

## AN ANALYSIS OF TEACHERS' TRAINING AND EDUCATION IN BALOCHISTAN, PAKISTAN: IMPACT ON STUDENTS' LEARNING AND RETENTION IN SCHOOLS

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### Abstract

Education in Balochistan faces a crisis that cannot be ignored. This study examines how teacher training and education influence student retention and learning across one of Pakistan's most educationally challenged provinces. Through voices of teachers struggling with limited resources, parents hoping for their children's success, and students going through an imperfect system, we uncover both the obstacles and opportunities for transformation.

Using a mixed-methods approach combining surveys from teachers and students with in-depth interviews and focus groups, this research reveals a clear pattern: qualified, well-trained teachers who show up regularly and prepare their lessons make a profound difference in keeping students in school and helping them learn. Yet persistent challenges, such as teacher absenteeism, inadequate training, scarce resources, and politically motivated hiring, continue to undermine educational progress, particularly in rural communities.

The study demonstrates that supportive school leadership, community engagement, and targeted policy interventions can create meaningful change. By addressing these interconnected factors, we offer practical recommendations to enhance teacher effectiveness and foster lasting improvements in student retention and learning throughout Balochistan.

### INTRODUCTION

Picture a classroom in rural Balochistan where a teacher hasn't received training in five years, where textbooks are scarce, and where half the students who started the year have already dropped out. This is not an isolated scenario; it is the reality facing thousands of children across Pakistan's largest province.

Balochistan, spanning vast landscapes but home to the country's smallest population density, confronts Pakistan's most severe educational challenges. The statistics are

sobering: over 54% of children remain out of school, and literacy rates (especially among girls) are the Pakistan's lowest (Niaz, 2021). Behind these numbers lie stories of communities desire for education, teachers working against overwhelming odds, and children whose potential remains untapped. Research across districts, from Kech, Makran coastal belt to Quetta in the north, from Lasbela to the remote areas of Loralai, Zhob, Sibi, Pishin, Ziarat, Killa Saifullah, and Killa

Abdullah, reveals a consistent pattern of challenges. Teacher absenteeism is not simply a matter of irresponsibility; it often originates from teachers being posted far from home with minimal support. Lack of training does not reflect teacher passiveness but rather systemic neglect of professional development. Resource constraints do not indicate local failure but highlight decades of under-investment, particularly in rural Balochistan (Ali et al., 2025; Makran Division Study, 2023; Shakir, 2023; Ahmed & Kiaz, 2022; Niaz, 2021; Khan, Abdul R., 2017).

These systemic issues directly affect whether students stay in school and what they learn while there. Teacher education emerges not as one factor among many, but as a critical leverage point for intervention, one that can ripple through entire communities when addressed effectively.

## 2. Literature Review

In Kech, researchers surveyed 236 teachers and 3,004 students, revealing a powerful truth: well-trained and qualified teachers significantly improve both academic performance and student retention (Ali et al., 2025). The impact extends beyond the classroom. When head teachers in girls' schools adopt democratic leadership styles; encouraging participation, listening to feedback, valuing teachers' input, student achievement increases (Baloch, 2023). Yet Habib (2022) reminds us that progress remains fragile. In rural Kech, basic facilities are lacking, teachers are frequently absent, and monitoring systems fail to hold anyone accountable. These are not abstract policy failures; they translate into children leaving school because bathrooms do not work, teachers do not show up, and no one seems to care.

In Lasbela, researchers discovered something both simple and profound, i.e. when teachers communicate positively with students and create welcoming classroom environments, academic performance improves significantly (Shakir, 2023; Riaz et al., 2024). One parent captured this beautifully: "My child's teacher is always present and encourages her to ask questions. She loves going to school now."

However, poverty, poor management, and high dropout rates continue to challenge even the

most dedicated teachers. English language instruction particularly struggles due to lack of teacher training, overcrowded classrooms, and inadequate infrastructure (Mohammad et al., 2018).

The Makran Division study (2023) provides compelling statistical evidence. Teacher regularity, lesson preparation, subject competency, and motivational strategies all significantly predict student achievement ( $\beta = 0.156$ ,  $p < 0.01$ ). This is not surprising to anyone who has experienced good teaching, but having the data matters for convincing policymakers to act.

In Naseerabad, researchers found that teaching-learning materials, such as textbooks, visual aids, hands-on materials, etc, significantly influence not just the academic performance but also student engagement and whether they stay in school (Ahmed et al., 2024). Without proper guidance and training, teachers are unable to develop learning materials, yet they are often expected to show results without basic tools.

Even in Quetta, Balochistan's capital, both public and private schools struggle with weak pedagogical and assessment practices. Teachers express need for professional development opportunities (Niaz, 2021; Bibi et al., 2024; Khan, Abdul R., 2017). When instructional leadership improves, the results can be dramatic. Studies show it can predict up to 49% of variance in science achievement (Yasmeen, 2023).

Various large-scale studies across Pishin, Sibi, Zhob, Ziarat, Killa Saifullah, and Killa Abdullah expose uncomfortable reality about politicized recruitment and its consequences. When teaching positions become political favors rather than professional appointments, unqualified individuals enter classrooms, and absenteeism becomes systemic, particularly in rural areas (Gul et al., 2023; Yasmeen, 2023; Khan, Abdul R., 2017).

In Ziarat, research demonstrates that principals' leadership styles directly affect teacher commitment and, consequently, student learning (Panezai & Shah, 2021). In Loralai, students taught by trained teachers show better attitudes and performance in both academics and social activities (Ahmed & Kiaz, 2022). In Killa Abdullah, teacher

competency in mathematics emerges as "the only solution" to retain students in primary classes, with training and encouragement creating more motivated students (Begum, 2020).

Although significant, but Balochistan's challenges are not unique. In Punjab and Sindh, regular, context-specific professional development improves student outcomes (Hussain et al., 2025; Ahmed et al., 2015). Across borders in India and Nepal, effective professional development and teacher qualifications link directly to better student engagement and achievement (Adhikari et al., 2024; Priya & Sangeeta, 2024).

International research consistently shows that high-quality, subject-specific teacher training proves crucial for student achievement, particularly for disadvantaged groups (Sancassani, 2022; Kirsten et al., 2023). It is clear that investing in teachers means investing in students.

### 3. Research Gap and Study Rationale

Despite extensive research on teacher education and student outcomes, a critical gap persists in the literature concerning Balochistan. The province lacks sufficient localized, district-level studies that account for its remarkable geographic, cultural, and socioeconomic diversity. Most educational interventions are imported from Punjab or Sindh, or adapted from international models, without adequate consideration of Balochistan's unique cultural contexts, geographic challenges, linguistic diversity, and resource constraints.

Furthermore, existing studies rarely integrate quantitative evidence with the lived experiences of teachers, students, and parents, limiting their applicability for policy formulation. This study addresses these gaps by providing comprehensive district-specific evidence, incorporating stakeholder perspectives, and developing context-sensitive recommendations grounded in Balochistan's realities.

#### 3.1 Research Objectives

This study pursues the following research objectives:

1. To examine the relationship between teacher training, qualifications, and professional development with student learning outcomes and retention rates across diverse districts in Balochistan.
2. To identify and analyze the systemic barriers (including teacher absenteeism, resource constraints, and politicized recruitment) that impede effective teacher performance and student achievement.
3. To explore the perspectives of teachers, parents, students, and educational administrators regarding the challenges and opportunities in teacher education and its impact on student outcomes.
4. To develop evidence-based, context-specific recommendations for enhancing teacher effectiveness and improving student learning and retention in Balochistan's education system.

#### 3.2 Research Questions

To achieve these objectives, the study investigates the existing situation through the following research questions:

- 1: To what extent do teacher qualifications, training, and professional development influence student academic achievement and retention in secondary schools across Balochistan?
- 2: What are the primary barriers that hinder teacher effectiveness and student learning in Balochistan's diverse districts?
- 3: How do teachers, parents, students, and policymakers perceive the quality and impact of teacher education on student outcomes?
- 4: What role do school leadership styles, community engagement, and availability of teaching-learning materials play in shaping student retention and learning outcomes?
- 5: What context-specific interventions and policy reforms can enhance teacher effectiveness and promote sustainable improvements in student learning and retention across Balochistan?

#### 4. Research Methodology

The study adopted a mixed-methods approach, recognizing that numbers alone cannot capture the full story of education in Balochistan, nor can anecdotes substitute for systematic

evidence. By combining both, we achieve a fuller picture.

Survey data from teachers and students across multiple districts including Makran, Kech, Lasbela, Quetta, Loralai, Sibi, and Ziarat was synthesized. These surveys measured teacher qualifications, regularity, lesson preparation, and their relationship to student achievement and retention.

The study also included studies with in-depth interviews and focus group discussions with head teachers, teachers, parents, and community members across districts. These conversations revealed the human dimension behind the statistics depicting the frustrations, hopes, and practical realities of education in Balochistan.

This integration allows the study to reveal that not only teacher training correlates with student retention (quantitative finding) but also to understand *why* and *how* this works in practice (qualitative insight).

## 5. The Evidence

The results reveal a consistent pattern across Balochistan's diverse districts. Teacher qualifications, lesson preparation, and regular attendance correlate positively with student achievement and retention (Ali et al., 2025; Makran Division Study, 2023; Shakir, 2023; Ahmed & Kiazai, 2022). This holds true whether we are examining coastal Makran or northern Ziarat, urban Quetta or rural Killa Abdullah.

Instructional leadership emerges as particularly powerful. In Quetta, Pishin, Sibi, and Killa Abdullah, it predicts up to 49% of variance in science achievement (Yasmeen, 2023). This means that how a school is led can explain nearly half of the difference in student science performance. This is a finding with profound implications for principal training and selection.

However, persistent barriers continue to undermine progress. Teacher absenteeism, resource scarcity, and insufficient monitoring undermines education delivery, especially in rural and northern districts (Gul et al., 2023; Yasmeen, 2023; Begum, 2020). In Makran, regular homework, thoughtful lesson planning, and extra support for struggling students associate with improved academic performance

(Makran Division Study, 2023). In Naseerabad, simply having teaching-learning materials available and using them significantly improves engagement, retention, and exam performance (Ahmed et al., 2024).

## 6. Discussion

### 6.1 Voices from the Field: People's Perspectives Behind the Data

#### Teachers

A secondary school teacher in Kech says: "When we receive regular training, we feel more confident and can use new methods to keep students interested. But many of us have not had any training in years" (Ali et al., 2025). This is not a complaint, it is a plea for professional support. A teacher in Makran captures the daily struggle: "We try to help students, but without enough materials and with large class sizes, it is very difficult to keep them engaged and prevent dropouts" (Makran Division Study, 2023). It shows that the commitment is there but the resources are not available.

A primary teacher in Naseerabad identifies a systemic problem others might prefer to ignore: "Teacher absenteeism is a big issue. Some of my colleagues are posted far from home and only come a few days a week. This affects students' learning and attendance" (Ahmed et al., 2024). The honesty here is refreshing, and the problem demands structural solutions, not just exhortations to work harder.

#### Parents

A parent in Lasbela expresses what every parent wants: "My child's teacher is always present and encourages her to ask questions. She loves going to school now" (Shakir, 2023). Such simple desires; a present teacher, an encouraging environment, yet for too many families, these remain aspirations rather than realities.

A parent in Quetta voices a different concern: "We want to support our children, but most of us are not educated and cannot help with homework. We need teachers to guide us too" (Gul et al., 2023). Education cannot be the school's responsibility alone; families need support to support their children.

Another parent in Naseerabad connects teacher regularity to student motivation: "Sometimes, teachers are not regular, and our children lose interest in school. The government

should make sure teachers come every day" (Ahmed et al., 2024). The solution seems obvious, yet implementation remains elusive.

Echoing the same concern a parent from Quetta makes a complain regarding teachers' professional competence: "Unfortunately our teachers themselves don't understand the depths of what and how they are teaching in classes – so, what will the students learn from them? Nothing, just a rote memorization like parrots" (Khan, Abdul R., 2017). Indeed, we need competent teachers for effective leading and delivery.

**Policymakers and Leaders**

An education official in Quetta states plainly: "Professional development for teachers is essential, but we also need to address issues like politicized recruitment and lack of resources" (Chachar,

2023). Acknowledging the political dimension of educational problems is crucial, but rare especially from a serving government official.

A head teacher in Makran emphasizes community: "Involving parents and the local community is crucial for improving school quality and student retention" (Makran Division Study, 2023). Schools cannot thrive as isolated institutions; they must be embedded in and supported by their communities, especially through the PTSMCs.

A policy advisor summarizes the accountability gap: "Monitoring and evaluation systems must be strengthened to ensure teachers are performing and students are learning" (Ahmed et al., 2024). Without accountability, good policies remain paper promises.

**6.2 The Numbers Tell Their Own Story**

The table (1) below shows mean ratings (scale 1-5) from both students and teachers on key factors affecting education:

Teacher-Related Factor	Students' View	Teachers' View
Teachers attend regularly	3.09	3.06
Teachers come prepared	3.51	3.63
Teachers follow lesson plans	3.01	3.08
Teachers are competent	2.98	3.21
Teachers assign meaningful homework	3.19	3.30
Teachers create supportive environments	3.09	3.27
Teachers help struggling students	2.18	2.84

Source: Makran Division Study, 2023

The alignment between student and teacher perceptions is striking; both groups see similar realities. The lowest rating (2.18 from students, 2.84 from teachers) goes to providing extra help for struggling students, revealing a critical gap in differentiated instruction. Teachers may want to help but lack time, training, or resources to do so effectively.

**Table 2: Province-wide head teachers (N=36) rated various strategies for improving education on a 5-point scale:**

Strategy	Mean Rating
Improved monitoring and evaluation	3.94
Parental and community involvement	3.94
Curriculum reforms	3.83
Technology and digital resources	3.78

Teaching aids and resources	3.78
Teacher-student engagement	3.72
Professional development for teachers	3.25

Interestingly, head teachers rate monitoring, evaluation, and community involvement highest, while professional development for teachers scores lowest despite overwhelming evidence of its importance. This suggests either that head teachers underestimate training's value or that they have become distrustful about available professional development quality.

### 6.3 Emerging Themes: Connecting the Dots

#### Teacher Qualifications and Training

Across districts, the evidence is unambiguous. Teacher qualifications and training strongly link to improved student performance and retention (Ali et al., 2025; Makran Division Study, 2023). This is not surprising, yet it bears repeating because resource allocation often fails to reflect this priority.

#### Motivation and Regularity

Absenteeism and lack of incentives undermine learning, especially in rural areas (Ahmed et al., 2024; Begum, 2020). When teachers do not show up, students stop coming to schools. The relationship is straightforward, yet addressing it requires tackling uncomfortable issues like political hiring, inadequate housing for remote postings, and lack of accountability.

#### Community Involvement

Parental and community engagement proves essential for supporting student learning, particularly during crises like COVID-19 (Gul et al., 2023). Schools that involve families and communities in meaningful ways see better outcomes. This is not about tokenistic parent-teacher meetings; it is about genuine partnership. PTSMCs strengthening is crucial.

#### Leadership and Monitoring

Effective school leadership and robust evaluation systems are critical for sustaining improvements (Panezai & Shah, 2021). However, monitoring should not mean punishment-focused surveillance. Instead, it should support teachers, identify needs early, and celebrate successes.

#### Resources

It is evident that learning among students can only take place with effective and efficient

teaching tools. Access to teaching-learning materials and digital resources remains uneven, affecting both teachers and students (Ahmed et al., 2024). A teacher without textbooks, without visual aids, without basic supplies is like a carpenter without tools; perhaps significantly capable, but severely hampered.

### 6.4 Integration and a Holistic View

When we bring together survey data, interviews, and focus group discussions, several urgent needs emerge:

1. **Targeted teacher training and professional development**, especially in under-served districts where teachers are most isolated from support networks
2. **Transparent recruitment and regular monitoring** to reduce both absenteeism and political interference in hiring
3. **Enhanced parental engagement** through better communication strategies and practical support for families wanting to help their children
4. **Investment in infrastructure and teaching materials** to create equitable learning environments where teachers can actually teach

These are not isolated interventions but interconnected elements of a functioning education system. Progress requires addressing all simultaneously rather than picking one or two for a quick wins.

### 7. Conclusions and Recommendations

Teacher education emerges clearly as a critical determinant of student retention and learning throughout Balochistan. Well-qualified and trained teachers, supported by effective leadership, do not only improve test and exams; but they also motivate students to stay

in school, to believe in their own potential, to imagine different futures for themselves and their families.

To maximize impact, the study recommends:

### 7.1 Strengthen Teacher Education and Regular Professional Development

**Pre-service training** must be rigorous, subject-specific, and grounded in classroom realities. Teacher candidates need not just content knowledge but also pedagogical skills, classroom management strategies, and understanding of how children learn.

**In-service training** should be regular, context-specific, and ongoing rather than one-time workshops. Teachers need sustained professional development that addresses their actual challenges, provides practical strategies, and offers follow-up support.

**Professional development opportunities** must be accessible to all teachers, regardless of location. This might mean mobile training teams, online resources, peer-mentoring networks, or residential training programs with transportation and accommodation support.

### 7.2 Address Systemic Barriers

**Teacher absenteeism** requires structural solutions: posting teachers closer to home, providing adequate housing for remote assignments, creating genuine accountability systems that identify and address root causes rather than simply punishing individuals. This is particularly required in case of female teachers.

**Politicized recruitment** must be replaced with transparent, merit-based hiring. This requires political will and sustained pressure from civil society, but without it, other reforms will flounder.

### 7.3 Invest in Educational Infrastructure

**Resources and materials** are not luxuries, they are necessities for young students' learning environment. Every classroom needs textbooks, visual aids, basic supplies. Every school needs functional facilities such as latrines, water, electricity, etc. Digital tools and internet connectivity should also reach rural areas, not just urban centers.

### 7.4 Foster Enabling Environments

**School leadership** significantly matters for creating a teaching and learning enabling environment. Principals need training in instructional leadership, democratic management, and creating supportive environments for both teachers and students.

**Regular community engagement** must be genuine, not performative and occasional. Schools should involve families and communities in meaningful ways, seeking their input, addressing their concerns, partnering in children's education.

## 8. Significance of the Study

This research fills a critical gap by providing robust, district-level, context-sensitive evidence on teacher education's impact in Balochistan, particularly in its diverse southern, coastal, northern, and rural regions. Previous research often treated Balochistan as homogeneous or simply applied findings from other provinces without adequate adaptation.

By triangulating quantitative and qualitative data and situating findings within broader regional and global literature, this study offers actionable insights for policymakers, educational leaders, and practitioners. This study not just documents problems, but illuminates pathways forward grounded in Balochistan's specific realities.

The voices the study shared; teachers struggling for resources, parents hoping for their children's success, students navigating an imperfect system, remind us that behind every statistic are human beings whose lives are profoundly shaped by educational policy decisions. When we invest in teacher education, we invest in these lives, in these impoverished communities, in Balochistan's future.

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