be figured out.

1.7   Limitation of the Study

The research was carefully carried out and implemented to obtain the most reliable analysis; however, the study had some limitations. Some of the limitations are as follows:

- As a final-year bachelor's student, this study has a limited time frame to learn about the initiative and its outcomes.
- As the project is in its early stages, the tools used to identify the objectives are already available, but they have some restrictions on the types of questions they can ask.
- As the intervention is in the running phase, the final output, challenges, and issues still need to be identified and mentioned.
- The responses received from the respondent may vary as they would not want to share their current situation at the institute.

Literature Review

2.1 Literature Review Sub-sections

This section is divided into four sub-sections following the conceptual framework. Those four sections mention the brief history, paradigm, scaling theory of change, and practice of scaling science.

2.1.1 Understanding Scaling Science and Its Paradigm

When we think of scaling, we often think of it in terms of measuring something. Moreover, when it is attached to the word science, it implies measuring science. However, the scaling science in this study is unique and requires its understanding. Scaling science is primarily defined as an advanced "Scaling" paradigm. Scaling is the process of giving any object or process a measurable form. There are several definitions of "scaling," but this study focuses on scaling in R4D (social science) or Scaling Science. Here R4D is usually confused as research for development, but it is different and mainly intends to achieve an impact that promotes development.

Scaling is a lengthy and complex process of learning and identifying appropriate impacts and outcomes, as well as issues about various topics. "Scaling science" refers to a systematic, principle-based science of scaling that can increase the likelihood of success. It is primarily used to assess the impact of any research (innovation to benefit society). As previously stated, scaling science is a new paradigm emerging from a review of IDRC work aimed at advancing a scientific or critical approach to scaling. The IDRC's work focuses on clinical trials and other accepted approaches to scaling up solutions to end the Ebola crisis in various ways.

Scaling science has an emerging and evolving history that is multidisciplinary and used in various sectors. Starting with the Ebola virus, we are well aware that the virus claimed many lives and that the crisis was unprecedented. Ebola was first identified in 1976, with 27 outbreaks occurring between 1976 and 2014. There were various solutions and interventions, both socially and medically. However, the virus continued to take more lives and spread. A complete answer has yet to emerge for this. However, we can understand that despite many interventions and measures taken to control it, we lack knowledge and viable, evidence-based solutions to combat a massive outbreak. Various factors, including unprepared national health systems and social disintegration, worsened the situation and destabilized even the most effective solutions. The way we usually scale solutions in this and most other Interventions

and situations is ineffective. This is when the new and traditional scaling approach or paradigm can be found and seen in the initiative.

For instance, in the context of the Ebola outbreak, there was a lack of a reliable solution, and the scaling began to rely on innovation and ideas. That is when innovations began to encircle the entire path to scale, mitigating the effects. The emphasis on evidence-based before, during, and after scaling began here, which aided scaling innovations in justifying the range/scale of risk. Allocating resources and identifying the needs of actors were also aided by this process. Later, a broader perspective on scaling was adopted, in which the full range of context: innovators, impacts, investors, funders, NGOs, social enterprises, and government were considered and scaled. The scaling concept is now being used and is an approach spreading across the Global South due to this.

In all of this, a Canadian organization called IDRC supported the inventions made by social and natural scientists in the Global South, where the development and distribution of a new Ebola vaccine were fought with the help of steady support. We can see how scaling with a solid evidence base, and coordination helped to end the Ebola crisis in a novel way. We can understand the emerging scaling paradigm known as "scaling science" through this and their efforts. So, once again, scaling science can be defined as scaling scientific research results to achieve impacts that matter from the broader perspective of researchers and innovators, as well as the development of a systematic principle-based scaling science that we believe can increase the likelihood that innovations will benefit society. However, although it worked and was supported, it encouraged critical thinking, which led to the traditional scaling paradigm.

After understanding the evolution of the scaling concept, most of us may conclude that scaling up social change has been borrowed from nineteenth-century industrial expansion, twentieth-century pharmaceutical regulation, and twenty-first-century technology startups. Moreover, while there is much learning here, more is needed for contemporary social innovation. In this intervention, the industrial scaling paradigm primarily defines the operational scale, which can be defined as scaling up by allocating resources in the market, whether they are needed or not. Later, the pharmaceutical scaling paradigm emerged, primarily concerned with scaling authority. Understanding the market and allocating resources only if necessary, by taking it to authority to scale can be summed up as this. Following this is the lean scaling paradigm, a rapid learning process focusing on understanding the market, customer-friendly, and scaling required resources.

As a result, these paradigms evolve, and social innovators frequently follow new orientations. These three paradigms are commercially successful strategies, not social impact strategies. They may provide some guidance for social innovators looking to scale their impact in areas where it has yet to be appropriated or cannot be scaled. Besides, when it comes to social impact, old paradigms are not wrong; they are incomplete. A more comprehensive approach would centre on a different or additional goal—the public good. Hence, this study sets out to create a framework that does just that with the scaling science paradigm. As a result, the four principles that guide the concept of scaling science to provide unique value for scaling and its

impact are presented. The scaling impact here refers to the number of ways the scaling process is described, which helps in understanding how and what to scale. The following illustrated figure and example of trees and fruits have been mentioned to describe the scaling impacts measuring methods briefly:

2.1.1.1 Scaling up

Scaling up refers to increasing efficiency. The farmer may care for her tree, allowing it to grow larger and produce more fruit (see Figure 1). More nurses could be trained as a result of a health education program. A policy research organization may advocate for a larger population catchment area to be covered by a new policy intervention.

Figure 1: Scaling up: one tree - big tree, more fruits
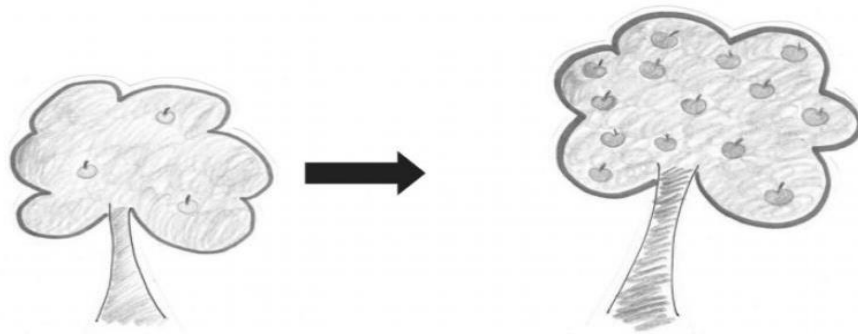
Source: Chapter 1 of Scaling Impact - Innovation for the Public Good Published: 2019

2.1.1.2 Scaling out

Scaling out process increases the number of sites or opportunities. Our farmer would plant more trees with similar yields to produce more fruit collectively (see Figure 2). More training sites may be established as part of the health education program. The policy research organization may advocate for the same policy at various levels of government, from local to national.

Figure 2: Scaling out: one tree - many trees, more fruit
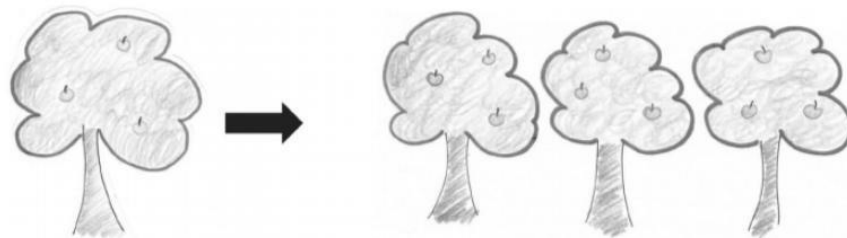
Source: Chapter 1 of Scaling Impact - Innovation for the Public Good Published: 2019

2.1.1.3 Scaling deep:

Perhaps farmland is limited. What could the farmer do to improve the quality of her offering? Deep scaling has an impact on quality and character. The farmer may allow the fruit to mature on the tree for a more extended period, allowing it to grow larger and taste sweeter (see Figure 3). The health education program may train its teachers, providing them with new skills and increasing their effectiveness. The policy research organization may use social media campaigns to increase the likelihood that their policies are implemented.

Figure 3: Scaling deep: one tree - same tree, enhance fruit
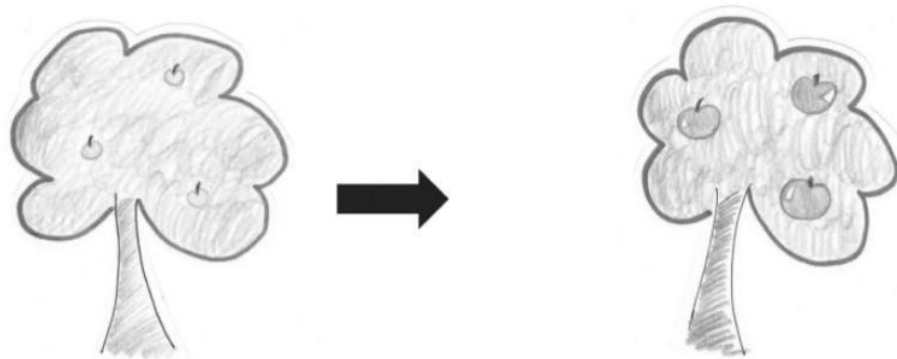
Source: Chapter 1 of Scaling Impact - Innovation for the Public Good Published: 2019

These scaling impacts have been further understood in a holistic concept of impact based on magnitude (knowing how much has been impacted), range of impact (understanding variety), how long the impact will last (understanding sustainability), and who will benefit or harm with different sub-groups (equity based on gender, religion, or class). Based on these things, the four guiding principle has been introduced. It approaches unique value for innovation aiming to scale impact for the public good, which has been briefly explained in another section.

2.1.2 Guiding Principles

The four guiding principles of scaling assist social innovators in exploring the path from ideas to impact. With the paradigm shift, it has been suggested that more elements and concepts be used to determine what scaling and level should be used. This also introduces how and why the guiding principle and its approach provide unique value to innovators seeking to scale impact for the better. These principles encourage creativity, originality, and structured risk-taking to comprehend the scaling impact. It also helps and supports how and why an existing strategy should be used to scale any initiative or intervention. The principles are as follows:

2.1.2.1 Justification:

Any program must be justified before it can be scaled. This means that some programs or interventions do not need to be scaled, so scaling should be justified

before taking any steps, and the "why" question can be asked to determine whether it is necessary. If so, what kind of scaling impact or measure is required? Scaling up, scaling deep, or scaling out are all the options available. This also assists and supports understanding whether an innovation can be scaled, as well as the values of those impacted in determining whether an innovation should scale. While defining justification, it is critical to understand and balance evidence, impact, and value. That is, evaluate the value using peer review, an ethics board, and pilot testing. In addition, the justification should be shared among partners such as innovators, implementers, funder, and beneficiaries to reflect any scaling intervention's vision. This justification principle is essential because scaling may be a choice that must be justified.

2.1.2.2 Optimal scale:

The second principle is that solutions to social and environmental problems have an "optimal scale", which is rarely the highest. When scaling, some trade-offs typically make an intermediate level of scale the most desirable. This principle emphasizes the importance of balancing impacts' magnitude, variety, sustainability, and equity in ways that stakeholders support/approve. This way, this helps in identifying why the decision about scaling, like what, how, when, where, and why, is being used and included. Scalability-impacts that can be assessed in research by using these four dimensions in an optimal scale that is:

- **Magnitude:** How much or how many differences is it making? How much impact will the intervention create?
- **Variety:** What is the range of impacts (health, economic), and which kind are counted? - Socio, economic, environmental
- **Sustainability:** How long the impact shall last? Ownership - trained/participatory also for whom
- **Equity:** What are the Benefits or harm? Gender, relation, religion ----- what are the factors it affects? For how long and how reliable is it?

This optimal scale provides us with quantitative counts of beneficiaries served or affected as well as qualitative insights such as improvement, effectiveness, and so on. As a result, the optical scale is inextricably linked to both qualitative and quantitative aspects and should be balanced. There are no hard and fast rules for determining the best optimal scale. It is a process in which one or more aspects are adjusted to produce the most significant possible impact.

2.1.2.3 Coordination:

The third scaling science paradigm principle is "inclusive coordination," which holds that innovators must build relationships with those who will be affected by the innovation as well as those who will make scale possible. Most of the time, no matter how bold its scaling objectives are, it is beyond the capacity of a single innovator or organization to significantly improve a social or environmental problem. Scaling

impact requires the collaboration, inclusion, and competition of many actors. The practical challenge that innovators face is coordinating the actions of diverse actors with competing agendas and perspectives in ways that benefit the public good. Scale is made possible by investors, funding agencies, policymakers, government agencies, and customers. Their participation draws much attention because they have a lot of investment and power. There are numerous models for engaging them, and they play an essential role. Scaling occurs in a complex environment, and complexity necessitates a flexible scaling process. Moreover, as previously stated, coordination is crucial. For this coordination, researchers must consider a broader range of initiators, enablers, competitors, and impact, which is the main conceptual framework for finding any strategy for a scaling program. These groups may influence or be influenced by scaling in ways that alter intended outcomes—this aids in mapping any interaction or program with actors in a scaling system.

2.1.2.4 Dynamic evaluation:

Impact evaluations assess an innovation's effectiveness at a given level of scale. They are based on stable cause-and-effect relationships, such as those described by logic models and change theories. In reality, as a result of various actions and scaling effects, impacts may become stronger or weaker or qualitatively different. To address this, scaling science uses the concept of "dynamic evaluation," which examines how impacts change with scale. It is similar to monitoring and evaluation in that it checks the activity done before, during, and after scaling. This includes constantly revising what optimal scale means and how scaling affects it. In addition, dynamic evaluations should explain how scaling actions cause scaling effects (linear, qualitative, or quantitative) that change the collection of impacts.

2.1.3   Towards a Scaling Theory of Change

Scaling science aims to develop a new approach to creating a theory of change (a standard component of evaluation and program design) to assist innovators in putting four principles into action. This consists of three components that are related to the guiding principle: There are three types of dynamic evaluation: a path to scale, a response to scale, and scale partners, which are taken as essential elements in any scaling program. These three components are defined as follows:

- A path to scale: an innovation is expected to pass as it scales
- A response to scale: how the magnitude, quality, and types of impacts are expected to change as the solution scales; a visual representation
- Partners for scale: describes the often-complicated roles of partners involved in scaling up a solution where it is collaborated with: R&D and on implementing and scaling the innovation and collaboration.

Looking ahead, we navigate different complexity, and for this, innovators, implementers, and funders are asked and encouraged to look ahead and use the scaling strategy. This assists in the creation of a road map to guide their work. It also encourages people to think about what it means for an impact to scale and how

scaling decisions should be made. Following that, there are three sections: vision, credibility, and recognition. The vision in this context refers to identifying the vision and goal of the intervention. Credibility refers to the scaling program, whereas recognition refers to the method used to track and assess scalability.

2.1.4 Moving Forward

Moving forward, we can see how scaling science and its paradigm have emerged. With time and the development of literature, it has become clear that the elements and strategy should be used to comprehend and evaluate the scaling program. Moving forward, there are some fundamental concepts that should be understood and have the potential to scale any program. The four main areas discussed below explain why scaling science should be used and how to assess the scaling strategy in practice. Moreover, they are as follows:

2.1.4.1 Scaling science as Research for Development (R4D):

Through discovery science or applied science, research for development seeks to achieve impacts that promote development. Why is scaling science not being used as a tool? This aims to have a significant impact on people and the environment, as well as contribute to a more extensive system of development change.

2.1.4.2 Scaling impacts require mechanisms and varied knowledge sources:

This states that scaling impacts necessitates mechanisms and diverse knowledge. If there are any issues or challenges in between the program while scaling, this research can help back and forth without issue. This also contributes to knowledge translation. For this, inclusive coordination - initiator, enablers, competitors, and those impacted by the innovation - support moving any research and scaling the program, resulting in positive action.

2.1.4.3 Scaling into Research:

Scaling into research plays an important role and assists in many discoveries. Using the concept supports the institution and mapping of a program from the beginning to the end of any research project. This is accomplished through three typical stages that primarily include scaling elements and processes such as: what is the scaling program name, topic, focus, questions, data collection, interpretation, and finding possible results and output). These three stages are as follows: framing, doing and sharing. Scaling also aids in research protocol in discovering new things that will help in unfolding the impacts justifying the work - not only to the initiators but also to other actors.

2.1.4.4 Sharing Research:

Finally, by scaling, it is possible to determine whether or not there has been prior work or research for the purpose of this study. Also, if you are working on early investment or budget scaling, this guides resource allocation if any other projects are in that specific area or sector. This will aid in resource utilization. Scaling research helps other researchers by providing references, funding by understanding what and how much money to invest, and policymakers by assisting/supporting policy making.

2.1.5 Conceptual Framework

To get scaling into research, four guiding principles are used throughout the research process that is - **Framing, doing, and sharing,** which is the conceptual framework of this research. For this, a different element is used, which focuses on examining and assessing the scaling strategy of a program. For a brief explanation, the below figure has been mentioned with its description in short:

A. Framing (Focus and question):

This assists in mapping the scaling system and establishing a focus and parameter.

In addition, when it comes to scaling science, the first principle of justification is asked, "why scaling?" What are the potential benefits and opportunities, and who/what is affected by the scaling process? It also determines who were the users/beneficiaries in order to justify the potential impacts. Moreover, the following categories are used: initiators, enablers, competitors, and the impacted.

Table 1: Conceptual Framework

INITIATORS	ENABLERS
People, place, things that make it possible to BEGIN a change in scale. Eg: Innovators/researchers, funders/investors	People, places, things that can FACILITATE the scaling. Eg: Service providers, law & policy makers, communities, government, school
COMPETITORS	**IMPACTED**
People, place, things that in COMBINATION offers NEXT-BEST OR BETTER-THAN ALTERNATIVE. Example: what are the alternative things or innovation that can be used to the project (like back up project/activity)	who experience the POSITIVE or NEGATIVE result of the scaling. Example: who are affected or benefited by the scaling.

B. Doing (Data collection, analysis/synthesis, and interpretation):

This section - doing - supports the dimension of collecting impacts and analyzing/interpreting them meaningfully. In addition, it provides evidence at an optimal scale and involves stakeholders in data for learning and adaptation in a positive way.

C. Sharing (Communicating research results):

Another section is sharing, which primarily assists in disseminating the strategy or innovation to facilitate participation and contribute to the intended impacts of research. This also aids in determining whether any findings or aspects require further research.

This is how the conceptual framework was created and used to determine the study's objective in depth. The framework includes all of the elements/indicators needed to evaluate the scaling strategy and readiness. The scaling strategy worksheet and institutionalization tracker are the two main research methods used for this. Their brief explanation is given in another section/chapter of the thesis.

Research Methodology

This research uses vital informant interviews, observation, in-depth interviews, and Intervention studies. The existing scaling literature and conceptual framework for scalability and institutionalization readiness were reviewed. To determine the objective of the research and based on the available literature, two methodologies have been used: the Scaling Strategy worksheet and the Institutionalization tracker. In-depth interviews have been conducted with representatives from educational institutes, stakeholders, innovators, implementers, and others to find the objective of this study.

3.1 Selection of Study Site

This study was primarily an output of the "Effectiveness and Scalability of Programs for Children Who Are Out of School and at Risk of Dropping Out in Bangladesh, Bhutan, and Nepal" project carried out at the Learning Innovation and Knowledge Exchange lab. The project has mainly two intervention programs. This 31-month project aims to gather evidence on what works and what doesn't, including practices, methods, and tools for identifying out-of-school children and those at risk of dropping out. Here, both the intervention and project sites are in Rautahat District, Nepal.

Rautahat District (Nepali: रौतहट जिल्ला), a part of Madhesh Province, is one of Nepal's seventy-seven districts. The district headquarters is in Gaur, which spans a 1,126 km square area and includes municipalities like Garuda, Chandrapur, and Paroha and as of 2011 there were 686,722 people living there, up from 545,132 in 2001. This district has two VDCs and sixteen municipalities. Among them, two rural municipalities (RM): Durga Bhagwati RM & Yamuna Mai RM and one

Figure 4: Map of Rautahat District
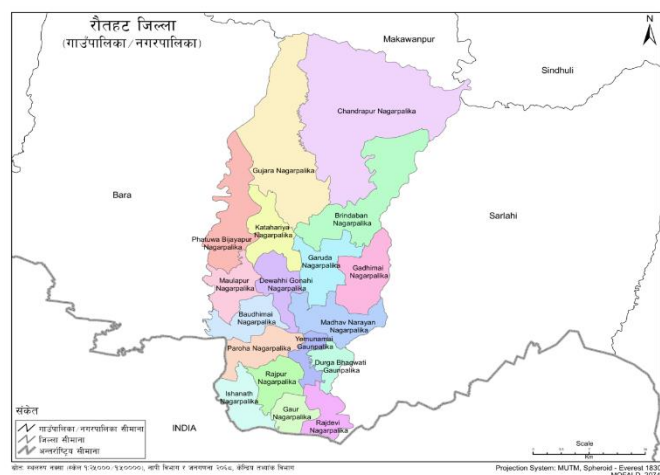
municipality: Rajdevi Municipality have been focused.

The intervention site of the project was Durga Bhagwati RM, Yamunamai RM, and Rajdevi Municipality in Rautahat District of Madeshi province of Nepal. Rautahaut has the lowest literacy rate in Nepal, only 42% ("Nepal times," 2019). The two significant interventions of the project are happening in this rural municipality (RM) in eastern terai, which lies on the western bank of the Bagmati River (Fig. 5, 6, 7). The Durgabhagwati RM is divided into five different wards, Gangapipara, Bhalohiya, Matsari, Pachrukhi and Badharwa. There are two secondary schools, two lower secondary schools, 12 Primary schools and 1 Madarasha in the Rural Municipality, as shown in the following diagram.

The issue of OOSC was assumed to be more severe in rural municipalities, where local government capacity is weaker than in municipalities. In Rautahat, there are two rural municipalities: Durga Bhagwati and Yamunamai. Yamunamai RM has a geographical advantage over Durga Bhagwati RM.

Figure 5 : Map of Durga Bhagwati RM
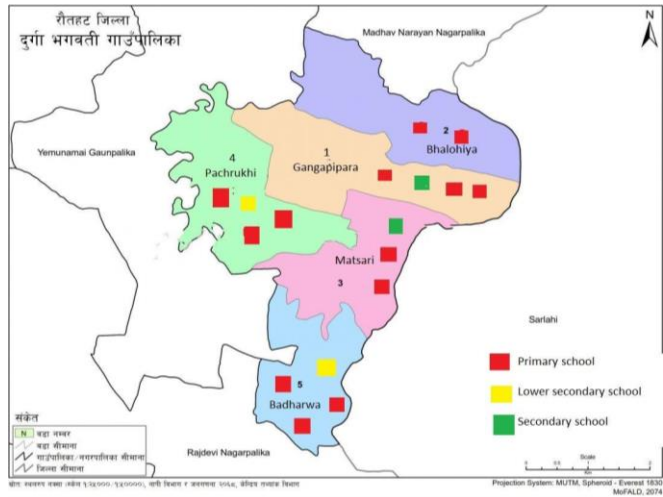
Figure 6: Map of Yamunamai RM
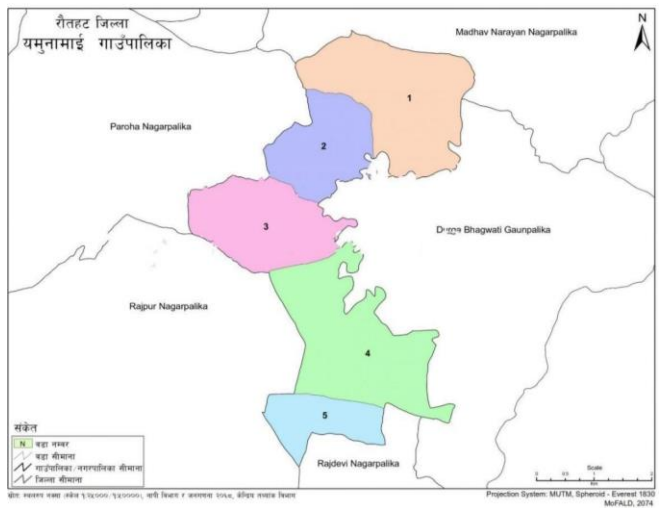
Figure 7: Map of Rajdevi Municipality
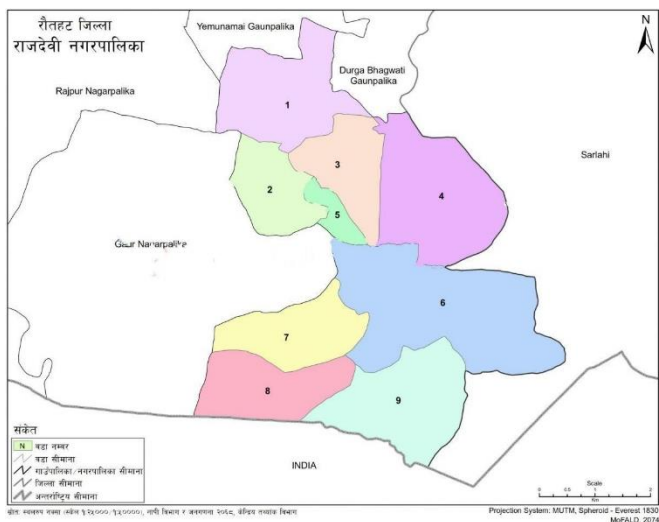
3.2 Duration of the Study:

The overall duration of this study was for 5 months from May 2022 to September 2022.

3.3 Methods of Data Collection

The method for the data collection of this research is a mainly in-depth interview using two tools of scalability. The in-depth interview was done with innovators of the intervention, education coordinators, officers, stakeholders, and representatives of educational institutions. Here, the two tools being used are the Scaling strategy worksheet and the Institutionalization tracker. At first, the scaling strategy worksheet was used to interview the innovators of the intervention to determine the scaling strategy, goal, impact to scale and how scaling decisions should be made. Then, the institutionalization tracker was used to check the progress, elements, and institution readiness for scaling. The tools' brief use and explanation are mentioned below.

Figure 8: Research Methodology for this study
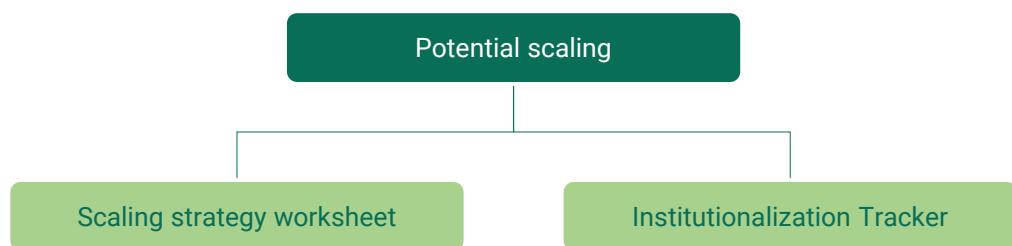
Scaling strategy worksheet is a kind of tool that helps in planning for scale. The Scaling strategy worksheet was created in July 2021 by Molly Curtiss Wyss, Patrick Hannahan, and Jenny Perlman Robinson with assistance from the Real-time Scaling Lab partners, advisory group members, interns, and other coworkers. This tool is primarily a scale worksheet planning tool that supports and guides users based on a "scaling plan template." This tool has been used to comprehend the vision, provide a concise explanation of the scaling strategy, establish credibility, identify problems, identify supporting partners/organizations, and plan the implementation of a scaling initiative. This tool has been used to understand the vision, a summary of the scaling strategy, credibility, problem recognition, supporting partners/organizations, and institute planning for a scaling initiative. From this tool, I tried to understand the scaling goal, key drivers, and guide for developing a scaling strategy identified for making programs toward those goals and an educational initiative. This tool is primarily designed for practitioners, innovators, policymakers, and funders who are supporting an initiative or components of an initiative in the area of education. This tool is primarily intended for practitioners, innovators, policymakers, and funders assisting with an education initiative or elements of an initiative.

This worksheet assists in identifying and developing the first draft of a strategy by drawing any initiative's vision, problem, exciting data, and discussion, as well as mapping, political economy analyses, or previous scaling plans. In addition, this helps in background research to close any gaps and triangulate any data that may be required, and other scaling tools can also help guide the development of the strategy. The overall worksheet assists in the creation and implementation of any initiative's scaling strategy. This worksheet primarily complies with understanding vision, a summary of the scaling strategy, the credibility of the proposed initiative, recognition of the problem and support for change, advantages of the proposed initiative over alternatives and the status quo, enabling conditions and partnerships for scaling, ease of transferring and applying the initiative at scale, organizational capacity to implement the initiative at scale, financial sustainability of the proposed initiative, and financial sustainability of the proposed initiative. In this research, using a scaling strategy worksheet, the innovators (PhD Students) have been interviewed in-depth.

Unlike the scaling strategy worksheet, the Institutionalization Tracker was created in July 2021 by Molly Curtiss Wyss, Patrick Hannahan, and Jenny Perlman Robinson with assistance from the Real-time Scaling Lab partners, advisory group members, interns, and other coworkers. This tracker is used to evaluate the integration of a learning initiative into a system. This tool helps in the evaluation of efforts to institutionalize or mainstream an initiative within a formal education system. Institutionalization tracker, also known as "vertical scaling," is one method for increasing educational impact. This tool also aims to assess the integration of an education initiative into the existing education system as a dynamic planning tool for the implementer, policymakers, and funder to identify and address areas that require additional attention. According to CUE, "Institutionalization tracker," 2021 defines these trackers as a tool to measure the progress of efforts to integrate an initiative into the education system and identify areas that require additional attention to strengthen institutionalization. The ultimate goal is for the initiative to become a part of the government's policies, plans, procedures, budgets, and daily activities; ideally, the initiative will no longer stand alone or be branded separately but will effectively "disappear" into the broader system, ensuring its long-term sustainability.

The tool is organized by educational system building blocks, which are further subdivided into specific elements. There is a set of criteria to consider when assigning a score to each element, as well as a column for providing an explanation for the score chosen. The scale is 1-4, with 1 representing "low institutionalization" and 4 representing "full institutionalization." It is important to remember that the amount of progress required to move from a score of 3 to 4 is typically much more significant than the amount of progress required to move from 1 to 2. In simple words, a scale of 1 to 4 defines:

1. defines as "low institutionalization",
2. defines as "emerging institutionalization",
3. defines as "significant institutionalization", and
4. is defined as "full institutionalization".

Where 3 to 4 scores should be typically greater than 1 to 2 score

This tool assesses the progress of institutionalization efforts related to a single government agency or ministry, namely the Ministry of Education (MoE). The tool is intended to track progress toward national-level institutionalization, but it can also track institutionalization for the appropriate sub-national education authorities in a decentralized system. It is especially recommended that this tool be used in conjunction with a resource such as the Center for Universal Education's (CUE) "Scaling Strategy Worksheet" to inform the development and/or refinement of a broader scaling strategy. So, this way, both the tools: scaling strategy and institutionalization trackers are related. Here, this tool is usually used by the same group of stakeholders in the same interval of approximately 6 months.

This tool has two major components that are used to scale the institute based on two factors: system building blocks and elements. There are eight system building blocks and 18 elements based on the system building blocks. The system building blocks and element to its respective is mentioned below (Table 2)

Table 2: System building block and element of Institutionalization Tracker

System building blocks	Elements
Scaling strategy	Vision and pathway
Governance	Planning Policy Leadership
Human resources	Supervision and support Pre-service training In-service training Recruitment and retention Personnel
Information	Learner assessment Monitoring, evaluation, & learning (MEL) Data management
Curriculum and material	Procurement and distribution Curriculum/standards
Equity and inclusion	Equitable inclusive access
Stakeholder engagement	Opposition Demand generation
Finance	Finance

This helps in determining the action by measuring system building blocks and elements with proper tracking of scaling of an institute. Later, based on the questions and the responses, ratings are made, scaling from 1 to 4. Once the questions are asked to the respective person on the basis of the elements and system building blocks, the scores are added to the radar graph. And in that way, we analyze and check the readiness of that institution.

Sample of Radar Graph

A radar or spider graph is one way to display the results of the institutionalization tracker visually. This type of chart helps facilitate discussions about which aspects of

institutionalization to prioritize as action items moving forward, as well as visually display progress over multiple uses of the tool. A radar graph with two rounds of results is shown below as an example.

Graph 1: Sample Radar graph
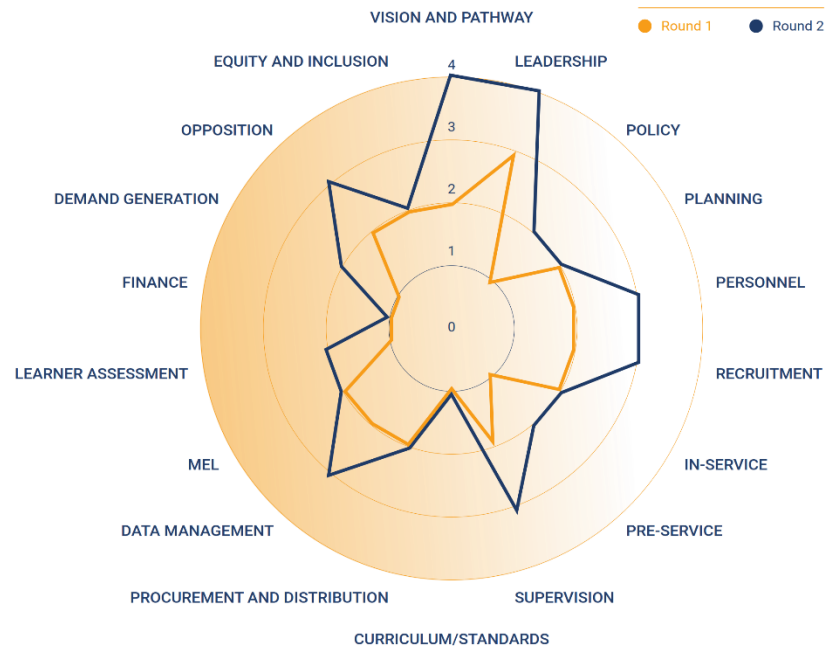
Source: CUE "Institutionalization Tracker" 2019

Note: This radar graph visually depicts a sample of two rounds of results from the tracker and can help determine priority actions.

In this way, both the tools: The scaling strategy worksheet and institutionalization tracker, have been used to determine the indicators to scale and check the readiness of the educational institution.

3.4   Selections Of Respondents

The scaling strategy part of the study is informed through the data collection of the two PhD students. The institutionalization tracker was administered during Intervention I and Intervention II, which had five respondents (Community action group leaders) and 21 respondents (Education officers, Principal/Headteacher, and ECA in charge/School teachers), respectively. They were interviewed to determine their intervention's indicators, vision, and scaling strategy using a scaling strategy worksheet. In the meantime, educational officers, coordinators, stakeholders, representatives of supporting organizations, and educational institutions from the project site in Rautahat District were interviewed and scored using the Institutionalization tracker. Their brief explanation is mentioned below.

Findings and Analysis

4.1 Determining the indicators and strategy for scaling two intervention program as Intervention I and Intervention II

As part of my research, two PhD candidates were interviewed to determine the indicators and plan for expanding a program by looking at their intervention. These two interviews, which are briefly described below as Intervention I and Intervention II, support determining how scaling indicators can be determined and scaling strategies can be used and implemented in order to determine the program's potential for scaling using the "Scaling Strategy Worksheet".

4.1.1 Intervention I - Campaign through action groups enhancing inclusive access to public schools for OOSC and children at risk of dropping out

The first interview was with a representative/innovator of the intervention/initiative titled "**Campaign through action groups enhancing inclusive access to public schools for OOSC and children at risk of dropping out**". Providing short detail and background of this intervention of project "Effectiveness and Scalability of Programs for Children Who Are Out of School and at Risk of Dropping Out in Bangladesh, Bhutan, and Nepal ''. With regard to practices, methods, and tools used to identify out-of-school children and those who are at risk of dropping out, this 31-month project aims to gather evidence on what works and what does not. The municipality of Durga Bhagwati Rural in Nepal's Rautahat District serves as the intervention site. This rural municipality in the eastern Terai is located on the Bagmati River's western bank. There are 5 distinct wards in the rural municipality: Gangapipara, Bhalohiya, Matsari, Pachrukhi, and Badharwa. In the Rural Municipality where this intervention will initiate, there are 2 secondary schools, 2 lower secondary schools, 12 primary schools, and 1 madarasha.

Based on the guidelines for developing a scaling strategy, specific brief questions were asked to determine the indicators and strategy for scaling that program. Based on their responses, the following findings and analysis have been developed.

i.   Vision

The "Campaign through Action Groups Enhancing Inclusive Access to Public Schools for OOSC and Children at Risk of Dropping Out" aims to improve inclusive access to public schools for OOSC and children at risk of dropping out. It aims to

achieve this goal with the help of action groups and parent capacity building on school functioning and discussion groups.

The problem that this intervention is attempting to address is parental disengagement and illiteracy about the value of education. Following a situation analysis of the research site's educational background and parent engagement, it was discovered that parents enrolled their children in order to receive free stationery, uniforms, free school meals, and scholarships rather than education. This indicated that parents were/are unaware of the value of education. Along with this, it has been discovered that the major issue and gap is the disengagement between the community (parents) and the school. A huge gap has been seen when schools should be closely engaged and actively participate between community people and school authorities, a core problem that this intervention aims to address.

This intervention's expected result/outcome is to raise community awareness about the importance and right to education and to help parents voice their opinions and be effectively/positively involved in improving the school environment. Children who are not in school or who are at risk of dropping out, their parents or guardians, and the community of the project's intervention site—the Durga Bhagwati Rural municipality in Nepal's Rautahat District—are the primary targets/focus of this intervention. 2 secondary schools, 2 lower secondary schools, 12 primary schools, and 1 madrasa from five different wards of that rural municipality will be focused primarily.

To summarize, the core vision of this intervention is to improve inclusive access to public school for all and to promote the importance and right to education to parents and the community for better education.

ii. **Summary of scaling strategy**

Understanding the intervention's scaling strategy, Darcy Riddel and Michele-Lee Moore (2015) define scaling deep in the context of social innovation and change as changing people's deeper values, cultural beliefs, meanings, and practices, as well as the qualities of their relationships, to bring about change. For example, investing, improving, and impacting one tree to produce better and more fruits. So, about the intervention, scale deep is/will be used to improve the available resources and action groups to bring about a positive change in the attitude of parents, teachers, and the community toward the importance of education. Action group formation, mother's group (Aama Samuha), and children group (child group) will be scaled and focused on to increase community capacity and collective capabilities.

The intervention's implementer intends to carry out a variety of activities in order to scale the proposed initiative and sustain its benefits. To begin, activities such as street dramas, role models, and sharing information about child labor and child rights will be carried out to raise community awareness of the importance of education (return to education). These activities aim to raise community awareness through various media and awareness programs. Second, improve the

school environment and create a positive space for parents to express themselves and engage; in activities such as a participatory rural appraisal of a community school, formation of an action group, orientation action group functionality, group task on OOSC identification & counseling, orientation on social audits, complaint hearing mechanism, school meal, calendar, absenteeism & consequences, school monitoring, PTA, Pallika consultation meeting on PTA formation, and more. It intends to establish a productive action group through all of these activities and a positive environment where parents can learn about how the school runs, voice their opinions, and get involved.

With this analysis, the overall scaling strategy of the intervention will be determined based on the proposed initiative to scale, elements being scaled, plans and activities within the initiative, and potential issues or challenges that may arise. And while doing so, it has become clear that the precise issue and challenge cannot be identified because the intervention has yet to be implemented. However, some of the issues and challenges were identified during the baseline survey/situation analysis. Due to the community's diversity, social and cultural barriers may arise. There, it was discovered that Dalit people/communities are not permitted to engage and express their opinions and views on any subject. As a result, when parent-teacher meetings, school monitoring, or any other opinion-sharing activity occurs, the involvement and participation of such a community may create issues and challenges. And in this intervention, a possible solution cannot be manifested because forceful action is neither possible nor ethical.

In conclusion to the summary of this intervention's scaling strategy, it has been discovered that the "scaling deep" approach is being used, where various elements such as community capacity, action group formation, active mother group, and children's group will be scaled. Various campaigns and activities are also being planned and will be proposed to scale the initiative and sustain its benefit. Finally, potential issues and challenges are identified, along with potential solutions for the overall intervention scaling strategy.

iii. Credibility of the proposed initiative

Following the vision and summary of the intervention's scaling strategy, the feasibility and credibility of the initiative were also questioned, such as its core strategy, evidence (source) for the need for this intervention, and trustworthiness rate.

The intervention's core strategy is to campaign and mobilize the action group about the importance of education, focusing on parents and the community. When asked about the current evidence supporting the proposed initiative, the intervention's innovator stated that formative research during the baseline survey revealed that the most appropriate method to mobilize and bring inclusive access to public education campaigns would be the most appropriate. In support of this, an example or source was of an ongoing campaign titled "Beti Bachau - Beti Padhau" in Province 2, Nepal, which began on January 15, 2019. This campaign

began in India and has since spread to many states and countries, intending to encourage girls' education through an insurance scheme.

Furthermore, because similar campaigns have had positive results, the intervention "Campaign through Action Groups Enhancing Inclusive Access to Public Schools for OOSC and Children at Risk of Dropping Out" was/has been proposed. In addition, while conducting a situation analysis to understand the current situation in that area, it was discovered that the use of social media (Facebook/Youtube/Tiktok) is widespread in that community. It has also been discovered that school-age youth heavily use social media. Another popular method of campaigning was using hoarding boards with exciting images, loudspeakers in moving vehicles, and street dramas. Furthermore, it has been rated as the most appropriate method for conducting education-related campaigns in that area. Finally, when asked to rate the intervention's credibility or trustworthiness on a scale of one to five, the innovator gives it a three.

In conclusion, this demonstrates that the innovator is clear and has a definite strategy plan for the intervention, as well as proper research that has been done to determine whether or not the intervention works. Proper evidence and a source have also been provided. Finally, when asked to rate their intervention, the innovator gives it a 3 rating, which is above average, demonstrating the innovator's confidence and trustworthiness.

iv. **Recognition of the problem and support for the change**

Every intervention begins with recognizing a problem and a desire to solve it in order to achieve positive and long-term change. Wherever a problem is recognized as significant and persistent by communities and practitioners, and where policymakers perceive the problem as urgent, there are more opportunities to gain support for and legitimize the proposed initiative. Specific questions were asked to determine the need for the intervention in this section, which is briefly discussed below.

At first, when asked if having any evidence or data proving the proposed intervention is necessary and beneficial to the program attempting to be solved, it was found that a campaign promoting the importance of education is necessary for that community. For providing inclusive education, proper infrastructure, resources, trained teachers, policy & law, and more is mainly required. Also, when discussing common factors behind dropping out and out of school, mostly the reasons are economic challenges, social & cultural barriers, language issues, and more. But one of the other main reason/evidence behind proposing this intervention is for children kept at home for household chores rather than out working chores. Besides, on the basis of the situation analysis, two main problems have been focused on and analyzed.

The first is the reason for dropping out and leaving school. As previously stated, when conducting baseline research/situation analysis, it has been found that the primary reason for dropping out (42.9%) and not enrolling a child in school (44.1%) is the responsibility to support the family economically. In this intervention,

economic support does not have to be direct, such as working for a living but could be as simple as looking after siblings and doing HH chores while parents are at work. This, combined with the fact that 11.4 per cent of children are involved in either income-generating activities or HH chores for more than 3 hours, suggests that there is an urgent need for intervention in the areas of child labor and the creation of a home learning environment for future retention and enrollment of students. It was also found that involving children in household chores or other working chores in the belief that being literate and getting a job in the future is difficult, whereas earning throughout the day is simple. Second, 71.4 percent of the 63 children (involved in income-generating activities or HH chores for more than 3 hours) stated that they could not do their homework after work. Similarly, 54 per cent missed school to do the work, and 77.4 percent were either late or left school early to do the work. This data demonstrates a direct relationship between child labor/participation in HH work and school attendance. This shows how parents least prioritize their children's education.

As a result, sufficient data and evidence have been presented, analyzed, and drawn conclusions about the core issue and the necessity and benefits of the suggested intervention in resolving it. Second, understanding the potential benefits or potential coalitions from the proposed initiative to promote change and/or mitigate the effects of opposition change; the innovator claims that many people will benefit from this intervention. And some of the main ones are: educating community members and parents about the importance and benefits of education; educating parents about their voice and opinion towards their children's better future and rights; assisting in the reduction of children dropping out of school; and, finally, assisting policymakers, educational officials, and innovators in developing guidelines and data for future educational innovation.

Similarly, when asked how the proposed initiative relates to current national, regional, or local priorities, the innovator provided a list of ongoing initiatives and policies to improve education for all. As an example, consider SDG Goal 4: Quality Education, a policy made by the Nepal government for the establishment of PTAs and SMCs, and other initiatives. In conclusion to the overall finding of problem recognition and support for change, it can be concluded that proper initial baseline research was conducted to understand the current situation in the intervention area. In addition, the innovator was able to provide evidence and data to support the need for their intervention and its beneficiary. Finally, the innovators could justify their intervention by connecting it to current national, regional, and local priorities.

v. **Advantage of proposed initiative over alternatives and to the status quo**

Few significant questions were raised in order to determine how effective and/or efficient they were compared to other strategies or maintaining the status quo. It has also been informed the innovators that it is impossible to determine the effectiveness of the intervention until after it has been put into practice and the final results are known. However, because this intervention is supported by one of the organizations, "Aashma Nepal," the innovator believes it will be effective.

When asked what the benefits of the proposed initiative would be, the innovators stated that: the current action group and more active groups will be active and promoted all over Province 2, and barriers will be drawn out regarding why action groups are not being able to engage in the community, challenges can be drawn out from this intervention to know the core challenges for better education to all and community disengagement towards school/education. Eventually, because the intervention has not yet been implemented with an end result, it is impossible to demonstrate its benefit and effectiveness. However, the innovators have shared only a few key beneficiaries outputs and benefits from their intervention.

vi. Enabling conditions and partnerships for scaling

A significant part of support, planning, and partnership/collaboration is required for any successful project or initiative. In addition to partnerships/collaboration with other key stakeholders in the education system, this requires champions, incentives, market and/or community demand, and certain "enabling conditions" (financial, institutional, political, social, and cultural). And for this intervention, the following information has been disseminated: who are the helpful resources, potential challenges, and collaborators/partners who already exist to support the scaling.

For this intervention, it has been discovered that the partnership and support of the Rural Municipality and "Aashma Nepal" (supporting organization) is the primary element in the more extensive system that is most likely to be helpful resources and support for scaling. When asked about the critical and potential challenges of this partnership, the innovators highlighted how the intervention site's principal/school teacher is unsupported and non-collaborative. Later, when asked about existing collaborations/partnerships to support the intervention and care, it was discovered that the supporting organization "Aashma Nepal" has been closely supporting and providing various logistical and human resources for the intervention and support. In addition, because there are mother and child groups, the innovators intend to work with them for more effective action and active partnerships. Those groups (mothers and children) are currently silent.

Finally, when asked who the partners are who are sorely needed to support the scaling, it has been found that the teacher association's support and partnership are a must for sore scaling and effective intervention. In conclusion, we can conclude that this intervention needs more collaboration and partnership. Furthermore, because this is an educational initiative, the collaboration and support of teachers and educational officers are seen as crucial.

vii. Ease of transferring and applying the initiative at scale

It is necessary to clearly understand the issue, develop a solution strategy, plan, and carry it out. It is also necessary to recognize and address any challenges that may arise after the intervention is put into place. Implementing an initiative at scale necessitates thinking about how the solution can be adapted to meet the needs of different or expanded populations, as well as the requirements of the

larger policy environment. And for this specific question about possible changes, difficulties, and possible mitigation to overcome those difficulties, a brief answer is provided below.

As previously stated, the intervention still needs to be implemented. Consequently, it is challenging to mitigate what may be the most difficult changes, strategies to overcome them, core components to preserve, and what elements may be eliminated for a more simplified/cost-effective model. However, based on the baseline data/situation analysis, the innovators believe that the most challenging change required to implement the initiative on a larger scale is the community's willingness to form an action group. To ease this difficulty, the innovator suggests that regular meetings (monthly) between teachers and parents, teacher associations, and parent discussions be held.

As a result of this section, it is clear that in order to understand and plan for potential challenges and difficulties while scaling the initiative, this type of worksheet and scaling strategy should be planned and implemented for any initiative. This will not only assist the scaling strategy but will also assist in the effective planning of the intervention.

viii. Organizational capacity to implement initiative at scale

Moving forward, it is critical to understand whether the intervention will work on a larger scale or not. Moreover, for this, it is necessary to understand that adapting, scaling, and sustaining an initiative while considering quality, equity, and efficiency necessitates strengthening and, in some Interventions, expanding the capacity of the organization or institution to deliver on a large scale. These capabilities are more than what is needed on a small scale. So, in order to determine whether the innovator has considered what organizational capacity and elements are required to scale the initiative, a few questions were posed, the answers to which are detailed below.

It has been found that for the current implementing organization(s) working on and supporting the intervention: Aashma Nepal has been a great asset in developing and supporting the capacity to scale the initiative. And after briefly explaining and planning the intervention, it was found that if it worked effectively and as planned with positive changes, this intervention would be taken too many other districts in Nepal for quality, inclusive, and better education for all, leaving no one behind. When asked what institutional capacity for large-scale implementation is lacking and should be addressed, there was no response because the intervention has yet to be implemented to identify potential capacity gaps and ways to address them.

And, because this intervention is well known, and many campaigns have been carried out in a variety of ways and on a variety of topics, the innovator of this intervention was asked if the implementation will be transferred from one organization to another (such as a government), how that will happen, and what the potential risks are. And for this, the innovator explains that the intervention's vision can be shared and achieved by mobilizing and building the capacity of the

action group, as well as the support of the province level and government for fruitful and strong support. Furthermore, as a result of the baseline data/situation analysis, the innovator shared that challenges and difficulties may arise from the community and teacher association sides. The community is already diverse, making it difficult to mobilize and gather everyone in one place. Furthermore, because the community/intervention site is politically powerful, there is a risk of imposing the intervention forcefully. It has also been mentioned that the idea of emphasizing the importance of education may be shared by some. And finally, even if there is strong engagement with the intervention (campaign), one of the most significant risks that the innovators assume is what will happen if student enrollment is still low with high dropout rates. Finally, when asked how adequate resources and capacity will be secured if additional human and institutional resources are needed to support "going to scale" or delivering scale, the innovators promote more human resources for language translation, door-to-door information sharing, street drama, action group team, and other activities.

As a result of this section on understanding organizational capacity to implement initiatives at scale, it is possible to conclude that more organizational support is required at all levels if the intervention is transferred from one organization to another. Furthermore, even if the risks and challenges that may arise while intervening are assumed by the innovators. Finally, this description shows how adequate resources can help the intervention reach more people and work more effectively, efficiently, and equitably from a small to a large scale.

ix. Financial sustainability of proposed initiative

When it comes to moving forward in understanding the financial sustainability of the intervention at scale, in most Interventions, the initial funding is sufficient while working on a pilot test. However, when the same thing is done on a larger scale, funding insufficiency becomes a major issue. As a result, innovators, planners, or any government must plan for the budget cycle early in the process of developing a scaling strategy. So, when asked about the financial sustainability of this intervention, the following was discovered.

As this intervention is part of a project that will last nine months, the project will provide financial support until then. Also, when asked if the intervention is being carried out within the existing system, utilizing infrastructure, human resources, and so on, the innovators stated that they are working within those elements. However, for long-term sustainability, the innovators intend to seek support from the rural municipality. These financial resources are primarily needed to actively run the action group, run the campaign with interactive door-to-door activities, and spread the importance of education to all. In addition, the innovators recommend that, in order to mobilize long-term domestic financing, the central government share the results and form an active action group to share available data, research, and information for better future development work.

In conclusion, it concludes that the innovator is aware of the financial support that is currently available and will be required in the future if the invention continues to

exist. This includes being aware of whom to approach for financial and other resource support and making the best use of existing human resources, infrastructure, and so on.

x. Action, milestones, and timetable

At last, for any project interventions, the action, milestones, and timetables of how things are going to work and potential challenges with mitigation strategy should be explored. It is necessary to understand the details of what to support and what is required for monitoring, financing, and reporting on scaling progress, assumptions, and strategies that may be required. In addition, the innovators were asked about their monitoring and evaluation strategy, what additional support is needed, reflection and ongoing learning, and who should be in charge of monitoring and reflection activities, as well as a timetable for these actions. For which the following brief response has been provided by the innovators for this proposed intervention.

Monitoring initiatives on a larger scale necessitates different methods and tools than monitoring a pilot or on a smaller scale. This includes gathering data on the scaling process, determining whether the initiative's impact can be sustained at a larger scale, and determining what changes to the initiative and scaling strategy may be required. The innovator urged that the monitoring be done by the action group, facilitator and educational officer of that municipality because they will be on the ground implementing the intervention. They will be the ones to evaluate the monitored data/situation and make any necessary changes to the action plan. At the same time, the rural municipality should be monitoring and evaluating the intervention for better change.

In addition, the innovator believes that nine months for any intervention is insufficient time to make changes from the intervention and find a positive outcome. As a result, the innovator recommends that the intervention last at least two years in order to produce positive and effective results. And for this financial to be sustainable, it requires support from all sectors, including parents, teachers, municipalities, and action groups.

Finally, when asked about the individual reflections and ongoing learning that occur as a result of understanding the problem and finding a solution as an intervention, the innovator shares and suggests many things. Among the major contributions are:

- The innovators can understand what parents are thinking and the actual problem behind dropping out and out of school children, as well as how political agendas and issues affect education and people leadership.
- the value and significance of education in Nepal's Province 2
- Parents' ideologies about wages being educated and uneducated, focusing on the short term rather than the long term, understanding of how the Dalit community is excluded, and how people from the Dalit community perceive education. This means that the Dalits in that area believe that education is not for them.

- finally, even if there is a province, SMC, PTA, and more engagement programs should be established. None of them is available. As a result, the innovator shared the reflection and ongoing learning of this intervention in many different ways. Finally, it can be concluded that the innovator is aware of who should monitor the intervention activity and has good reflection to date. However, more action and planning from the innovator and project side are required to monitor, evaluate, and make changes to the plan as needed.

In conclusion to understanding and analyzing the entire scaling strategy worksheet of Intervention I: "**Campaign through Action Groups Enhancing Inclusive Access to Public Schools for OOSC and Children at Risk of Dropping Out**", it can be concluded that the innovators are well aware and have drafted the intervention plan well with vision, scaling approach that will be used, creativity, recognition of problem and support of the change, with partnership/collaboration and organizational capacity. However, because the intervention has not yet been implemented, difficulties or challenges may arise and create some challenges/barriers while implementing the intervention. And in relation to the objective of this research, it is clear that with proper in-depth interviews with innovators in the field of education for any intervention or initiative, indicators of scaling can be determined with the necessary strategy for scaling that program. Also, it is clear from this that a scaling strategy can be implemented to know the potential of scaling the program.

4.1.2   Intervention II - ECA After School

The second interview was with a representative/innovator of the intervention/initiative titled "**ECA After School**". **Providing sharp detail and background of this intervention**. Unlike intervention of Intervention I, this intervention is also" Effectiveness and Scalability of Programs for Children Who Are Out of School and at Risk of Dropping Out in Bangladesh, Bhutan, and Nepal". With regard to practices, methods, and tools used to identify out-of-school children and those who are at risk of dropping out, this nine-month project aims to gather evidence on what works and what does not. For this intervention, three rural municipalities have been chosen and serve as the intervention sites. Those three are Durga Bhagwati RM, Yamuna Mai RM, and Rajdevi municipality. In this intervention, three schools from each of the three municipalities were chosen for the intervention's initial implementation. As a result, this intervention will target nine schools in those three municipalities.

Based on the guidelines for developing a scaling strategy, specific brief questions were asked to determine the indicators and strategy for scaling that program. Based on their responses, the following findings and analysis have been developed.

i. **Vision**

The "**ECA after-school**" intervention aims to enhance the students' creativity and happiness through various extracurricular activities such as dance, sports,

drawing, arts, and so on. The innovator also mentions that by doing these things, the intervention's goal is to retain students in school and make students/children healthy through ECA.

The intervention's problem is the dropout rate of students and the low participation of children in extracurricular activities. Moreover, for this problem, the intervention is attempting to address the issue of dropouts by retaining students and involving them in various activities with the active participation of the ECA in charge or the teacher. This intervention's expected result/outcome is to determine student participation in extracurricular activities and dropout rate in one academic year.

To summarize, the overall vision of this intervention is to strengthen the ECA of public schools as a booster to already existing programs and policies for school-aged children. Furthermore, this intervention envisions a happy and creative environment for children through various fun activities.

ii. Summary of scaling strategy

When it comes to an understanding of the intervention's scaling strategy, this study found that "Scale up" is/will be done. Here, scale-up is defined as scaling any initiative by boosting its efficiency from existing resources. So, in relation to the intervention, scale-up is/will be used to improve the available resources and activities in order to bring about a positive change in the reinforcement of already existing programs and policies of ECA for children.

The intervention here intends to carry out a variety of activities in order to scale up. To begin, this intervention plans to provide schools with various materials (resources) such as paint, coloured crayons, art notebooks, story books, and other items. Along with this, it intends to provide training and capacity building for existing teachers through various art, engaging activities, and arts training. It also intends to provide resources to Pallika (municipality) so that they can share information and ways for students to learn and use ECA. This intervention plan is used to bring the proposed initiative to scale and sustain its benefits by running ECA after school once a week on Friday for 1-2 hours within the school premises. This is because the school runs full literature/academic days on other days, but ECA is only half a day on Fridays.

Lastly, when asked if there is a plan in place to address the various ways the issues or their solutions may manifest in different populations and contexts, the innovator mentions that the intervention should be made a ritual. Because the community is made up of many different religions, particularly Muslims, students are unable to participate in extracurricular activities on Fridays. Furthermore, because the community is economically impoverished, students are forcibly taken away from school right after their classes by their parents in order to assist with household and other economic activities. Because of these issues, the innovator believes that, despite economic, social, and cultural barriers, the intervention should be made regularly so that the children are drawn to participate.

Overall, summarizing the scaling strategy of this intervention, it is clear that the scale-up strategy will be used, and the innovator is aware of possible issues and solutions that can be caused by different populations and contexts.

iii. Credibility of the proposed initiative

Following the vision and summary of the intervention's scaling strategy, the feasibility and credibility of the initiative were also questioned, such as its core strategy, evidence (source) for the need for this intervention, and trustworthiness rate. The intervention's primary strategy is to involve school teachers in ECA, which is an existing policy and program assigned by our Nepalese government. However, due to various challenges and issues, this is not directly possible; thus, the intervention's core strategy focuses on partnership, collaboration, and collaboration with Pallika, the intervention site's head. By doing so, the innovator mentions that while working with the Pallika head, the focus will be more aligned and will assist Palika in engaging and monitoring all schools to see if they are practicing and providing ECA or not.

As a result, all students and teachers will be aware of ECA and will be required to practice it. As evidence for the proposed initiative, the innovator provided a few examples of the current level. To begin with, this is not a relatively new intervention; however, the Government of Nepal has endorsed this after-school program. As evidence and example, the innovator refers to a study conducted in Illam, Kathmandu, Gorkha, and Rupandehi among children with disabilities that found adequate participation in ECA led to retention in school and involvement in ECA led to success (Dynamic institute of research and development (P) Limited, 2014).

Another example is from the Haliya community, where the same type of intervention was used, as evidenced by the innovator. Finally, when asked how trustworthy their intervention is on a scale of 1 to 5, the innovator gives it a 3 rating. In support of the score, the innovator shares that during the situation analysis, teachers from all three municipalities urged that the ECA be implemented and that doing so would result in a change in student participation and activeness.

In conclusion, this demonstrates that the innovator is focused and has a clear strategic plan for the intervention, as well as proper research to determine whether or not the intervention works. There is also proper evidence and a source. The respondent/innovator rated the intervention as 3 points demonstrating the innovator's trustworthiness and confidence.

iv. Recognition of the problem and support for the change

Every intervention begins with identifying a problem and the desire to solve it to achieve positive and long-term change. Wherever communities and practitioners recognize a problem as significant and persistent and where policymakers perceive the problem as urgent, there are more opportunities to gain support for and legitimize the proposed initiative. This section explains how well the

intervention links to the problem identified and to what extent it can contribute to the change envisioned by the innovator for the beneficiaries.

At first, while conducting baseline analysis, the innovator discovered that, despite the provision of a mandatory ECA program in all schools, this needs to be implemented in many schools in Rautahat district. In addition, it has been discovered that the budget for teacher salaries, materials and resources for the school, and infrastructure is insufficient due to poor economic status and mismanagement. Furthermore, it is for this reason that the ECA program and active participation from the teacher need to be visible. Furthermore, despite the fact that various types of training and workshops have been provided to teachers, they insist that due to limited resources and the passive participation of students, they are unable to engage in any extracurricular activities. The innovators argue that this intervention is necessary and best when existing programs are reinforced to bring positive changes and better education to all based on the evidence and data gathered through a situation analysis.

Second, the innovator claims that many students and teachers will benefit from this intervention; therefore, it is important to understand the potential advantages or potential coalitions from the proposed initiative to promote change and/or mitigate the effects of opposition change. Initially, the children will find and have a space to learn and play through various extracurricular activities. Furthermore, teachers will be more aware and have the dignity to demonstrate activeness, love, respect, and duty towards their job and the responsibility given to them by the government and Pallika. Furthermore, because the intervention is being carried out in close collaboration with the Pallika head, it is expected that teachers' tendency toward their duties will increase, as it has been discovered that teachers are not interested or active in taking the lead and practicing ECA with the students. The innovator proposes the initiative based on these numerous benefits.

Third, when asked how the proposed initiative relates to current national, regional, or local priorities, the innovator provided again mentions that the intervention is not new but the reinforcement of existing policy and program, i.e. the Education Sector Plan 2021-2030, which states that in relation to subject-centered teaching, schools will be required to prepare plans for students and take responsibility for arranging their participation in various extracurricular activities and community events (Government of Nepal, MoEST, 2021).

In conclusion, proper initial baseline research was conducted to understand the current situation in the intervention area based on the overall finding of problem recognition and support for change. Furthermore, the innovator was able to provide evidence and data to support the need for their intervention and its beneficiary. Finally, the innovators were able to justify the need for their intervention by connecting it to current national, regional, and local priorities.

v. Advantage of proposed initiative over alternatives and to the status quo

A few important questions were raised in order to determine how effective and/or efficient they were in comparison to other strategies or the status quo. The

innovators have also informed it that it is only possible to determine the effectiveness of the intervention once it has been implemented and the final results are known. However, because the intervention is not new and reinforces existing programs and policies, the innovator intends that community members, school representatives, and students will understand and benefit from the after-school program. In addition, this intervention will help students learn new things while also assisting teachers in using new things to engage their students in their free time.

Here, the innovators responded that the implementation of an after-school program with extracurricular activities might increase because teachers are aware of and they have also internalized its importance. However, due to some economic, social, and management problems, the implementation still needs to be done. As a result, the innovator believes that the proposed initiative is more efficient and practical.

Eventually, because the intervention has yet to be implemented with an end result, demonstrating its benefit and effectiveness is impossible. However, the innovators have stated that this intervention will provide advantages such as student creativity, a happy and healthy environment for students, skillful learning opportunities, student retention, and a desire to come to school to play and learn.

vi. Enabling conditions and partnerships for scaling

A significant part of support, planning, and partnership/collaboration is required for any successful project or initiative. In addition to partnerships/collaboration with other key stakeholders in the education system, this requires champions, incentives, market and community demand, and certain "enabling conditions" (financial, institutional, political, social, and cultural). And for this intervention, the following information has been disseminated: who are the helpful resources, potential challenges, and collaborators/partners who already exist to support the scaling.

For this intervention, it has been found that the Rural Municipality's cooperation and support, as well as those of the governing bodies, Pallika's action, and governance, are vital. Following that, this intervention has been and will be run in collaboration with the municipality's head for all activities. Furthermore, it has been found that there are and may have some challenging factors while scaling with helpful resources. One of the challenges would be parental involvement in their children's extracurricular activities. Because the community is already economically and socially backward, the parents are always busy with their work and require assistance. In this situation, parents visit the school to pick up their children immediately after classes end so that they can help with household chores and other responsibilities. Second, there are difficulties when it comes to involving and retaining teachers. As teachers, they are least interested in extracurricular activities for their students; this may and is a significant challenge while scaling. However, for this intervention, the Pallika head, educational officer, and the majority of the head teachers (principals) are already existing partners to help with scaling.

At last, this intervention requires increased collaboration and partnership. Furthermore, because this is an educational initiative, the collaboration and support of teachers, parents, and educational officers are considered essential.

vii. Ease of transferring and applying the initiative at scale

It is necessary to have a comprehensive understanding of the problem before developing a solution strategy, planning, and carrying it out. It is also necessary to identify and address any problems that may arise after the intervention is implemented. Implementing a large-scale initiative necessitates considering how the solution can be tailored to meet the needs of different or expanded populations, as well as the needs of the larger policy environment. And a brief answer is provided below for this specific question about possible changes, difficulties, possible mitigation to overcome those difficulties, and more.

As previously stated, the intervention still needs to be implemented. As a result, it is challenging to mitigate what may be the most difficult changes, strategies to overcome them, core components to preserve, and what elements may be eliminated for a more simplified/cost-effective model. However, based on the baseline data/situation analysis, the innovators believe that the most challenging change that will be required to implement the initiative on a larger scale is the community, teachers, and children's willingness to participate, support, and sustain the program actively. The innovator urges that despite the government having a policy and after-school programs in all schools, due to lack of monitoring, unmanaged government work, resources limitation, and teachers' active participation, it has and can cause difficulties. To ease this difficulty, the innovator suggests that regular meetings (monthly) between teachers and parents, teacher associations, and parent discussions be held. Moreover, along with this, teacher authority should be monitored by the municipality head for more participation and mandatory work.

Later, when asked if there are any activities or components that the innovator would like to keep while scaling, it was discovered that the innovator would like to keep the midday meal as well as dedicated teachers. Later, when asked what should be eliminated, the innovator says those teachers' attitudes, political issues, passive participation by teachers, and negative dedication to their work should be omitted and eliminated.

As a result of this section, it is clear that this type of worksheet and scaling strategy should be planned and implemented for any initiative in order to understand and plan for potential challenges and difficulties while scaling the initiative. This will not only help with the scaling strategy, but it will also help with the intervention's effective planning.

viii. Organizational capacity to implement initiative at scale

Moving forward, it is critical to determine whether the intervention will be effective on a larger scale. And in order to do so, it is necessary to recognize that adapting,

scaling, and sustaining an initiative while maintaining quality, equity, and efficiency requires strengthening and, in some Interventions, expanding the capacity of the organization or institution to deliver on a large scale. These capabilities are more than what is needed on a small scale. So, to determine whether the innovator has considered what organizational capacity and elements are required to scale the initiative, a few questions were posed, and the answers are detailed below.

It has been discovered that there currently needs to be an implementing organization(s) working on and supporting the intervention as it is a complete government program. When asked if there is any institutionalization capacity that is lacking and should be addressed, it was discovered that materials and resources required for extracurricular activities, such as physical infrastructures such as playgrounds, sports equipment, music instruments, and art materials, are lacking. Furthermore, because most public schools are in flood-prone areas, the infrastructure is not well-built, which frequently creates challenges in running the school smoothly with the destruction of infrastructure and resources. Untrained teachers are another component that needs to be improved. And it isn't easy to address these challenges without the strong support and decision of the government and municipalities.

Furthermore, because this intervention is well known and the program has been bought by the government, the innovators state that the program will only be sustained and effective if the municipality head monitors, evaluates, and sustains the program with a dedicated educational representative. In addition, the innovator mentions that this intervention is only for nine months and that there is no future plan to sustain it because it is the government's program and responsibility to make it more effective. In addition, the innovator mentions some of the risks involved, stating that despite a lot of effort and promotion about the importance of ECA, there may be less participation and a similar drop-out rate. What if student enrollment remains low despite high demand?

Finally, when asked how adequate resources and capacity will be secured if additional human and institutional resources are required to support "going to scale" or delivering scale, the innovators suggest that ECA, after-school programs, and student participation will increase. This will also contribute to an increase in the number of teachers and educators.

As a result of this section on understanding organizational capacity to scale initiatives, it is possible that more organizational support at all levels is required if the intervention is planned to be transferred from one organization to another. Furthermore, even if the innovators assume the risks and challenges that may arise while intervening. Finally, this description shows how adequate resources can assist the intervention in reaching more people and working more effectively, efficiently, and equitably on a small to large scale.

ix. **Financial sustainability of proposed initiative**

Moving forward towards understanding the financial sustainability of the large-scale intervention, in most Interventions, initial funding is sufficient while working on a

pilot test, but when done on a larger scale, funding inadequacy becomes a significant issue. As a result, innovators, planners, or any government must plan for the budget cycle early in the scaling strategy development process. When asked about the financial viability of this intervention, the following information was found.

As this intervention is part of a project that will last nine months, the project will provide financial support until then. Also, when asked if the intervention is being carried out within the existing system, utilizing infrastructure, human resources, and so on, the innovators stated that they are working within those elements. However, for long-term sustainability, the innovator intends that the intervention will be for nine months, that is, one academic year and has no plan to extend it. Eventually, it is concluded that the innovator is aware of the current financial support available and understands that it can be carried out with minimal resource support within the existing infrastructure, human resources, and so on.

x. Action, milestones, and timetable

At last, for any project interventions, the action, milestones, and timetables of who will be involved, as well as potential challenges with mitigation strategies, should be explored. Understanding the specifics of what to support and what is required for monitoring, financing, and reporting on scaling progress, assumptions, and strategies that may be required is essential. Furthermore, the innovator was questioned about their monitoring and evaluation strategy, what additional support is required, reflection and ongoing learning, who should be in charge of monitoring and reflection activities, and a timetable for these actions. The innovators for this proposed intervention have provided the following brief response.

Monitoring large-scale initiatives necessitate different methods and tools than monitoring a pilot or on a smaller scale. This includes gathering data on the scaling process, determining whether the impact of the initiative can be sustained at a larger scale, and determining what changes to the initiative and scaling strategy may be required. The innovator recommended that the educational officer of that municipality perform the monitoring because they will be in charge of assigning the intervention. Furthermore, with regular monitoring and support, the intervention can be sustained with effective results. Monitoring with videos and suggestions from students, teachers, and parents may also support the sustainability and effectiveness of the after-school program. In addition, the innovator claims that because the intervention has yet to be implemented, it is difficult to determine what changes and scaling strategies may be required. Finally, when asked about the individual reflections and ongoing learning that occur as a result of understanding the problem and developing an intervention, the innovator shares and suggests a variety of ideas. Among the significant contributions are:

- The innovators can understand what parents are thinking and the actual problem behind children/students' passive participation,
- The value and significance of education in Nepal's Province 2,
- The children/students there are keen to learn, but due to mismanagement and resource limitations, they aren't able to get the environment to learn more.

- Carelessness, mismanagement, teacher's behavior/attitude and political issues in that district, and more

As a result, the innovator shared the reflection and ongoing learning of this intervention in many different ways.

Finally, it is possible that the innovator is aware of who needs to monitor the intervention activity and has conducted adequate reflection. However, more action and planning on the part of the innovator and project team is required to monitor, evaluate, and modify the plan as needed.

In conclusion to understanding and analyzing the entire scaling strategy worksheet of intervention II: "**ECA after school**", it can be concluded that the innovator is well aware and has well drafted the intervention plan with a vision, and scaling approach that will be used, creativity, recognition of problem and support of the change, partnership/collaboration, and organizational capacity. However, because the intervention has not yet been implemented, difficulties or challenges may arise, posing challenges/barriers to its implementation.

And in relation to the research objective, it is clear that with proper in-depth interviews with innovators in the field of education for any intervention or initiative, indicators of scaling can be determined along with the necessary scaling strategy. It is also clear from this that a scaling strategy can be implemented in order to determine the potential for scaling the program.

4.2 Examining and assessing the readiness for scaling the institute of the intervention

To examine and assess the institution's readiness for scaling, both innovators' (respondents) intervention-related institutions have been examined. For this, intervention-related candidates have been interviewed, whose brief description has been mentioned below as Intervention I and II. To determine the readiness of that institution for scaling, "Institutionalization Tracker" has been used.

4.2.1 Intervention I - Campaign through action groups enhancing inclusive access to public schools for OOSC and children at risk of dropping out

To examine and assess the institute's readiness for scaling the intervention "**Campaign through action groups enhancing inclusive access to public schools for OOSC and children at risk of dropping out**", community action group leaders were interviewed in their respective wards. The intervention site is the municipality of Durga Bhagwati Rural in Nepal's Rautahat District. This rural municipality in the eastern Terai is situated on the western bank of the Bagmati River. The rural municipality is divided into five separate wards: Gangapipara, Bhalohiya, Matsari, Pachrukhi, and Badharwa. There are two secondary schools, two lower secondary schools, twelve primary schools, and one madrasa in the Rural Municipality where this intervention has begun. For this intervention, a community action group of 12-15

community members with one leader in each of the five wards has been formed for campaigning and sharing/discussing community education issues. And for this, five community action group leaders from five wards were interviewed in order to better understand the community situation and examine and access the ward using an institutionalization tracker.

Specific brief questions of different sub-elements of system building blocks such as scaling strategy, governance, human resources, curriculum & materials, information, finance, stakeholder, equity & inclusion were asked to understand and score for scaling that program based on the institutionalization tracker guidelines. This Intervention, Curriculum and materials were omitted in this intervention because the tracker was used forward rather than any educational institute. The following findings and analysis were developed using a spider/radar graph based on the responses of all five ward action group leaders.

Graph 2: Radar graph of five wards of Durga Bhagwati Rural Municipality
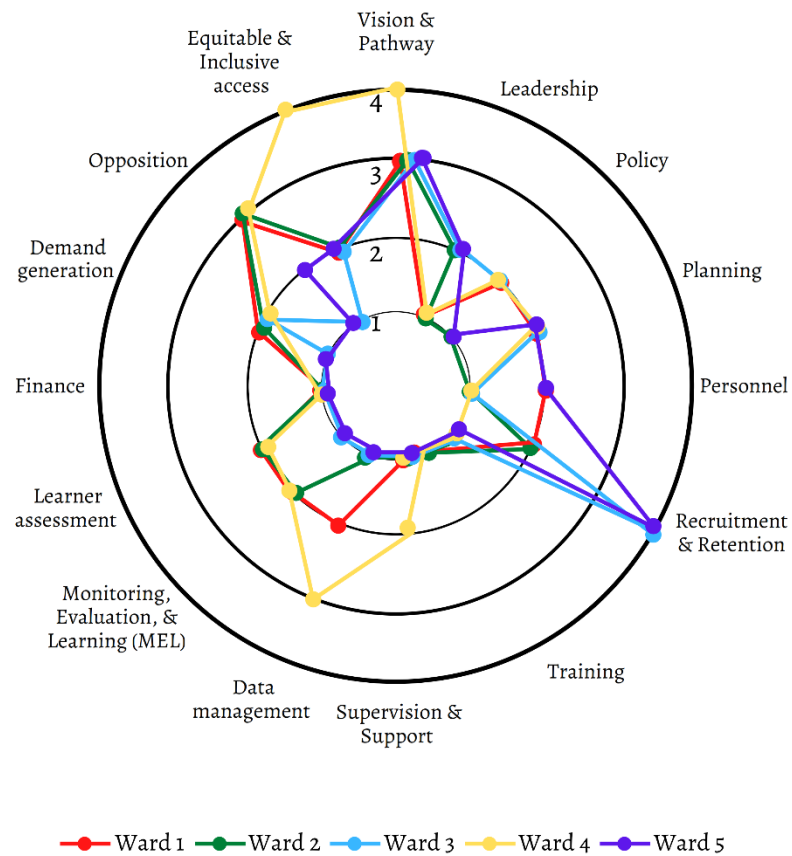
To begin, the above figure shows the results of the Institutionalization Tracker for all five wards of the Durga Bhagwati Rural Municipality. The score was assigned to examine the entire municipality wards based on the five respondents sharing all the elements. Red denotes Ward 1, Green denotes Ward 2, Blue denotes Ward 3, Yellow denotes Ward 4, and Purple denotes Ward 5. The figure appears complicated because it combines the scores of all Wards. As a result, we can clearly and

averagely understand the access of institution readiness for scaling from the figure below.

Graph 3: Radar graph of average of five wards of Durga Bhagwati Rural Municipality
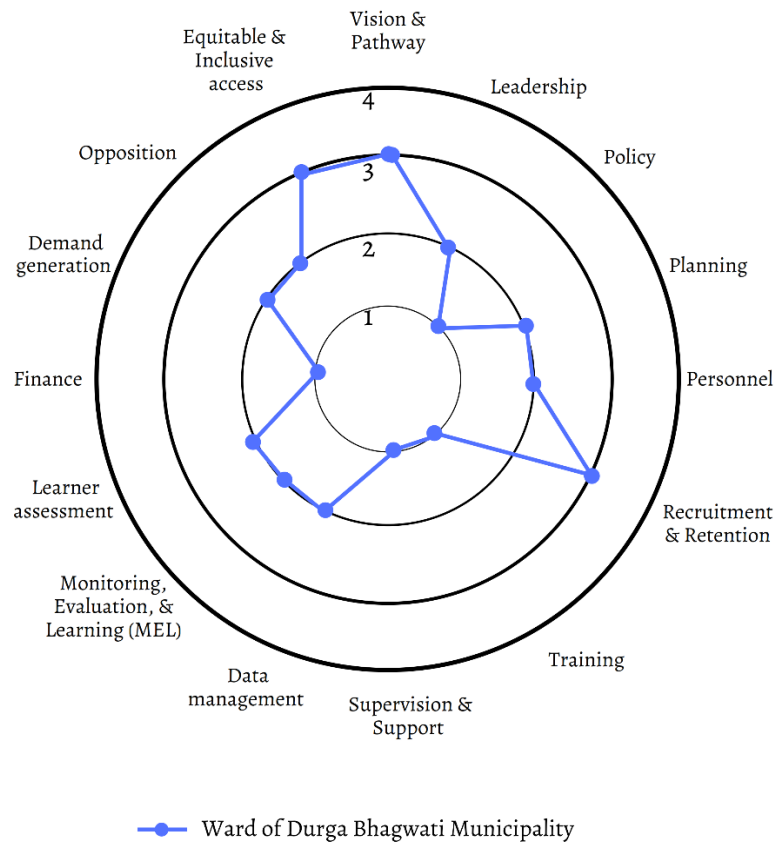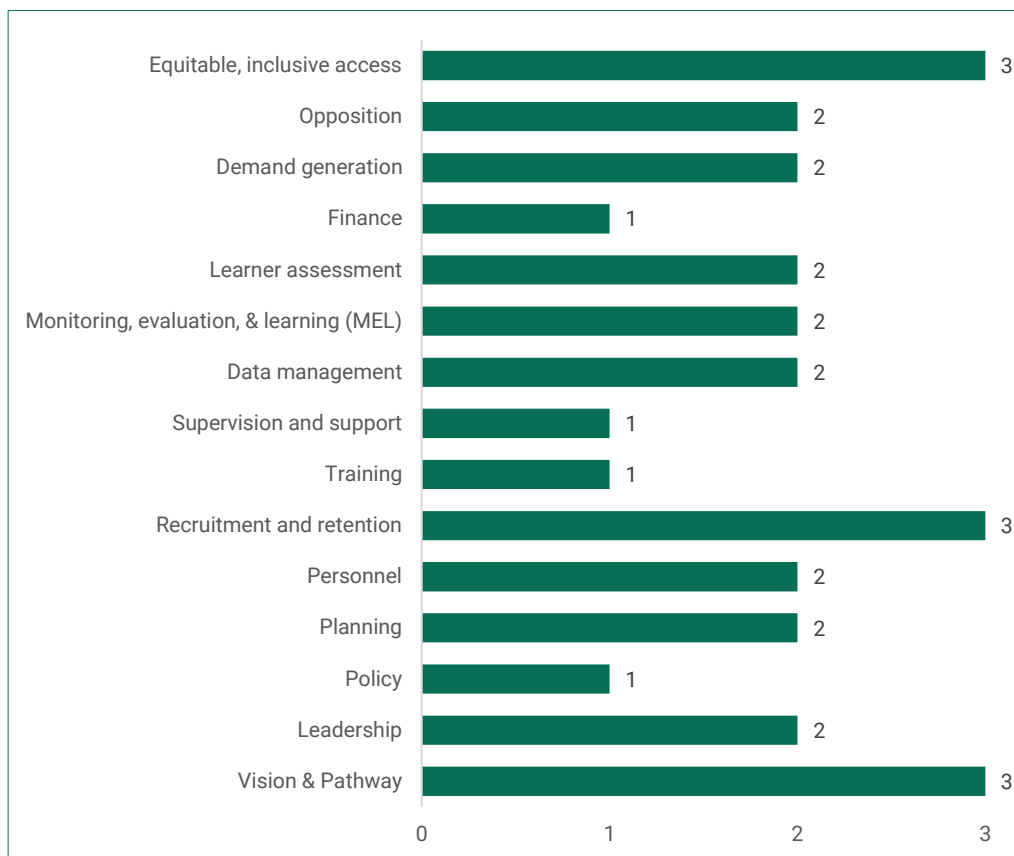

Source: Field work, 2022

The above figure illustrates the overall ward readiness of the Durga Bhagwati Rural Municipality in terms of action group mobilization, capacity building, and the possibility of scaling to improve inclusive access to public schools for OOSC and children at risk of dropping out. The above graph and score have been finalized by taking out the average of all five wards of Durga Bhagwati Rural Municipality. All the individual radar graphs of the five wards have been added in the annexe of the report. So, to begin with, in the above figure, we can see that the municipality as a whole is partially institutionalized (Score 4). In contrast, there are four significant areas/elements that score 1 (low institutionalization), on which the innovator and the municipality should focus in order to increase their capacity and possibility for deep scaling. These four significant areas/elements are policy, training, supervision, and finance.

The primary aim of this intervention is to improve inclusive access to public schools for OOSC and children at risk of dropping out through action groups, parent capacity building on school functioning, and discussion groups. In addition, our Nepali policy stipulates that every community should have a School Management Committee (SMC) and Parent Teachers Association (PTA), but it has yet to be discovered that no such association or group exists that involves both parents and school

representatives. So, based on this graph, we can see that the ward is undertaking activities that are inconsistent with existing policy(ies) and are not being supervised by the municipality. Furthermore, there needs to be training or information sharing about education, PTA, or SMC in order to form any group or build the capacity of parents. In addition, the municipality has made no investment, funds, or financial support available to engage parents and share important information about education, capacity building, parent-school representative engagement, and other activities. From this, the innovator should concentrate on these areas/elements in order to scale their intervention deeply for a fruitful output/outcome.

At last, the ward is moderately scoring 2 to 3 according to the radar graph, clear about the vision and pathway for the intervention and its need, has owned leadership, has been at least planning for future programs, has moderate personnel delivering the vision and has required recruitment, and has moderate monitoring, learning, and evaluation with data management and learner assessment. In addition, the ward generates demand by informing the school representative and municipality about any educational issues. Furthermore, it has been determined that there are opposition parties with whom they have been attempting and planning to engage for potential scaling, and last but not least, equity and inclusion are moderately institutionalized, with which it has identified and is developing a strategy to ensure equitable access to the initiative.

Graph 4: Bar graph of average of five wards of Durga Bhagwati Rural Municipality

Source: Field work, 2022

In conclusion, we can conclude that the Durga Bhagwati Rural Municipality's wards are not fully institutionalized in all areas/elements and should prioritize four main areas/elements: policy, training, supervision, and finance, as they have the lowest institutionalization score of 1 on the institutionalization tracker. The above bar graph (Graph 4) can be taken as a reference. In this intervention, the innovators should focus on and communicate their needs to the appropriate authority (ward, school, and municipality representative) so that the intervention can be scaled deeply and proper mitigation and support can be provided as needed.

Note: The institutionalization tracker's score, average, and radar graph for all the five wards of Durgabhagwati Rural Municipality have been added in the Annex.

4.2.2 Intervention II - ECA After School

The intervention "ECA after School" was examined and assessed for its readiness for scaling in another Intervention. Providing a summary of the intervention's details and context. Unlike Intervention I, this intervention is also part of the project "Effectiveness and Scalability of Programs for Children Who Are Out of School and at Risk of Dropping Out in Bangladesh, Bhutan, and Nepal." Three rural municipalities have been selected as intervention sites for this intervention. Durga Bhagwati RM, Yamunamai RM, and Rajdevi municipality are the three. In this intervention, two schools from Durga Bhagwati RM, three schools from Yamunamai RM, and four schools from Rajdevi Municipality have been chosen for the intervention's initial implementation. As a result, nine schools in those three municipalities have been targeted by this intervention. The schools of DurgaBhagwati RM are Pachurkhi AdharBhut, & Saraswati Maa Vhi, Yamunamani RM are: Rajpur Adhar Bhut, Mahadev Prathimik Vidhyalaya & Braham Prathimik Vidhyalaya, and Rajdevi Municipality are: Bhramhapuri Ma Vhi, Laxmipur Adhar Bhut, Mashaarades Prathimik Vidhyalaya, & Pathara Adhar Bhut.

Since this intervention focuses on already existing ECA programs and policies, it focuses on and engages existing teachers, head teachers/principals of those nine schools, and education officers from all three municipalities who are respondents. In this intervention, we have 21 respondents, and the readiness of those educational institutes (schools) & municipalities has been done in three levels, which are as follows:

- School level (Respondents - School teacher/ ECA in charge level)
- School level (Respondents - Headteacher /principal level)
- Municipality level (Respondents - Education officer)

All 21 respondents were interviewed in order to learn about the conditions of their respective educational institutes. The scoring has been done based on their responses. As previously stated, the analysis was done on two levels, which are briefly explained below. However, because there were 21 respondents, each of whom provided their own responses, a radar graph was also created in that manner. As a result, all of the individuals' radar graphs have been included in the annexe of this

report, and the graph and analysis below have been prepared by taking an average. Furthermore, based on specific brief questions of different system building blocks such as scaling strategy, governance, human resources, curriculum & materials, information, finance, stakeholder, equity & inclusion, participants were asked to understand and score for scaling that program based on the institutionalization tracker guidelines. The spider/radar graph has been used to develop the following findings and analysis.

4.2.2.1 School level (Respondents - School teacher/ ECA in charge level)

To examine and understand the education institute's (school's) readiness for this intervention, the school teacher/ECA in charge was interviewed first. During the interview, questions were asked to gain a better understanding of the school's engagement, support, and capacity to run ECA. For this, the institutionalization tracker's sets of questions were asked. All of the school teachers/ECA in charge of two schools in Durga Bhagwati RM, three schools in Yamunamai RM, and four schools in Rajdevi Municipality were interviewed and scored accordingly. The average score was calculated by the school teachers/ECA Incharge of the school level to analyze. For this, the average was calculated by dividing the total sum of the schools by the total number of schools. Furthermore, for this, the below radar graph and bar graph with brief analysis has been mentioned.

Graph 5: Radar graph of schools of three municipality on the basis of school teachers/ ECA incharge (In average)
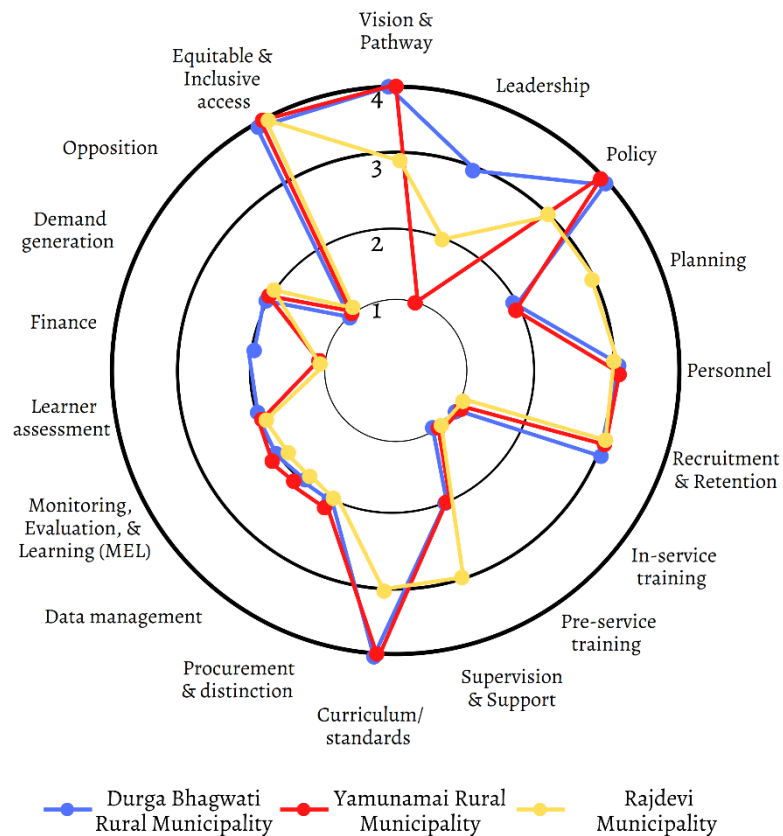
Source: Field work, 2022

According to the above figure, all of the municipality's schools are fully institutionalized (Score 4) in many elements that support ECA, such as vision and pathway, leadership, policy, curriculum/standards, equity and inclusion. However, it has been discovered that some are under-institutionalized in areas such as in-service, pre-service, financial support, opposition, and contrast in leadership. Finally, the remaining elements of all municipal schools are moderately institutionalized (emerging and significant). For a more concise analysis, we can refer to the bar graph (Graph 6) below, a replica of the radar graph (Graph 5) above.

Graph 6: Bar graph of schools of three municipality on the basis of school teachers/ ECA incharge (In average)
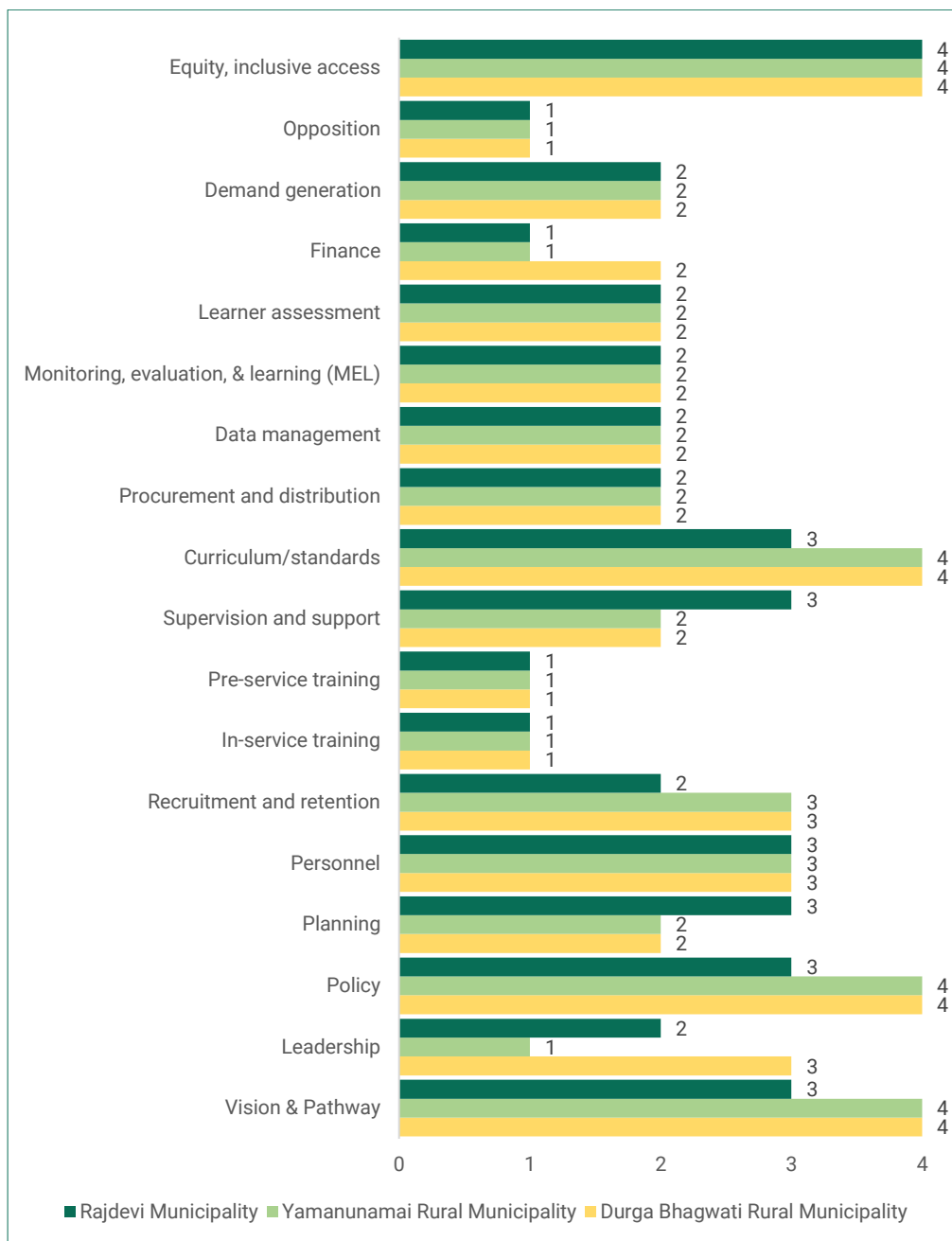
Source: Field work, 2022

The above bar graph shows that all three municipalities' schools have a clear idea, vision, and ability to scale the intervention's goal of ECA. As a result, all schools are fully aligned with ECA's existing policies and have integrated them into their respective curricula/standards, ensuring equitable access to all marginalized and disadvantaged learners.

Following that, we can analyze that all of the schools with scores of 2 and 3 are either emerging or have been significantly institutionalized. To begin, we can see that all of the schools have assigned personnel to support ECA management, but there are fewer in Yamunamai RM. Meanwhile, future activity planning and strategies can be seen (not thoroughly planned). Even if an ECA in charge is not appointed, school teachers take the lead in delivering all aspects of ECA through various activities. According to the graph and field visit observations, there need to be more teachers in all municipalities, with the greatest need being in Rajdevi Municipality. Moving forward, supervision and support for school teachers delivering ECA initiatives are moderately visible in all municipal schools. Finally, despite the fact that ECA has been added to the curriculum, it has been discovered that the required procurement and distribution of materials, data management, MLE, learner assessment, and demand generation are integrated but not fully implemented and supported as required to the school teachers/ ECA in charge by their respective schools.

Finally, it can be seen from the bar graph that pre-service and in-service training regarding ECA engagement and mobilization, support of opponents, and financial support for ECA is found to be undertaken and low institutionalized. In conclusion, all three municipalities' schools should prioritize and invest in training, stakeholder engagement, and financial support for ECA activities and materials. As a result, the vision and pathway for scaling up the interventions aiming to create a happy and creative environment for children through a variety of fun activities are possible. However, the support and cooperation of all three municipalities' school principals/heads and educational officers are vital for this.

4.2.2.2 School level (Respondents - Headteacher /principal level)

Following an analysis of responses from school teachers/ECA in charge of their respective schools, head teachers/principals of those schools (9 schools) from all three municipalities were interviewed to examine and comprehend their education institute's (school's) readiness for this intervention. During the interview, questions were asked to gain a better understanding of their school's involvement, municipal support, and capacity to run ECA. The institutionalization tracker's sets of questions were asked for this as well. All of the principals and headteachers from two schools in Durga Bhagwati RM, three schools in Yamuna Mai RM, and four schools in Rajdevi Municipality were interviewed and scored. To analyze, the average score was calculated from the head teachers/principals of all the schools. To calculate the average, divide the total sum of the schools by the total number of schools. Furthermore, a radar graph and bar graph with a brief analysis has been mentioned below:
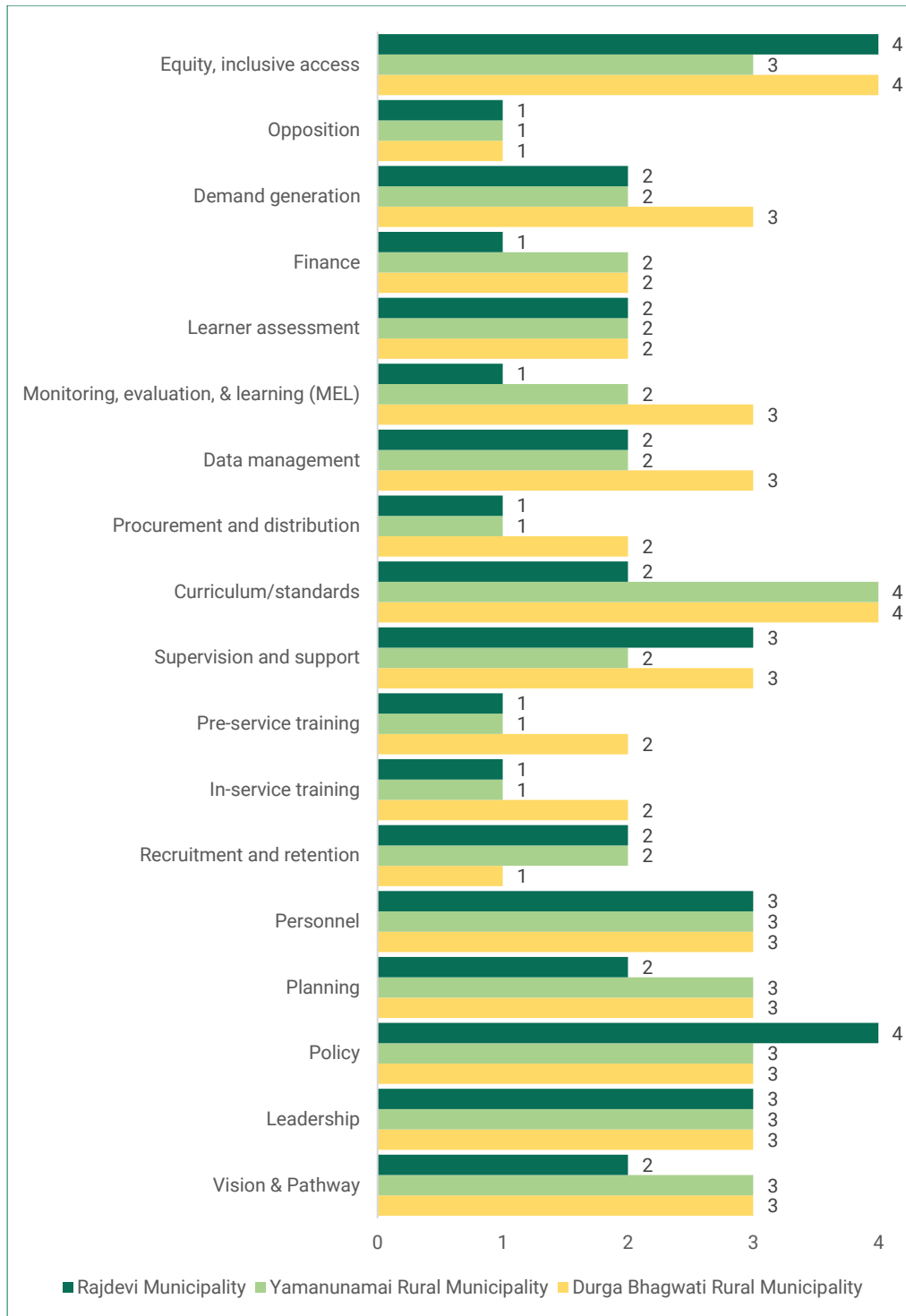
Graph 7: Radar graph of schools of three municipality on the basis of head teachers/principals (In average)

Durga Bhagwati Rural Municipality — Yamunamai Rural Municipality — Rajdevi Municipality
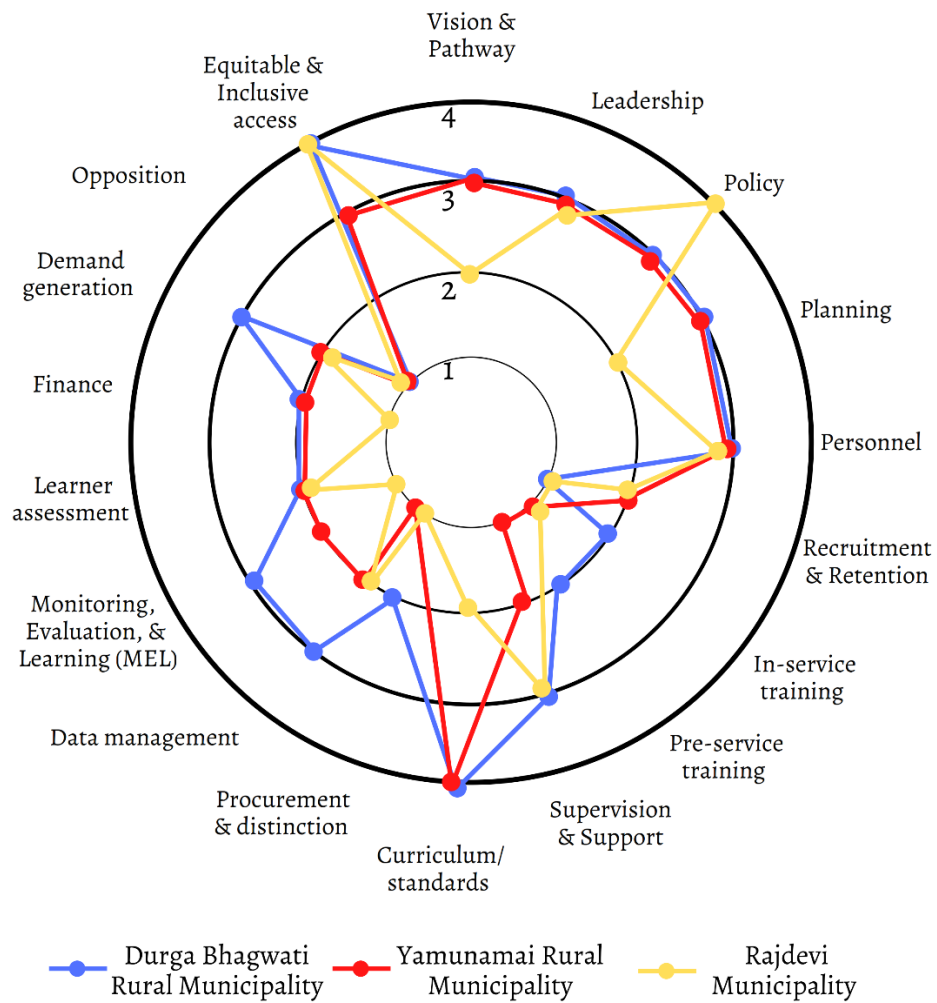
Source: Field work, 2022

Initiative aligned to an existing policy, integrated into official curriculum/standards, and equitable & inclusion elements are fully institutionalized, according to the above figure and responses from the head teachers/principals of all of the municipality's schools (Score 4). In contrast, the majority of the elements, such as recruitment of qualified teachers, in-service & pre-service training, procurement and distribution of ECA materials, data management, MLE from the municipality, learner assessment, financial support from the municipality, and engagement with potential opponents are seen undertaken and low institutionalized with a score of 1. The bar graph (Graph 8) below, which is a replica of the radar graph (Graph 7) above, can be used for a more transparent and concise analysis.

Graph 8: Bar graph of schools of three municipality on the basis of head teachers/principals (In average)

Source: Field work, 2022

According to the above bar graph and the responses of the head teachers/principals of all nine schools in three municipalities, most of the elements are moderately institutionalized; however, many elements and municipal support are required to fully institutionalize and scale up the ECA initiative. Starting with fully institutionalized

elements, it is found that all schools provide equitable access for marginalized and disadvantaged learners without exclusion, are fully integrated into official curriculum/standards, and are aligned with existing ECA policies. When we say it is fully integrated, we mean that the schools of two municipalities, Durgabhagwati rural municipality and Yamunamai rural municipality, are significantly capable of running the ECA as per existing policies.

Moving forward, we can determine from the bar graph that all of the schools have a clear vision and pathway for ECA, assigned ECA in charge or teachers have been delivering the initiative, planning for more strategy, data management, MLE, and have generated significant and moderate ECA demands for their schools. If more support, engagement, and investment are provided, all nine schools in three municipalities will be fully institutionalized for ECA.

Finally, we can conclude that recruitment of qualified teachers, in-service and pre-service training for teachers on ECA, procurement and distribution, MLE, financial support, and engagement of stakeholders and potential opponents are all lacking and must be undertaken in all schools with the full support of the municipality. This demonstrates their low institutionalization score of 1 and the actions and support required to fully institutionalize their respective school in all municipalities. Overall, Rajdevi municipality's schools require more municipal support.

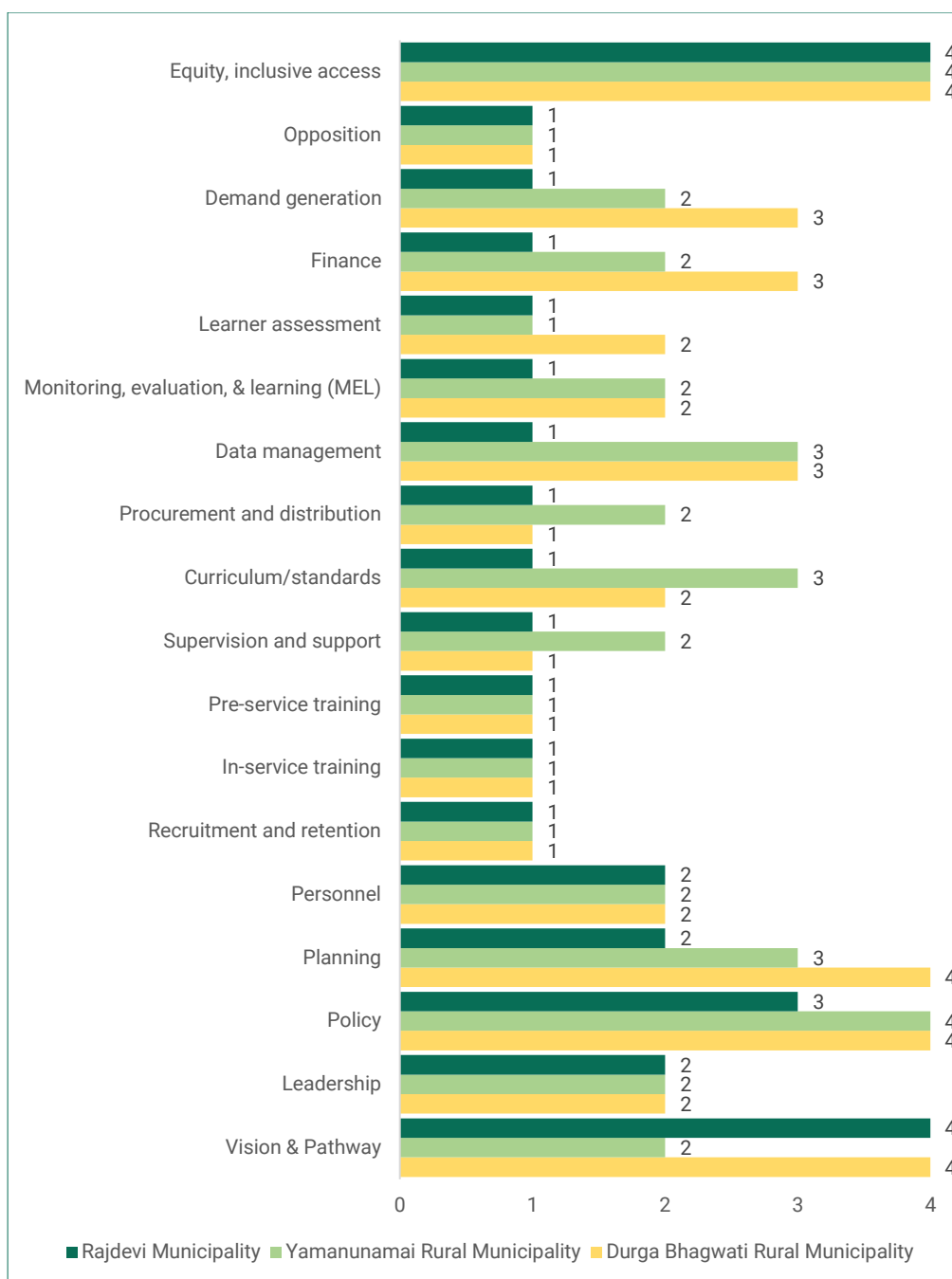### 4.2.2.3 Municipality level (Respondents - Education officer)

Finally, all three Education Officers from three municipalities were interviewed in order to assess the municipality's readiness to understand their role, support, and engagement in the "ECA after school" initiative. The same institutionalization tracker's question sets were used for this. Each Education Officer was interviewed and scored individually. In addition, a radar graph and a bar graph with a brief analysis are provided below:

Graph 9: Radar graph of three municipalities on the basis of Education officers
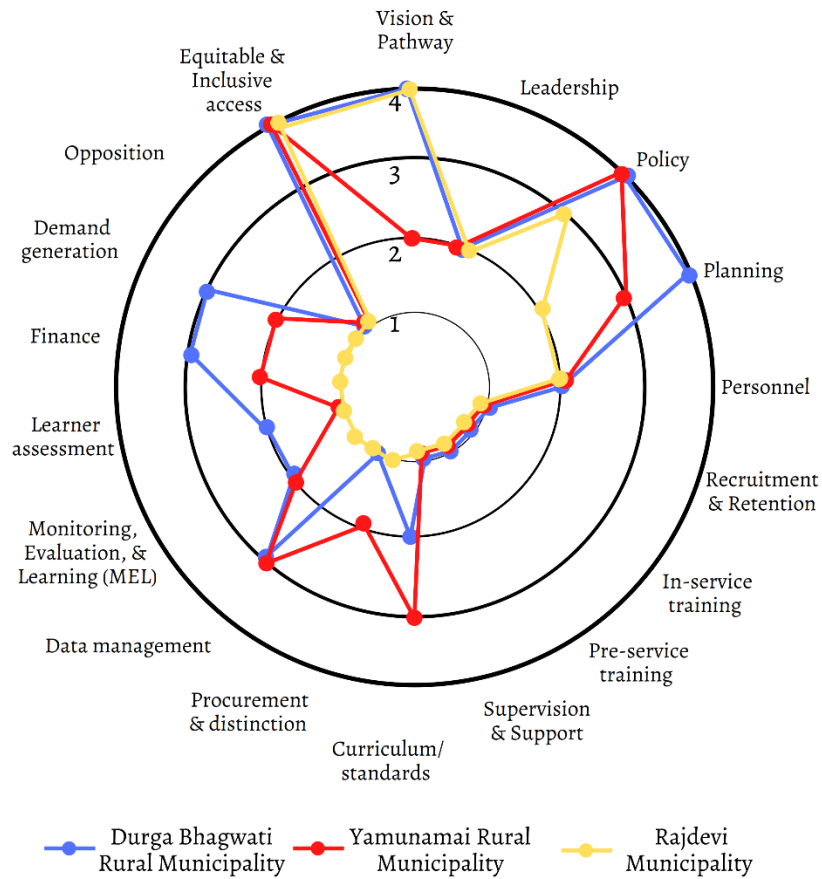
Source: Field work, 2022

Graph 10: Bar graph of three municipality on the basis of Education officers

Equity, inclusive access — 4, 4, 4
Opposition — 1, 1, 1
Demand generation — 1, 2, 3
Finance — 1, 2, 3
Learner assessment — 1, 1, 2
Monitoring, evaluation, & learning (MEL) — 1, 2, 2
Data management — 1, 3, 3
Procurement and distribution — 1, 2, 1
Curriculum/standards — 1, 3, 2
Supervision and support — 1, 2, 1
Pre-service training — 1, 1, 1
In-service training — 1, 1, 1
Recruitment and retention — 1, 1, 1
Personnel — 2, 2, 2
Planning — 2, 3, 4
Policy — 3, 4, 4
Leadership — 2, 2, 2
Vision & Pathway — 4, 2, 4

■ Rajdevi Municipality ■ Yamanunamai Rural Municipality ■ Durga Bhagwati Rural Municipality

Source: Field work, 2022

According to the radar graph and bar graph above, all three municipalities have full institutionalization in only one element, "Equitable and inclusive access." This indicates that when it comes to allocating human and financial resources for the ECA initiative, the education officers share that no marginalized and disadvantaged learners (students) are excluded or treated unfairly. In contrast, there are elements that receive a 1 for low institutionalization. These include opposition, in-service and pre-service training, and recruitment and retention. This means that qualified teachers are not being recruited in sufficient numbers, and existing teachers are not

receiving ECA training. As a result, we can conclude that all three municipalities' schools lack qualified teachers and training for existing teachers, which the municipality is aware of. Furthermore, it was discovered that none of the municipalities had collaborated with potential opponents (stakeholders, organizations) to scale the ECA initiative. With this, we can also analyze that all three municipalities are institutionalized in terms of policy, planning, and data management; however, Rajdevi municipality lacks a step behind. Overall, it can be measured that delivering the ECA initiative, supervision & support, curriculum/standards, procurement & distribution, MLE, learner assessment, finance, and demand generation is moderately (emerging and significantly) institutionalized.

Moreover, we can analyze that all three municipalities in the ECA initiative are not institutionalized and require more focus on all elements. Also, comparing all three municipalities, we can draw the conclusion that Rajdevi Municipality requires more attention and focus than Durga Bhagwati RM & Yamuna Mai RM.

In conclusion, from all the levels of analysis of Intervention II: "ECA After school", we can find and check the readiness of the institute from all levels: Municipality level through the Education officer, school level through school teacher/ECA in charge and head teacher/principal. From this, we can analyze the current situation and steps that should be taken to fully institutionalize and scale up the ECA initiative. At last, concluding the analysis and in relation to the objective using both Intervention I: "Campaigning through action group enhancing inclusive access to public schools for OOSC and Children at risk of dropping out", and Intervention II: "ECA After school", we can examine and assess the municipality and educational institution readiness for scaling through institutionalization tracker.

Conclusion

In conclusion, the indicator and strategies of the two interventions were evaluated using the scaling strategy worksheet and the institutionalization tracker. As a result, it can conclude that both interventions have a clear vision, goal, and required understanding. Here in Intervention I: "**Campaign through Action Groups Enhancing Inclusive Access to Public Schools for OOSC and Children at Risk of Dropping Out**" and Intervention II: "**ECA after school**", it can be concluded that the innovators are well aware and have drafted the intervention plan well with vision, scaling approach that will be used, creativity, recognition of problem and support of the change, with partnership/collaboration and organizational capacity. Using the scaling strategy worksheet and in relation to the objective of this research, it is clear that with proper in-depth interviews with innovators in the field of education for any intervention or initiative, indicators of scaling can be determined with the necessary strategy for scaling that program. Also, it is clear from this that a scaling strategy can be implemented to know the potential of scaling the program. Furthermore, the final output strategy has not been discussed while the intervention is in progress.

Along with this, the use of an institutionalization tracker also allows the assessment of the institution's readiness for both interventions. It is clear from this that the readiness of any institution for scaling can be used to measure scaling and positive change. In Intervention I: "Campaign through Action Groups Enhancing Inclusive Access to Public Schools for OOSC and Children at Risk of Dropping Out", through the institutionalization tracker; that the intervention municipality's ward is not fully institutionalized in all areas/elements and should prioritize four main areas/elements: policy, training, supervision, and finance and helps in suggesting the innovators focus on and communicate their needs to the appropriate authority (ward, school, and municipality representative) so that the intervention can be scaled deeply and proper mitigation and support can be provided as needed. Also, in Intervention II: "ECA after school", through the institutionalization tracker, the readiness of the institute from all levels, that is: the Municipality level through the Education officer, school level through school teacher/ECA in charge and head teacher/principal has been done. It could help in analyzing the current situation and steps that should be taken to fully institutionalize and scale up the ECA initiative. At last, concluding the analysis and in relation to the objective using both Intervention I: "Campaigning through action group enhancing inclusive access to public schools for OOSC and Children at risk of dropping out", and Intervention II: "ECA After school", we can examine and assess the municipality and educational institution readiness for scaling through institutionalization tracker.

Furthermore, we can conclude from this research that scaling strategies can be evaluated using existing indicators with examining the readiness of institutions, and the results can

be a great asset for future use in municipalities to the education ministry level for research, data collection, and in-depth understanding of the current education system of three municipalities in Rautahat.

References

Jenny Perlman Robinson, Molly Curtiss Wyss, and Patrick Hannahan, "Scaling Strategy Worksheet: Planning for Scale," (Washington DC: Brookings Institution, July 2021)

Jenny Perlman Robinson, Molly Curtiss Wyss, and Patrick Hannahan, "Institutionalization Tracker," (Washington DC: Brookings Institution, July 2021)

Price-kelly, van Haeren & McLean (2020) The scaling playbook international development research centre: IDRC & CRDI

Coburn C E, "Rethinking Scale: Moving Beyond Numbers to Deep and Lasting Change" (2003)

McLean R & Gargani J, "Scaling Impact, innovation for the public good" 2019

Annex

Scaling Strategy Worksheet Questionnaire

Interview Date:

Responder name:

A.	Vision	
i.	Name of the Intervention:	
ii.	**Goal** of the Intervention	
iii.	What **problem** is it trying to solve?	
iv.	Expected **Result/Outcome**:	
v.	Focused **population/participants** (the individuals or communities of focus):	
vi.	Summarize the **need** (size and scope)	
B.	**Summary of scaling strategy**	
i.	What kind of scaling approach is is being done? *(scale up, down, deep)*	
ii.	Where is it being applied (**what element/aspect**)? What element is being scaled?	
iii.	How the **plan is used to bring the proposed initiative to scale** and **sustain** its benefits.	
iv.	Describe how **the plan is tailored to address different ways the issue or its solution** may manifest in various populations & contexts.	
C.	**Credibility of the purposed initiative**	
i.	What is the **core strategy** of the initiative?	
ii.	Describe **the current level of evidence backing the proposed initiative** (along with its source) and/or the **method used to gather that evidence**.	
iii.	How **trustworthy** are you to your initiative scaling from 1 as least to 5 as most?	
D.	**Recognition of the problem and support for the change?**	
i.	Do you have any **evidence** or data proving that the initiative you're proposing is **necessary and beneficia**l to the problem you're attempting to solve?	
ii.	Describe how the proposed initiative will **benefit from current or potential coalitions** in order to promote change and/or lessen the effects of opposition to change.	
iii.	Describe how the proposed initiative **relates to current national, regional, or local priorities**	
E.	**Advantage of proposed initiative over alternatives and to the status quo**	
i.	Provide **evidence** that the proposed initiative is **more effective and/or efficient** than alternative approaches or the status quo.	
ii.	Include any evidence that the proposed initiative **is seen as more efficient and/or effective by policymakers, practitioners, and communities, as well as any relevant data on whether it has the support of implementing organizations and the system.**	
iii.	**Advantages** of the initiative?	
F.	**Enabling conditions and partnerships for scaling**	
i.	What crucial components or circumstances in the larger system are most likely to be **helpful resources** while scaling?	
ii.	What crucial components or circumstances in the larger system are most likely to be **challenges** while scaling?	
iii.	What collaborations/partnership **already exist** to support scaling?	
iv.	What collaborations/partnership **are required** to support scaling?	
G.	**Ease of transferring and applying the initiative at scale**	
i.	Describe the **most difficult changes** that will be needed to be made in order to implement the initiative at a large scale.	
ii.	**Strategy** for overcoming those difficulties.	
iii.	Which initiative components are "**core**" to its impact and must be **preserved** during scaling?	
iv.	Which elements could be **eliminated** for a more simplified/cost-effective model?	
H.	**Organizational capacity to implement initiative at scale**	

i.	Describe how the implementing organization(s) currently has(s) or will **develop the organizational capacity** to scale the initiative.	
ii.	What institutional capacity for large-scale implementation is **lacking**, and how can this be **addressed**?	
iii.	If implementation will be transferred from one organization to another (such as the government), describe how this will **happen and the risks involved**.	
iv.	Describe how **adequate resources and capacity will be secured** if additional human and institutional resources are required to support "going to scale" or delivering at scale.	
I.	**Financial sustainability of proposed initiative**	
i.	Describe how **resources will be mobilized** to create a long-term funding base for the proposed initiative.	
ii.	Can the initiative be carried out **within** the existing system, making use of existing infrastructure, human resources, and so on?	
iii.	What **budgetary processes** should be considered in order to mobilize longer-term domestic financing, and when should this be done? Where to invest?	
J.	**Action, milestones, and timetable**	
i.	Monitoring initiatives as they grow requires different methods and tools than monitoring a pilot or at a smaller scale. This includes gathering data on the scaling process, determining whether the initiative's impact is maintained at a larger scale, and determining **what changes to the initiative and scaling strategy may be required**.	
ii.	Detail actions to support monitoring and reflection on scaling progress, assumptions, and strategies in a separate table, including thinking about what additional data might be needed to inform the scaling process that aren't already being collected and **what additional support (financial, technical, technological, etc.) may be required**.	
iii.	Your **reflection and ongoing learning**.	
iv.	Indicate who should be in **charge of these monitoring and reflection activities, and propose a timetable for these actions**, which should include semi-annual stop-and-reflect sessions at the very least.	
K.	**Any extra/additional inputs you would like to add?**	

Institutionalization Tracker Questionnaire

Interview date:

Responder name:

Municipality:

School name:

S.N.	SBB	Element	Questions	Rank	Remark
1.	Scaling strategy	Vision and pathway (V&P)			
2.	Governance	Leadership (Lead)			
		Policy			
		Planning			
3.	Human resources	Personnel			
		Recruitment			
		In-service			
		Pre-service			
		Supervision			
4.	Curriculum and material	Curriculum/standards			
		Procurement and distribution (P&D)			
5.	Information	Data management			
		MEL			
		Learner assessment			
6.	Finance	Finance			
7.	Stakeholder engagement	Demand generation			
		Opposition			
8.	Equity and Inclusion	Equity & inclusion			

Intervention I: Campaign through action groups enhancing inclusive access to public schools for OOSC and children at risk of dropping out - Annex

Annex 1: Score table of five wards of Durga Bhagwati Rural Municipality's on the basis of Institutionalization tracker

Score table of Institution tracker five wards of Durgabhagwati Rural Municipality

S.N.	System building block	Element	Element (code)	Wards				
				Ward 1	Ward 2	Ward 3	Ward 4	Ward 5
1	Scaling Strategy	Vision and Pathway	V&P	3	3	3	4	3
2	Goverance	Leadership	Lead	1	2	2	1	2
		Policy	Policy	2	1	1	2	1
		Planning	Planning	2	1	1	2	2
3	Human resources	Personnel	Personnel	2	1	2	1	2
		Recruitment and retention	R&R	2	2	4	1	4
		In-service training	Training	1	2	1	2	1
		Pre-service training						
		Supervision and support	S&S	1	1	1	2	1
5	Information	Data management	DM	2	1	1	3	1
		Monitoring, evaluation, & learning (MLE)	MLE	2	2	1	2	1
		Learner assessment	LE	2	2	1	2	1
6	Finance	Finance	Finance	1	1	1	1	1
7	Stakeholder engagement	Demand generation	DG	2	2	2	2	1
		Opposition	Opposition	3	3	1	3	2
8	Equity and inclusion	Equitable, inclusive access	E&I	3	2	2	4	2

Annex 2: Radar graph of Wards of Durga Bhagwati Rural Municipality

2.1: Radar graph of Ward 1 of Durga Bhagwati RM

Ward 1
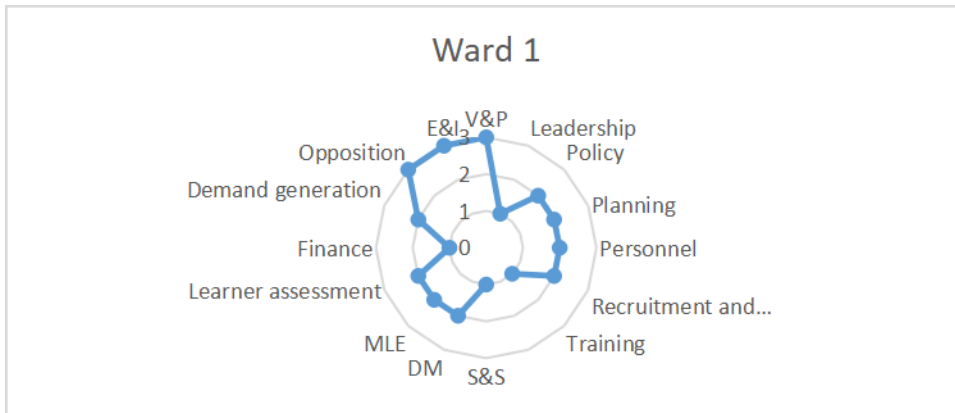
2.2: Radar graph of Ward 2 of Durgabhagwati RM

Ward 2
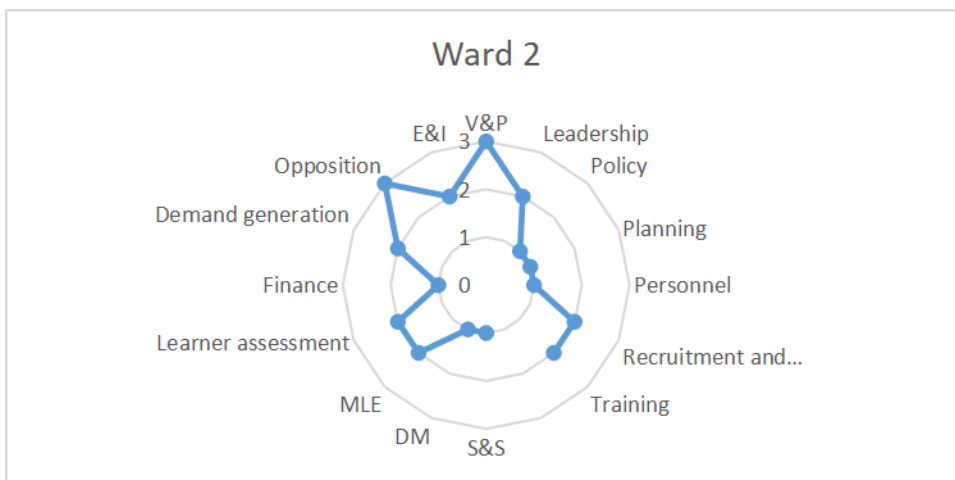
2.3: Radar graph of Ward 3 of Durgabhagwati RM

Ward 3
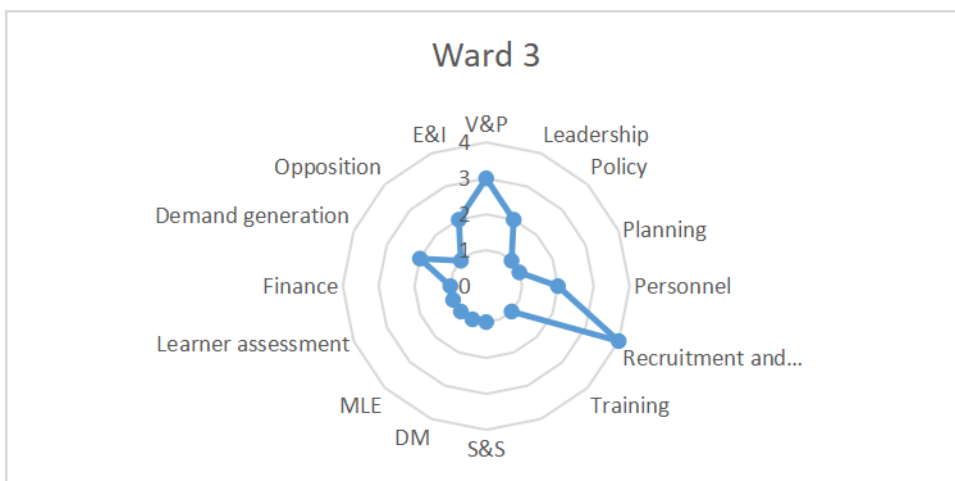
2.4: Radar graph of Ward41 of Durgabhagwati RM

Ward 4
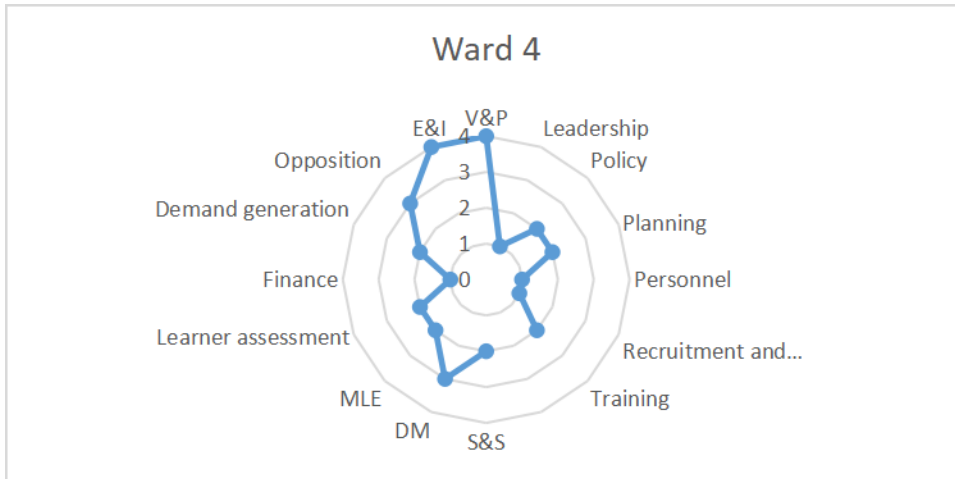
2.5: Radar graph of Ward 5 of Durgabhagwati RM

Ward 5
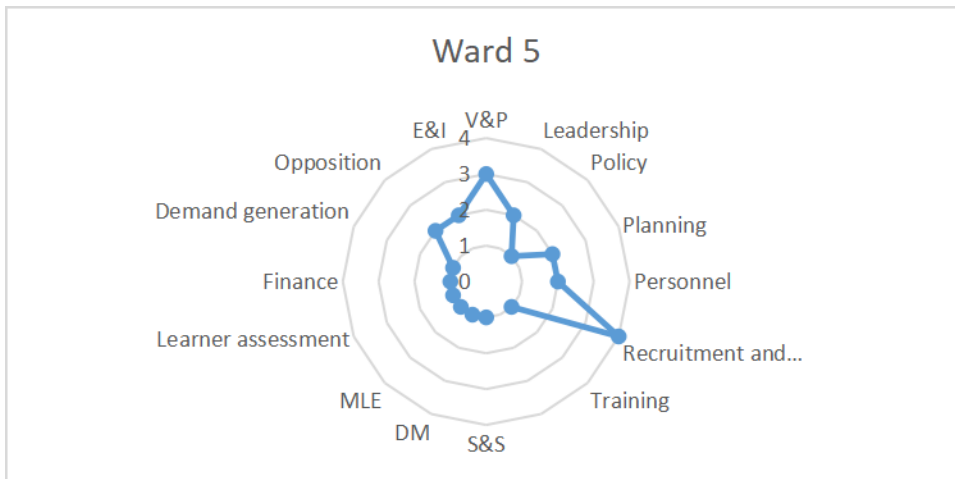
Annex 3: Score table of School teacher/ECA Incharge of all three municipality's on the basis of Institutionalization tracker

Score table of Institution tracker on the basis of school teacher/ECA incharge responses of all three municipality: Durgabhagwati RM, Yamunamai RM, & Rajdevi Municipality

Element Code	ECA incharge/representative								
	Durgabhagwoti		Yamunamai			Rajdevi			
	Pachrukhi AB	Saraswoti MV	Rajpur AB	Mahadev PV	Braham PV	Bhramhapuri MV	Laxmipur AB	Mashaarades PV	Pathara AB
V&P	4	4	4	4	4	4	2	4	3
Leadership	1	4	2	1	1	4	2	1	2
Policy	4	4	4	4	4	4	2	2	4
Planning	1	2	1	2	4	4	2	3	4
Personnel	3	2	2	2	4	4	2	4	2
Recruitment & retention	2	4	2	4	4	4	1	1	1
In-service	1	1	1	1	1	1	1	1	1
Pre-service	1	1	1	1	1	1	1	1	1
S&S	1	2	1	2	3	4	2	1	3
C&S	4	4	4	3	4	4	1	3	4
P&D	2	1	1	3	2	2	2	1	2
Data management	1	3	1	1	3	3	2	1	1
MLE	2	1	1	1	3	3	2	2	1
Learner assessment	2	1	1	1	3	3	1	2	1
Finance	2	1	1	1	2	2	1	1	1
Demand Generation	2	2	1	2	3	3	2	2	2
Opposition	1	1	1	1	1	1	1	1	1
E&I	4	4	4	4	4	4	4	4	4

Annex 4: Radar graph of School teacher/ECA incharge of Durga bhagwati RM schools

4.1: Radar graph of Saraswoti MV school of Durgabhagwati RM on the basis of school teacher/ECA Incharge response
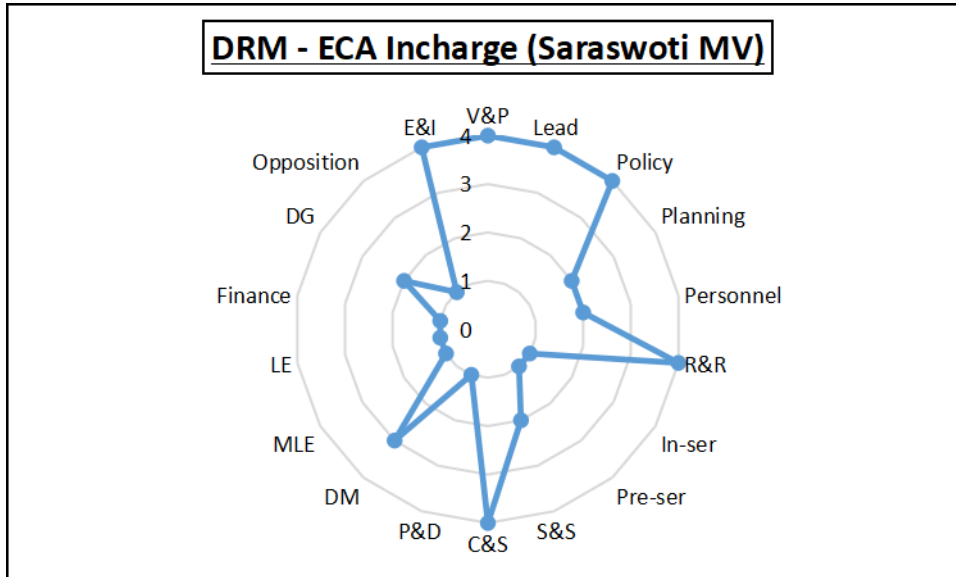
4.2: Radar graph of Pachrukhi AB school of Durgabhagwati RM on the basis of school teacher/ECA Incharge response
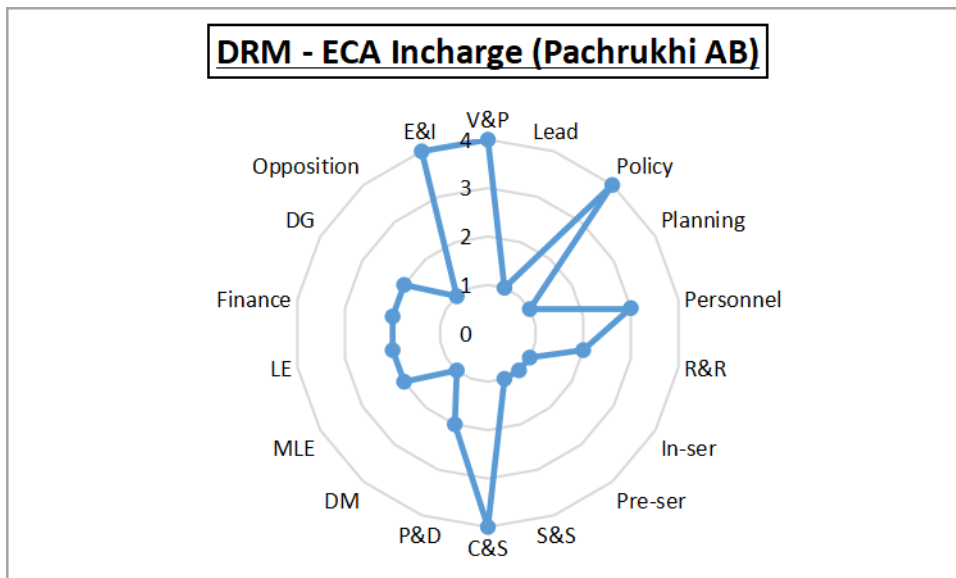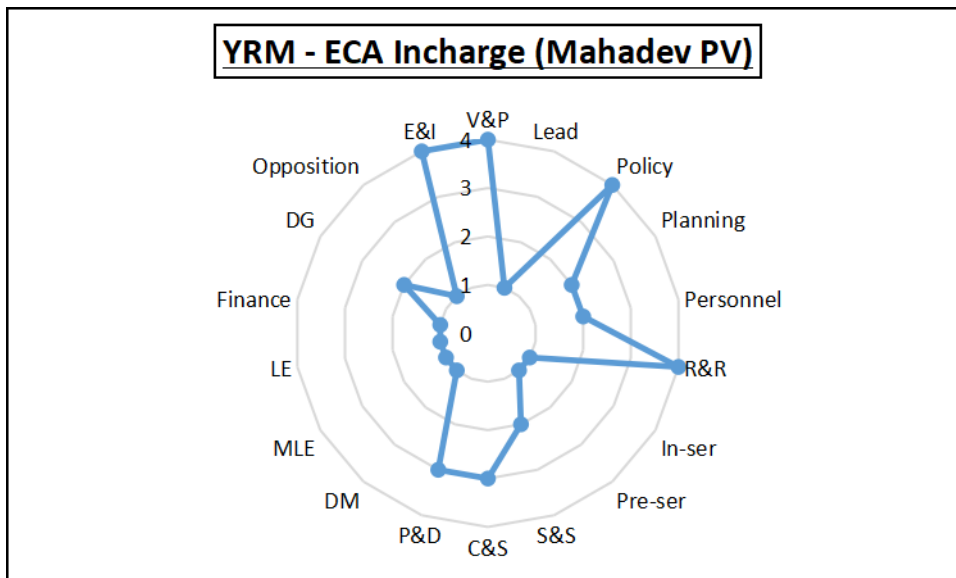
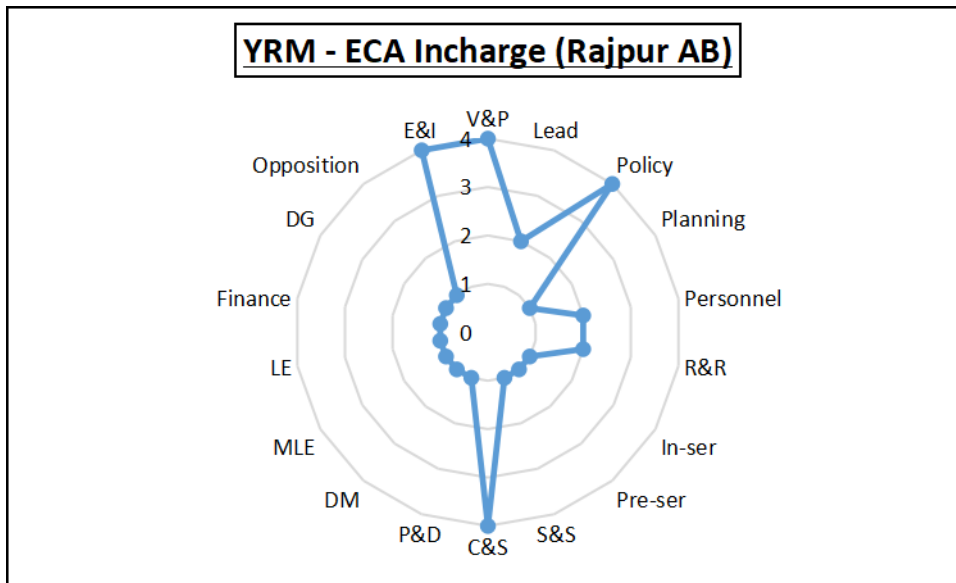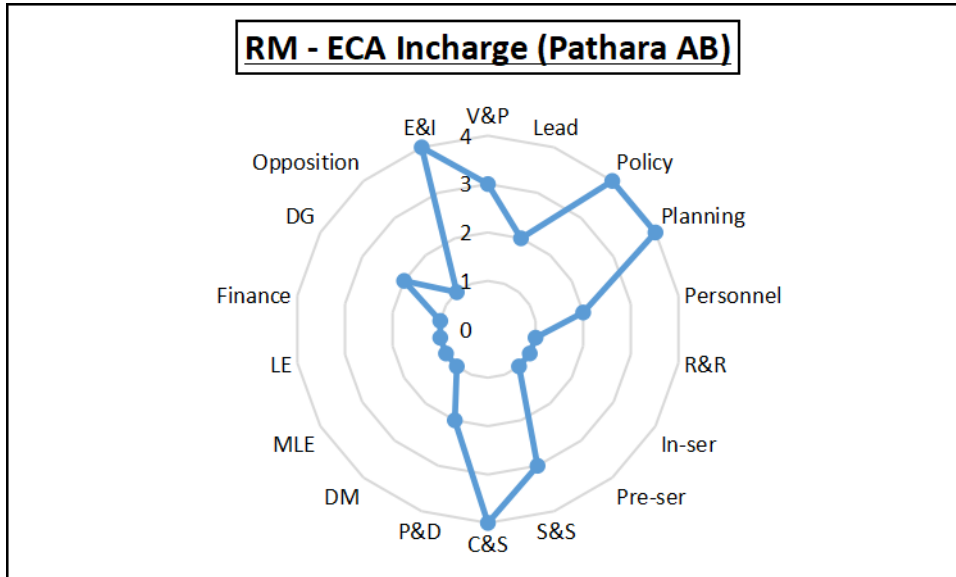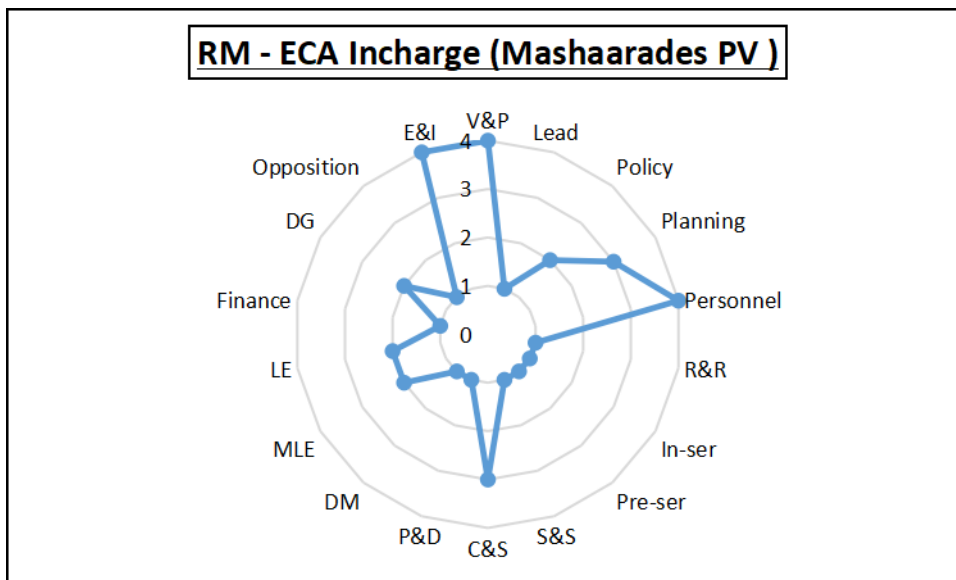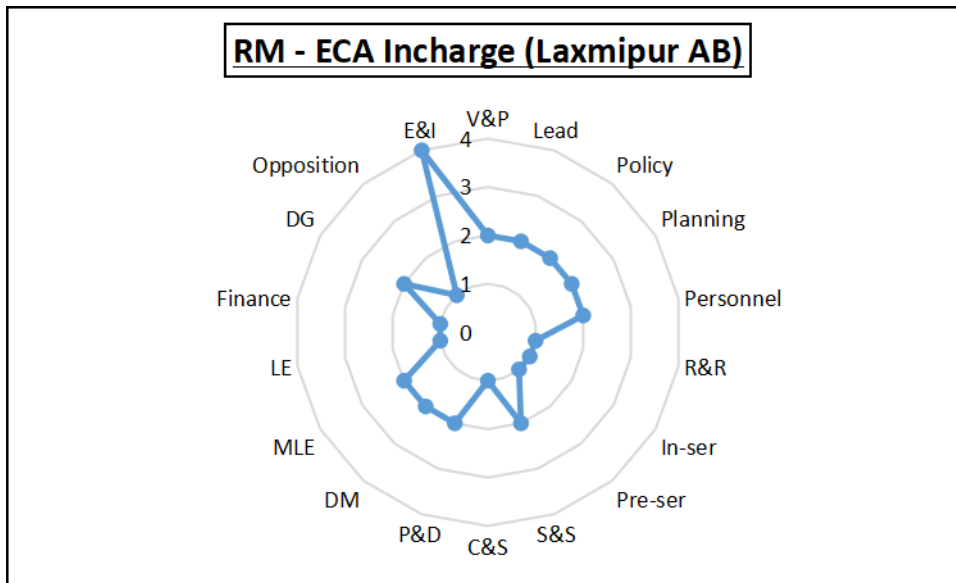## Annex 5: Radar graph of School teacher/ECA incharge of Yamunamai RM schools

5.1: Radar graph of Braham PV school of Yamunamai RM on the basis of school teacher/ECA Incharge response
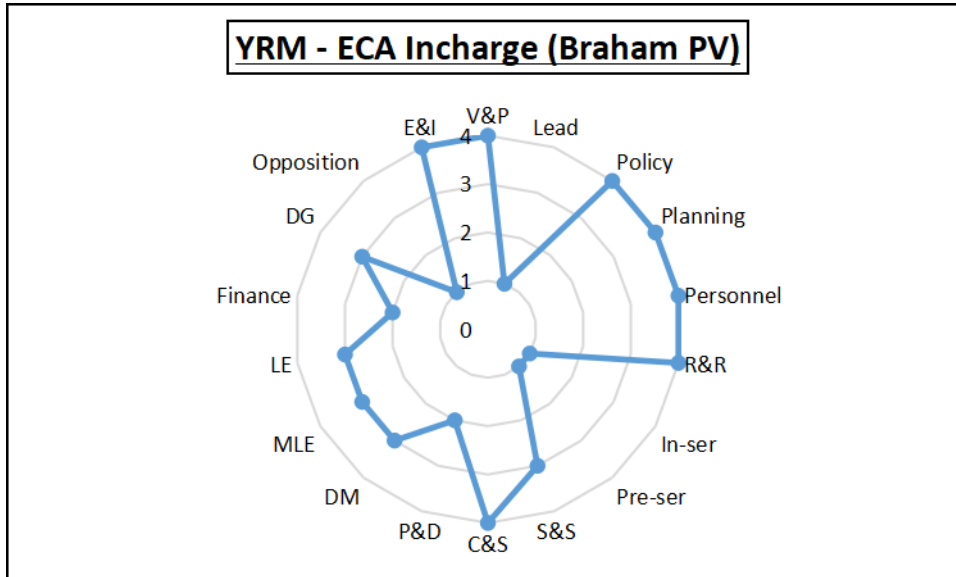
Annex 5.2: Radar graph of Mahadev PV school of Yamunamai RM on the basis of school teacher/ECA Incharge response

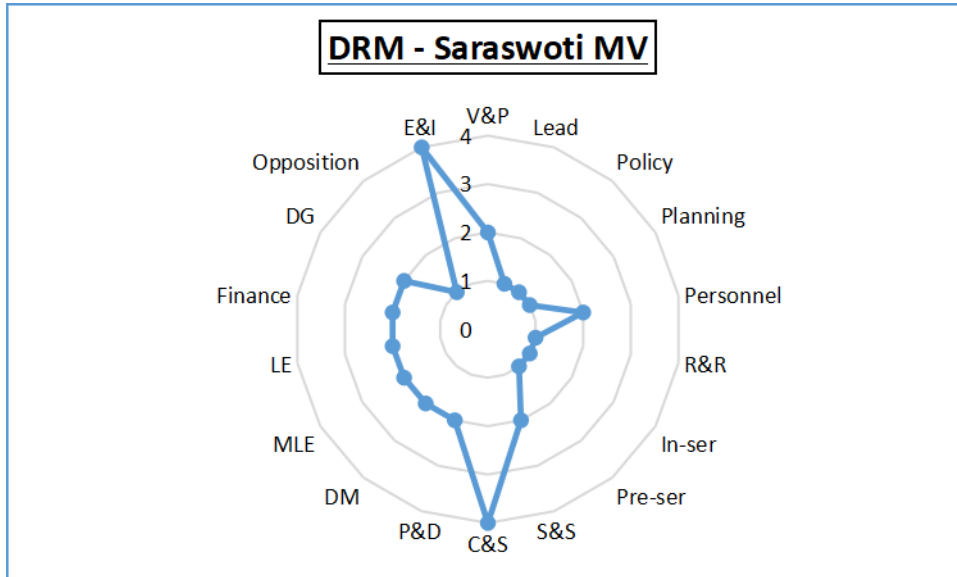5.3: Radar graph of Rajpur AB school of Yamunamai RM on the basis of school teacher/ECA Incharge response

YRM - ECA Incharge (Rajpur AB)

Annex 6: Radar graph of School teacher/ECA incharge of Rajdevi Municipality schools

6.1: Radar graph of Pathara AB school of Rajdevi Municipality on the basis of school teacher/ECA Incharge response

6.2: Radar graph of Mashaarades PV school of Rajdevi Municipality on the basis of school teacher/ECA Incharge response

6.3: Radar graph of Laxmipur AB school of Rajdevi Municipality on the basis of school teacher/ECA Incharge response

6.4: Radar graph of Bhramhapuri MV school of Rajdevi Municipality on the basis of school teacher/ECA Incharge response
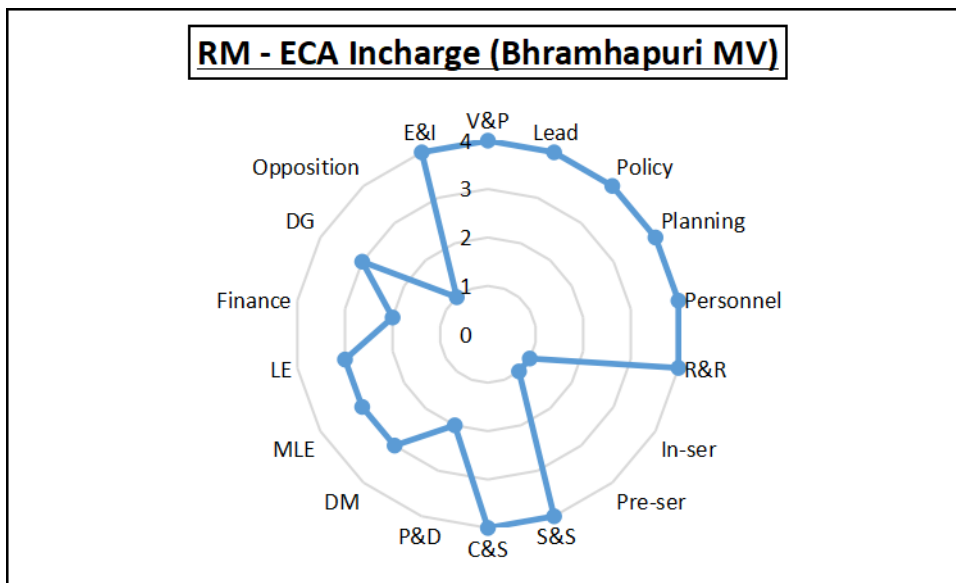
Annex 7: Score table of Head teacher/Principal of all three municipality's on the basis of Institutionalization tracker

Score table of Institution tracker on the basis of head teacher/principal responses of their respective schools of three municipality: Durgabhagwati RM, Yamunamai RM, & Rajdevi Municipality

Element Code	Principal								
	Durgabhagwoti			Yamunamai			Rajdevi		
	Pachrukhi AB	Saraswoti MV	Rajpur AB	Mahadev PV	Braham PV	Bhramhapuri MV	Laxmipur AB	Mashaarades PV	Pathara AB
V&P	4	2	4	2	2	3	2	2	2
Leadership	4	1	3	3	3	4	1	3	2
Policy	4	1	3	3	4	4	3	3	4
Planning	4	1	3	2	4	4	1	2	2
Personnel	4	2	3	3	4	4	1	2	4
Recruitment & retention	1	1	2	3	1	4	1	1	1
In-service	2	1	1	1	1	1	1	1	1
Pre-service	2	1	2	1	1	1	1	1	1
S&S	4	2	3	2	2	3	3	1	3
C&S	4	4	4	3	4	2	3	2	2
P&D	2	2	2	1	1	1	1	1	1
Data management	4	2	2	2	1	2	2	2	2
MLE	4	2	3	2	1	1	2	1	1
Learner assessment	2	2	3	2	1	2	2	1	1
Finance	1	2	2	2	1	2	1	1	1
Demand Generation	3	2	2	2	1	3	2	2	2
Opposition	1	1	1	1	1	1	1	1	1
E&I	4	4	4	4	1	4	4	3	4

Annex 8: Radar graph of Head teacher/Principal of Durgabhagwati RM's school

8.1: Radar graph of Saraswoti MV school of Durgabhagwati RM on the basis of head teacher/Principal response
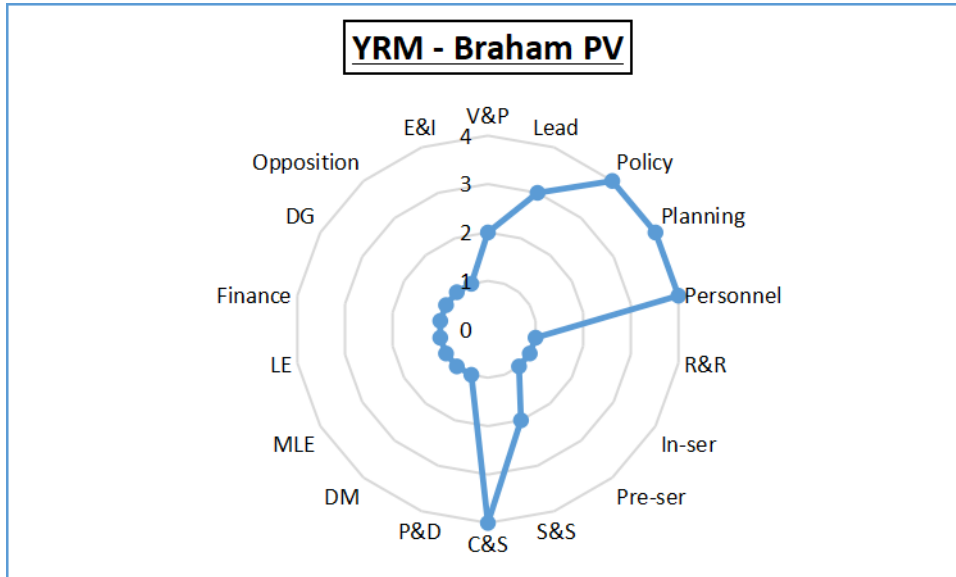

8.2: Radar graph of Pachrukhi AM school of Durgabhagwati RM on the basis of head teacher/Principal response
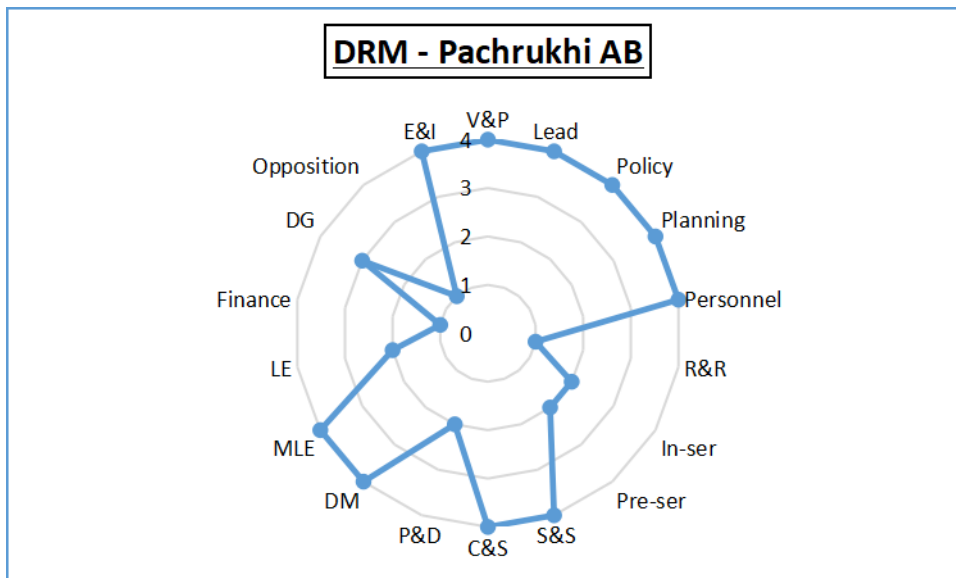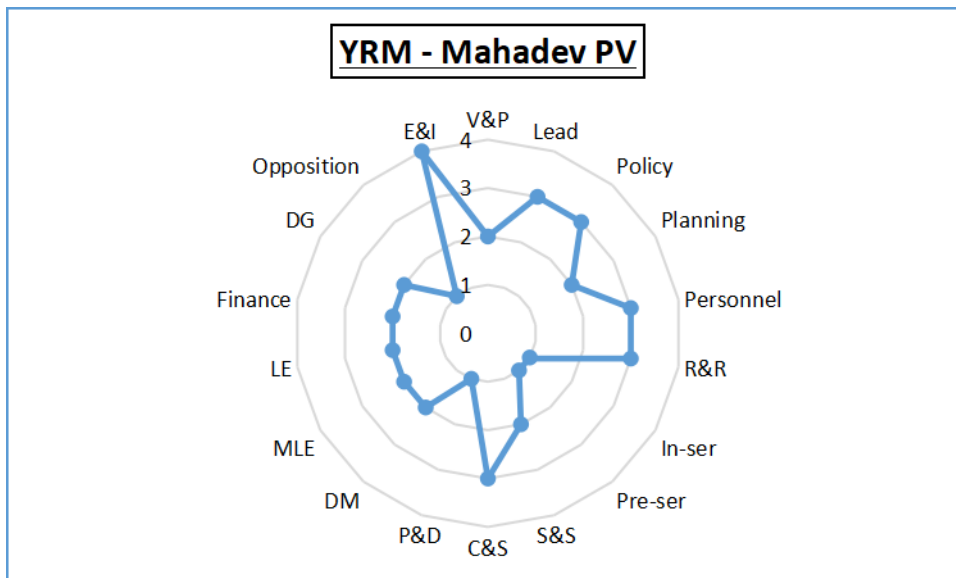
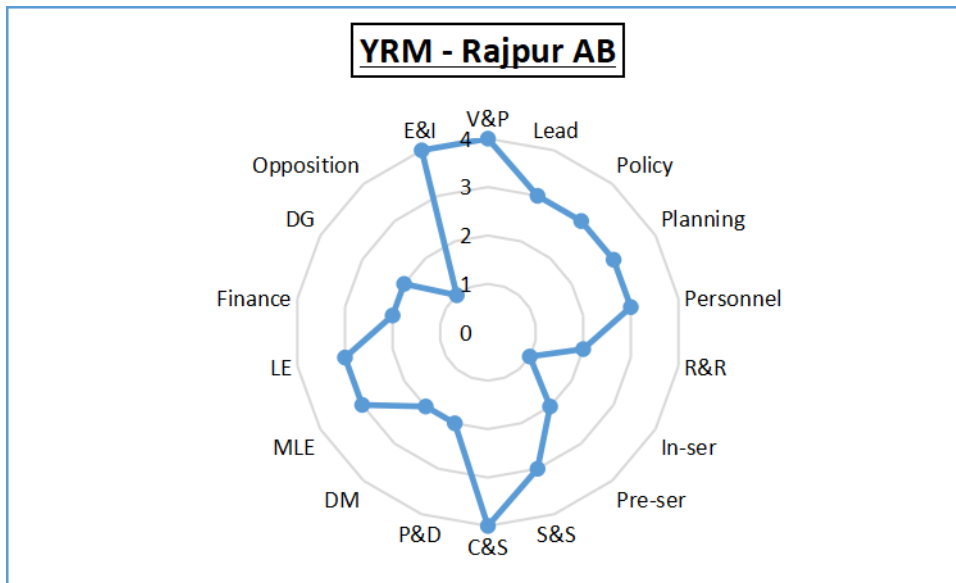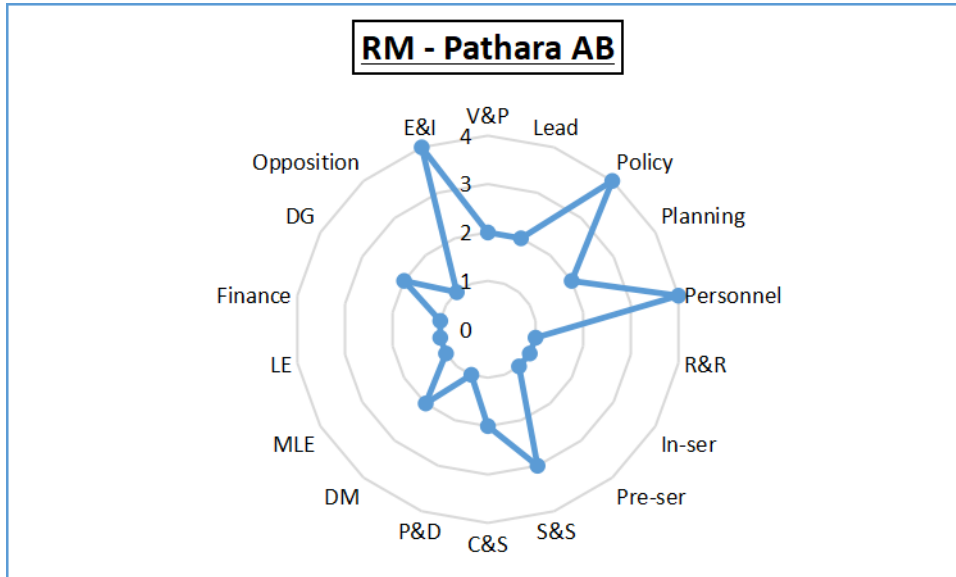## Annex 9: Radar graph of Head teacher/Principal of Yamunamai RM's school

9.1: Radar graph of Pachrukhi AM school of Yamunamai RM on the basis of head teacher/Principal response

9.2: Radar graph of Mahadev PV school of Yamunamai RM on the basis ofhead teacher/Principal response

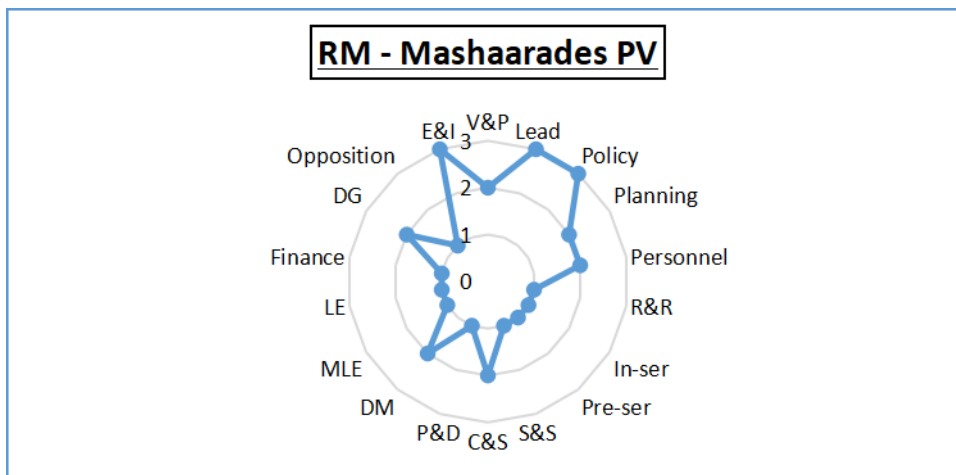9.3: Radar graph of Rajupur AB school of Yamunamai RM on the basis of head teacher/Principal response

YRM - Rajpur AB

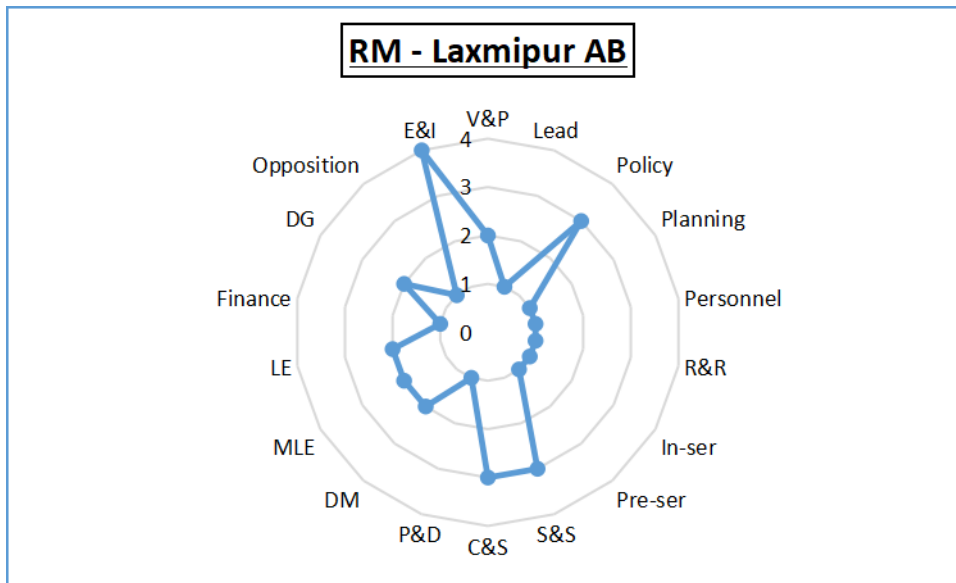## Annex 10: Radar graph of Head teacher/Principal of Rajdevi Municipality's school

10.1: Radar graph of Pathara AM school of Rajdevi Municipality on the basis of head teacher/Principal response
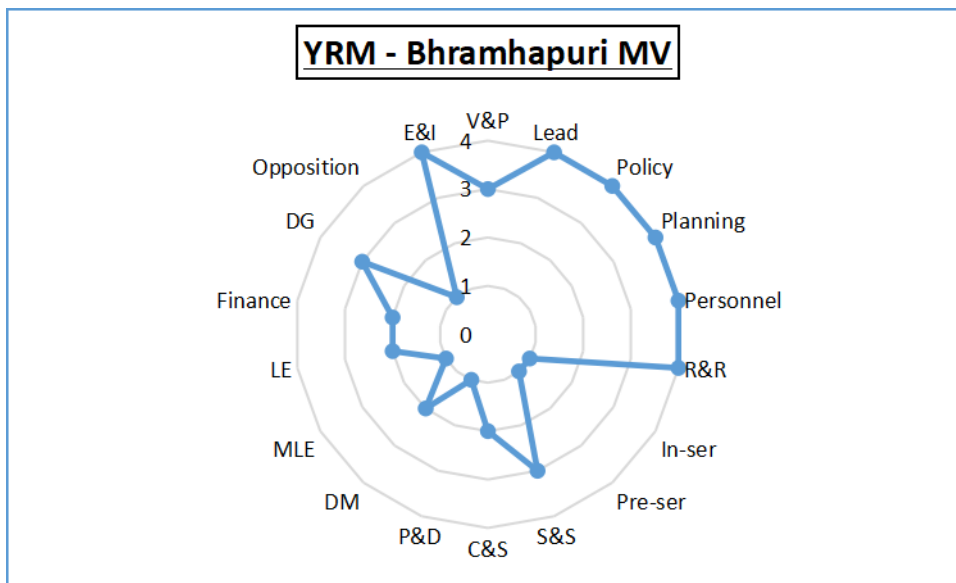

10.2: Radar graph of Mashaarades PV school of Rajdevi Municipality on the basis of head teacher/Principal response

10.3: Radar graph of Laxmipur AB school of Rajdevi Municipality on the basis of head teacher/Principal response

10.4: Radar graph of Bhramhapuri MV school of Rajdevi Municipality on the basis of head teacher/Principal response

Annex 11: Score table of Education Officer of all three municipality on the basis of Institutionalization tracker

Score table of Institution tracker on the basis of Education Officer responses of their respective municipality: Durgabhagwati RM, Yamunamai RM, & Rajdevi Municipality

S.N.	System building block	Element	Code	Municipality (Education Officer)		
				Durga Bhagwoti	Yamunamai	Rajdevi
1	Scaling Strategy	Vision and Pathway	V&P	4	2	4
2	Goverance	Leadership	Leadership	2	2	2
		Policy	Policy	4	4	3
		Planning	Planning	4	3	2
3	Human resources	Personnel	Personnel	2	2	2
		Recruitment and retention	Recruitment & retention	1	1	1
		In-service training	In-service	1	1	1
		Pre-service training	Pre-service	1	1	1
		Supervision and support	S&S	1	2	1
4	Curriculum and materials	Curriculum/standards	C&S	2	3	1
		Procurement and distinction	P&D	1	2	1
5	Information	Data management	Data management	3	3	1
		Monitoring, evaluation, & learning (MLE)	MLE	2	2	1
		Learner assessment	Learner assessment	2	1	1
6	Finance	Finance	Finance	3	2	1
7	Stakeholder engagement	Demand generation	Demand Generation	3	2	1
		Opposition	Opposition	1	1	1
8	Equity and inclusion	Equitable, inclusive access	E&I	4	4	4

Annex 12: Radar graph of Education Officer's responses of all three municipality

12.1: Radar graph of Durgabhagwati Rural Municipality on the basis of Education Officer response
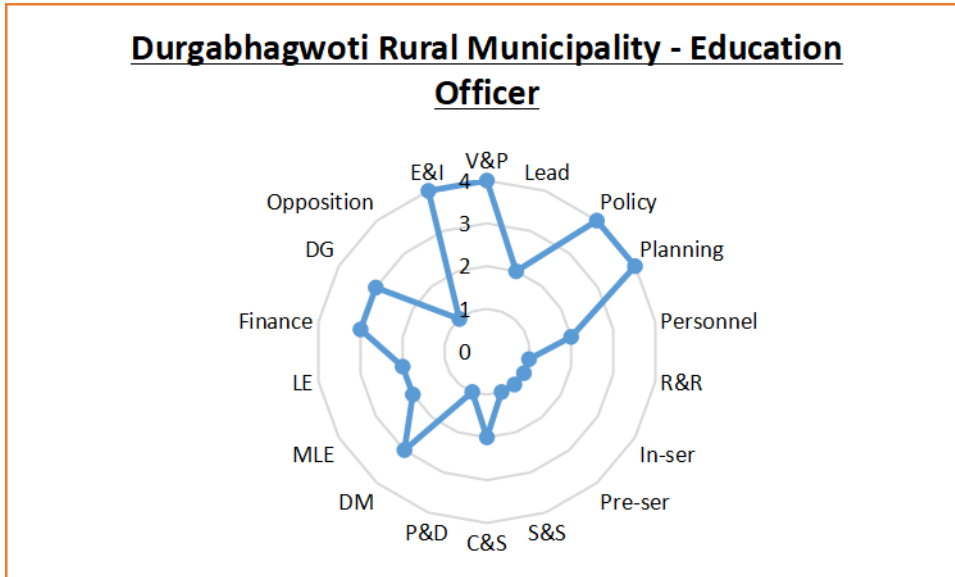
12.2: Radar graph of Yamunamai Rural Municipality on the basis of Education Officer response
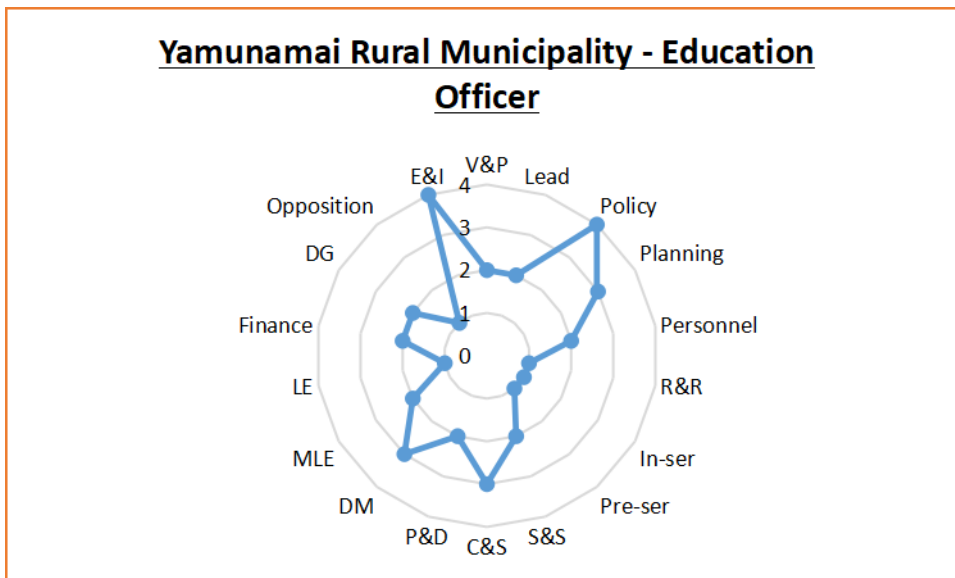
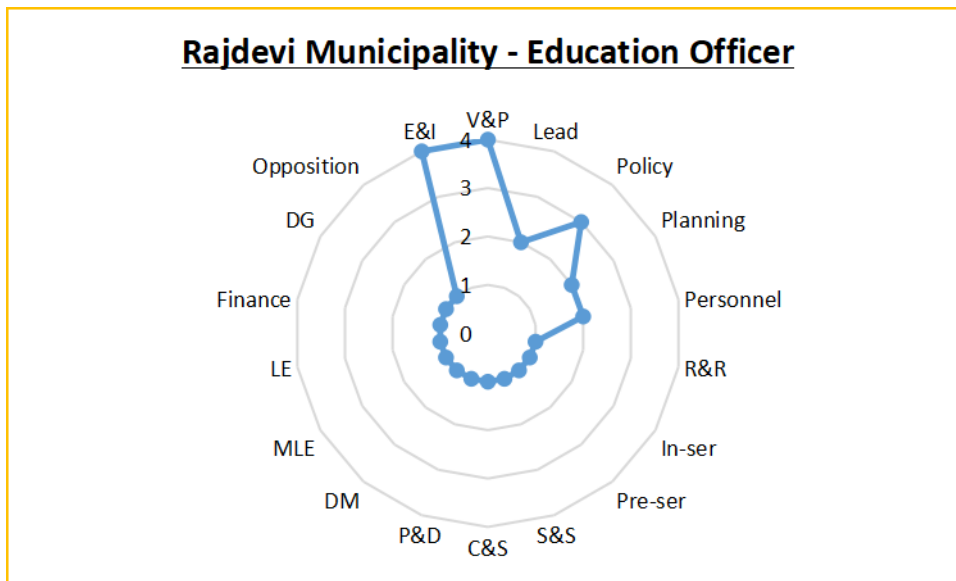12.3: Radar graph of Rajdevi Municipality on the basis of Education Officer response

Rajdevi Municipality - Education Officer

Photo Gallery

Condition of Public school in Rautahat

Community Action Group Discussion