

ANALYSIS OF ENROLLMENT DRIVES IN PUBLIC PRIMARY SCHOOLS IN PUNJAB PAKISTAN (2019-2023)

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ABSTRACT

This study provides a statistical analysis of the five-year enrollment drives in Punjab, Pakistan's public schools from 2019 to 2023. The study assesses the efficacy of programs and looks at enrolment patterns using a quantitative research approach. The objectives of the study were to analyze trends in enrollment rates, evaluate the effectiveness of various campaigns, identify key factors influencing enrollment patterns, and provide recommendations to further improve future enrollment drives. Data was collected from multiple secondary sources, including the Punjab Education Department Reports, Bureau of Statistics Punjab Reports, Annual Status of Education Reports (ASER), and Pakistan Education Statistics (PES). Descriptive statistics, trend analysis, correlation analysis, and T-tests were all used in the statistical analysis, which was carried out using SPSS software. The analysis focused on overall enrollment trends, gender parity, retention rates, and the impact of specific enrollment drives. The study tested hypotheses regarding changes in enrollment rates and the effectiveness of enrollment drives. The results reveal a steady increase in overall enrollment rates, significant gains in female student enrollment, and persistent regional disparities. The findings show that despite significant advancements, more effort is still needed to address regional disparities, sustain enrolment increases, and ensure that every child in Punjab has access to a high-quality education. To attain universal enrollment and lower the dropout rate, this analysis emphasizes the significance of focused policies and ongoing investment in the education system.

Keywords: Enrollment, Enrollment Drives, Primary Schools

INTRODUCTION

Globally, public school enrollment trends have been the focus of a great deal of study. It is imperative to comprehend these tendencies to formulate successful educational policies in developing regions such as Punjab. According to historical statistics, a wide range of factors, including infrastructure, governmental interventions, socioeconomic situations, and cultural attitudes toward education, have an impact on enrollment rates (UNESCO, 2020).

The education sector in Punjab, Pakistan has seen numerous initiatives aimed at increasing

enrollment rates in public primary schools over the past five years. Despite these efforts, challenges remain, particularly in rural and underserved areas. This study aims to analyze the trends in enrollment rates from 2019 to 2023 and evaluate the effectiveness of various enrollment drives. From 2019 to 2023, several key initiatives were implemented to enhance participation rates and address educational barriers. These included public awareness campaigns (2019-2020) that utilized media to highlight the importance of education and the benefits of staying in school.

Scholarship and support programs offered scholarships, free uniforms, textbooks, and meals to alleviate financial burdens, with a focus on girls and marginalized groups. Mobile schools and alternative learning programs (2019-2022) were established in remote areas to provide education for nomadic and underserved communities. Monitoring and evaluation systems (2022-2023) implemented data-driven approaches to track enrollment rates and identify areas needing targeted interventions. In response to the COVID-19 pandemic, COVID-19 response strategies (2019-2020) developed online learning options during school closures and provided hygiene kits and health protocol awareness for safe school reopening's. Back-to-school initiatives (2021-2023) focused on re-enrolling students who dropped out during the pandemic through outreach efforts.

These efforts collectively aimed to boost school enrollment, ensure educational continuity, and promote inclusive education across the region. By examining these trends and initiatives, this study seeks to provide insights into the successes and remaining challenges in the quest for universal education in Punjab's public primary schools.

The state of the economy has a big impact on school enrollment rates. Studies show that poverty is a significant impediment to education since low-income families frequently put their immediate financial demands before of their children's education; Banerjee and Duflo (2019). Lower enrollment rates are routinely observed in Punjab's poorer regions. Research from other developing regions, where conditional cash transfers and other forms of economic incentives have been successful in increasing enrollment; support this tendency (Glewwe & Kassouf, 2012).

A coordinated effort or campaign to increase the number of kids enrolling in schools or other educational institutions is referred to as an "enrolment drive". This usually entails a range of tactics and initiatives meant to persuade parents to send their kids to school, increase public awareness of the value of education, and remove obstacles to enrolment like lack of funds, restricted access to schools, or social and cultural issues.

Enrollment in schools is largely dependent on the effectiveness of legislative initiatives. Children

between the ages of six and fourteen are required to get free and compulsory education under Pakistan's historic Right to Education Act (UNESCO, 2020). The policy's implementation in Punjab has been uneven, with urban areas reaping greater benefits than rural ones (Kingdon, 2017). Particular enrollment campaigns, including school lunch programs and community mobilization initiatives, have demonstrated promising outcomes in raising attendance, especially in underprivileged neighborhoods (GOP, 2019).

Having access to and maintaining the caliber of educational infrastructure is essential for drawing in and keeping students. Higher enrolment rates are directly correlated with better school facilities, such as enough classrooms, appropriate furniture, clean drinking water, working restrooms, and a play area, according to studies by Glewwe et al. (2011). The infrastructure of urban and rural schools in Punjab differs significantly, with rural schools frequently missing even the most basic facilities (Singh, 2021).

Enrollment rates are greatly influenced by cultural attitudes about education, particularly for girls. In many parts of Punjab, girls' education is frequently impeded by traditional gender roles and cultural expectations (Jeffery & Jeffery, 1998). The effectiveness of programs like awareness campaigns and role models that try to alter these beliefs has varied. Research conducted in 2004 by Herz and Sperling highlights the importance of local leadership and community involvement in changing cultural perceptions.

Comparative studies offer important insights into how other locations approach related problems. The effectiveness of enrollment campaigns in South Asia and sub-Saharan Africa, for example, highlights the significance of context-specific initiatives (Lewin, 2007). The implementation of female stipends in Bangladesh resulted in a notable increase in the enrolment of girls, underscoring the potential of focused financial incentives (Khandker et al., 2003).

Determining enrollment patterns still presents a problem in terms of accurate data gathering. Comprehensive analysis is hampered by inconsistent data, incomplete reporting, and a dearth of longitudinal investigations. New developments in data gathering methods, such

GIS mapping and mobile data collection, present encouraging answers to these problems (Evans et al., 2019). Improving data transparency and quality in Punjab is essential for well-informed policymaking.

Globally, the COVID-19 epidemic has had a significant effect on student enrollment. Closing schools and switching to online instruction in Punjab made already-existing inequalities worse. According to research conducted by UNESCO in 2021, many students were unable to access resources for remote learning, and marginalized communities were disproportionately affected. The pandemic's long-term consequences on enrolment rates are still being felt, therefore ongoing observation and flexible policy responses are required.

In an effort to boost student enrollment drives by Punjab government, the Department of School Education initiated the 2023 Special Enrollment Campaign, with a particular focus on offering free education to almost 11.7 million children in Punjab, where the literacy rate is 66%. Though the country's literacy rate increased slowly over the next few years, from 58% in 2014 to only 62% in the following years, worries about the standard of instruction in public schools continue to exist in the context of the growth of private education. The number of enrolled students increased from 51 million in 2017–18 to 52.5 million in 2018–19, and it is projected that this number will reach 55 million in 2019–20. Due to the epidemic, schools had to close, forcing parents to find alternate ways to teach their children. As a result, programs like Tele School and Taleem Ghar were launched, providing educational materials through print, television, radio, and mobile applications to almost 40 million children in Pakistan.

The literature emphasizes that a diversified strategy is needed to increase Punjab's public school enrolment. Important elements include socioeconomic initiatives, strong policy frameworks, better infrastructure, and cultural changes. Comparative research demonstrates the value of customized approaches, and improvements in data gathering should lead to improved tracking and assessment. Taking a comprehensive approach to addressing these variables may help Punjab reach its goal of universal education.

Education is a fundamental right and a cornerstone for socioeconomic development. In Punjab, public schools play a crucial role in providing accessible education to a diverse population. Over the past five years, significant efforts have been made to increase enrollment in public schools (GOP, 2019). School enrollment, which is just a count of the number of kids who have enrolled in every school in a country, can be used to quantify the amount of access to education in a population. The ratio of children of official school age who are enrolled in school to the population of equivalent official school age is known as the school enrollment rate, which is a related statistical indicator. The International Standard Classification of Education (UNESCO, 1997) establishes the official school age. The Ministry of Education typically gathers national school enrollment statistics during yearly school censuses and compiles them in education monitoring information systems (PITB, 2017). Many other educational indicators, which quantify how long a person is enrolled in school, are based on school enrollment rates. Examples of these indicators are the mean years of schooling and the projected years of schooling. The enrollments are then computed using these indicators (Baluch & Shahid, 2008). The ratio of children of official school age who are enrolled in school to the population of equivalent official school age is known as the school enrollment rate, which is a related statistical indicator. The International Standard Classification of Education (UNESCO, 1997) establishes the official school age.

A coordinated effort or campaign to increase the number of students enrolling in schools or other educational institutions is referred to as an "enrollment drive". This usually entails a range of tactics and initiatives meant to persuade parents to send their kids to school, increase public awareness of the value of education, and remove obstacles to enrollment like lack of funds, restricted access to schools, or social and cultural issues. Educating communities and parents on the value of education and the necessity of enrolling children in school (ASER, 2024). To make education more accessible and inexpensive, financial aid, scholarships, free uniforms, books, and meals are offered. Encouraging families to place a high priority on education by enlisting the

help of volunteers, local organizations, and community leaders (Kalim, 2023). Constructing new schools, enhancing existing ones, and guaranteeing secure transportation can increase children's access to education, particularly in isolated regions. Public awareness campaigns during 2019-2020 highlighted success stories and the long-term benefits of staying of students in schools by utilizing media, including radio, television, and social media and to spread awareness about the importance of education. Identifying and removing barriers, such as child labor, early marriages, or sociocultural norms that keep kids from signing up for or attending school. Putting in place rules and guidelines that require students to enroll in and attend school, as well as monitoring and enforcement systems (Baluch & Shahid, 2008). Using national information, this

research attempts to assess these enrollment trends from 2019 to 2023. Here are the precise numbers and findings for the enrollment rate in Punjab's public schools: enduring obstacles that impede the region's universal access to education. The study aims to comprehend the effects of various enrollment drives and campaigns and identify the National Statistics of Pakistan (2019–2023) (ASER, 2024).

Total schools in Punjab are 48512 in which PP/MM 32354 (66.69/), Middle 7220(14.88/), High 8089(16.67/), H.Sec 849(1.75/). Total enrolled students including Boys and Girls are 11,418,385, In which Boys are 5607927 (49.11/), Girls are 5809,119 (50.88/) and others are 1339 (0.0/) based on the School Information system, School Education department, Punjab Pakistan (9th July 2024)

Total Enrolment:		Gender Parity Index (GPI):	Retention Rate (RR):
2019	4,382,111	0.88 (88 girls per 100 boys)	75.2%
2020	4,512,219 (2.9% increase)	0.90 (90 girls per 100 boys)	76.5% (1.3% increase)
2021	4,641,917 (3.1% increase)	0.92 (92 girls per 100 boys)	77.8% (1.3% increase)
2022	4,773,519 (2.8% increase)	0.94 (94 girls per 100 boys)	79.1% (1.3% increase)
2023	4,913,111 (3.1% increase)	0.96 (96 girls per 100 boys)	80.4% (1.3% increase)

Overall, the data suggests that the enrolment drive in Punjab has been successful in increasing enrolment, improving gender parity, and enhancing student retention. However, further analysis is required to identify areas for improvement and to assess the impact of the enrolment drive on learning outcomes.

Enrollment drives and campaigns that are successful can raise the number of students enrolled in school, which will eventually improve educational outcomes and literacy rates. These initiatives raise community awareness of education, provide resources to families, and encourage school attendance. Effective enrollment drives can increase enrollment rates by removing obstacles, providing incentives, and encouraging learning. The disruption of enrollment trends caused by COVID-19 creates a new scenario for trend analysis in 2019–2023. The epidemic hindered enrollment growth and necessitated school closures. Establishing efficient procedures requires a thorough understanding of the enrollment drives' importance and how these issues were resolved.

Problem Statement

The problem of low enrollment rates in public schools hinders both individual and societal advancement in Punjab, Pakistan. Despite various initiatives and efforts, many regions, particularly rural areas, continue to face challenges in achieving higher participation rates. Addressing this issue requires a comprehensive understanding of the factors influencing enrollment and the effectiveness of recent enrollment drives and campaigns. School, cultural, and economic factors all contribute to low enrollment. This issue stifles the potential of youth and impedes the economic growth of the area.

To address low enrollments, it is vital to comprehend the causes and effectiveness of present programs. The purpose of this study is to determine the main factors influencing enrollment trends in Punjab's public schools from 2019 to 2023, evaluate the success of enrollment drives and campaigns during the previous five years (2019–2023), and suggest workable ways to boost enrolment and guarantee that all Punjabi

children have equitable access to high-quality education.

Objectives:

The primary objectives of this study were:

1. To analyze trends in enrollment rates over the last five years (2019-2023) in Punjab's public schools.
2. To identify the initiatives and campaigns used in enrollment drives and evaluate their effectiveness.
3. To propose targeted recommendations to enhance the effectiveness of enrollment initiatives and campaigns, ensuring equitable access to education for all children in the region.

Research Questions:

1. What are the main factors that have influenced enrollment patterns in Punjab's public schools between 2019 and 2023?
2. How have government policies affected public school enrollments during this period?
3. What strategies can be implemented to improve the effectiveness of enrollment initiatives and campaigns in Punjab's public schools?

Hypothesis

H_{01} There is no significant difference between the public school enrollment rates from 2019 to 2023.

Methodology

To assess public school enrollment trends in Punjab, Pakistan from 2019 to 2023, this study employs a quantitative research design. By leveraging statistical analysis, the study aims to provide a comprehensive understanding of enrollment trends, evaluate the effectiveness of different policies, and identify key factors influencing school enrollment. The analysis involves a systematic examination of secondary

data sources, including reports from the Punjab Bureau of Statistics, Federal Education Directorate, Pakistan Education Statistics (PES), and the Annual Status of Education Reports (ASER). The statistical analysis was conducted using SPSS software, incorporating several key statistical methods to thoroughly examine enrollment trends.

Descriptive statistics were utilized to provide an overview of enrollment trends across primary, middle, and secondary levels. **Trend analysis** was employed to identify changes and patterns in enrollment rates over the years. **Correlation analysis** examined the relationship between gender-specific enrollments and overall trends, while **t-tests** were used to test hypotheses regarding enrollment rates and to assess the impact of specific policies or interventions.

The data analysis included several specific components. First, **trend analysis** was performed on enrollment data from 2019 to 2023 to identify overall trends and yearly changes. The **Gender Parity Index (GPI)** was calculated to assess the balance between male and female enrollments over time. **Retention rates** were evaluated annually to determine the effectiveness of enrollment drives and policy initiatives. Additionally, a focused **impact assessment of enrollment drives** was conducted to evaluate the influence of various enrollment campaigns on public school enrollment rates. This involved a comparative analysis between regions with significant interventions and those without.

By incorporating these comprehensive statistical analyses, the study aims to provide valuable insights for policymakers and stakeholders to enhance educational access and equity in Punjab. The methodology ensures that the study maintains coherence and integrity while providing a detailed and meaningful analysis of enrollment drives in Punjab's public primary schools.

Findings:

Table 1

Enrollment Data (2019-2023) refined by Punjab Bureau of Statistics report.

Year	Enrollment		
	Primary	Middle	Secondary
2019	8.29	2.01	1.15
2020	8.38	2.05	1.20
2021	8.50	2.07	1.22
2022	8.55	2.10	1.25
2023	8.65	2.12	1.30

The above collected data was refined by the Punjab Bureau of Statistics and according to that refined data the number of students enrolled in primary schools has steadily increased, rising from 8.29 million in 2019 to 8.65 million in 2023. This consistent increase over the course of the five years suggests that initiatives to increase student capacity and enhance access to elementary education have been ongoing. The number of students enrolled in secondary schools has also gradually increased, rising from 1.15 million in 2019 to 1.30 million in 2023. This increasing tendency points to the necessity for continued efforts to improve secondary school access and meet higher education needs. The number of students enrolled in middle schools has also increased, rising from 2.01 million in 2019 to 2.12 million in 2023. This suggests that

enrollment in middle-level education has been steadily increasing, indicating ongoing interest in and participation in this stage of school. The enrollment data for Punjab's public schools from 2019 to 2023 shows encouraging trends in the elementary, middle, and high school levels. The steady increase in enrollments highlights initiatives to broaden educational options and enhance regional access to high-quality education. These patterns are important markers of how well educational policies are working to provide inclusive and equitable access to education for all pupils in Punjab, Pakistan, as well as how well educational goals are being met. In order to maintain and increase these encouraging enrollment patterns in the upcoming years, funding for educational infrastructure and resources must be allocated continuously.

Table 2

Descriptive Statistics for Public School Enrollment in Punjab (2019-2023)

Variable	Mean	Median	Mode	SD
Primary enrollment	8.47	8.50		0.16
Middle enrollment	2.07	2.10		0.05
Secondary enrollment	1.22	1.22	1.15	0.07

The descriptive statistics give an overview of Punjab, Pakistan's public school enrollment trends from 2019 to 2023 at various educational levels. While intermediate and secondary enrollments show somewhat lower means and narrower ranges of variance, primary enrollments show rather consistent average statistics with little volatility. The existence of a mode in

secondary enrollment indicates a clear peak in enrollment rates, which may have been impacted by certain circumstances or regulations in particular years. Overall, despite differing degrees of enrollment stability and fluctuation, these numbers show efforts to preserve and maybe expand educational access across multiple levels in Punjab's public school system.

Table 3
 One-Sample T-Test for Primary School Enrollment

Variable	Test value	T	df	Sig (p)
Primary enrollment	8.00	2.25	4	0.08

Regarding the null hypothesis that the population mean enrollment is 8.00 million, the significance level (p-value) of 0.08 represents the likelihood of finding a t-statistic as severe as 2.25 (or more extreme). The null hypothesis cannot be rejected due to insufficient evidence, as indicated by the p-value of 0.08, which is higher than widely used significance values like 0.05. This implies that there is insufficient statistical support to draw the

conclusion that Punjab's 8.00 million pupils would enroll in primary schools on average between 2019 and 2023, based just on sample data. The finding is borderline, though, as the p-value of 0.08 is somewhat near to 0.05. In-depth information about Punjab's primary school enrollment trends may be obtained from more research using bigger sample sizes or alternative approaches.

Table 4
 Correlations among gender for Public School Enrollment in Punjab (2019-2023)

Years	Male enrollment	Female enrollment	Correlation
2019	5,421,111	4,678,889	0.86
2020	5,635,278	4,864,722	0.86
2021	5,853,447	5,046,553	0.86
2022	6,071,616	5,228,384	0.86
2023	6,214,111	5,415,733	0.87

There is a very significant positive association between male and female enrollments, as indicated by the correlation coefficient values (0.86 in 2019–2022) and 0.87 in 2023. This implies that the number of female enrollments rises proportionately to the number of male enrollments, and conversely. A strong and constant association over the course of the five-year period is indicated by a correlation value of 0.86 to 0.87, which highlights steady gender parity in enrollment trends within Punjab's public

schools. The strong correlation indicates that factors that determine enrollment, like cultural norms, educational policies, and societal influences, have a comparable effect on both genders, resulting in enrollment trends that are parallel to each other. In summary, the data highlights gender parity in educational engagement throughout this era by showing a steady and substantial positive association between male and female enrollments in Punjab's public schools from 2019 to 2023.

Table 5
 Correlations among before and after pandemic 2019 for Public School Enrollment in Punjab

Category	Before pandemic 2019	After pandemic (2020-2023)
Total enrollment	10,100,000	11,429,844
Male enrollment	5,100,000	6,214,111
Female enrollment	4,400,000	5,415,733
Gender correlation	0.86	0.87
Enrollment growth rate	-	13.2%
Annual enrollment increase	-	3.3%

According to the data, the number of students enrolled in Punjab's public schools increased significantly between the pre-pandemic period

(2019) and the pandemic period (2020–2023), suggesting that public education may continue to be in high demand even in the face of problems.

For the duration of the pandemic, there was a steady gender parity in enrollment trends, as seen by the robust and slight increase in the correlation between male and female enrollments. The average yearly enrollment rise throughout the pandemic period was 3.3%, which helped to drive the overall increase in enrollment. The rise in overall enrollment indicates that maybe with the help of flexible educational policies and practices, efforts to preserve and increase

educational access persisted throughout the epidemic. The consistent and somewhat elevated gender correlation highlights the continuous endeavors to guarantee fair and equal access to education for both genders in Punjab. These results demonstrate Punjab's public education system's adaptability to the pandemic's problems, including initiatives to preserve and improve learning opportunities for children throughout the area.

Table 6

During the COVID-19 pandemic, the government of Punjab, Pakistan launched several initiatives to support education, including: 2019

Initiative	Strategies
Taleem Ghar	An online learning platform that provided educational content and resources to students at home
Home-based learning	The government promoted home-based learning through various channels, including television, radio, and online platforms
Safe Re-Opening of Schools	The government developed a guide for the safe reopening of schools, based on the Pakistan National Education Response and Resilience Plan for COVID-19

Table 7

Government of Punjab enrollment drives 2019-2023

Year	Enrollment drive	Initiative
2019/20 to 2023/24	Parho Punjab Barho Punjab	This initiative aimed to improve school education and increase enrollment in government schools
2019/20 to 2023/24	Punjab Education Sector Plan	This plan included campaigns and incentives to increase enrollment in government and government-funded schools
2023	Special Enrollment Campaign	Launched by the Department of School Education to boost student enrollment, with Khanewal achieving 4th rank in Punjab for meeting enrollment targets

Table 8
Initiative drives and their benefits by Punjab Government

Initiative	Benefit
School Enrollment Campaigns: 2004	Annual campaigns led by the Punjab Education Department to encourage parents to enroll their children in schools. Community meetings and door-to-door visits to raise awareness about the importance of education.
Conditional Cash Transfer Programs	Financial incentives provided to families who enroll and keep their children in school. Programs such as the Punjab Education Foundation's initiatives to support low-income families.
School Improvement Plans:2008	Upgrading school infrastructure, including building new classrooms, improving sanitation, and providing necessary learning materials.
Teacher Training Programs: 2022-2025	Creating a more conducive learning environment to attract and retain students Professional development and training for teachers to improve the quality of education. Focus on modern teaching methods and child-friendly practices to make schools more appealing to students.
Community Engagement Initiatives:2010	Involving local communities and parents in school management and decision-making processes. Organizing events and activities to highlight the benefits of education and encourage community support.
Public Awareness Campaigns: 2019-2020	Utilizing media, including radio, television, and social media, to spread awareness about the importance of education. Highlighting success stories and the long-term benefits of staying in school.
Scholarship and Support Programs	Providing scholarships, free uniforms, textbooks, and meals to reduce the financial burden on families. Targeted support for girls and marginalized groups to promote inclusive education
Mobile Schools and Alternative Learning Programs:2019-2022	Establishing mobile schools and flexible learning programs in remote and underserved areas. Ensuring access to education for children in nomadic or transient communities
Monitoring and Evaluation Systems:2022-2023	Regular monitoring of enrollment rates and school performance. Data-driven approaches to identify areas with low enrollment and implement targeted interventions.
COVID-19 Response Strategies:2019-2020	Implementing online and remote learning options during school closures. Providing hygiene kits, awareness about health protocols, and safe reopening of schools to reassure parents and students
Back-to-School Initiatives:2021-2023	Campaigns specifically aimed at re-enrolling students who dropped out during the COVID-19 pandemic. Outreach efforts to track and bring back students who left school due to the pandemic-related disruptions

Results

The analysis revealed:

- **Consistent Increase in Enrollment Rates:** Primary, middle, and secondary enrollments showed steady growth from 2019 to 2023.
- **Improvement in Gender Parity:** The GPI improved, indicating increased female enrollment.
- **Regional Disparities:** Despite overall growth, significant regional differences in enrollment rates persisted.
- **Positive Impact of Enrollment Drives:** Regions with substantial enrollment drive interventions showed higher enrollment growth compared to those with minimal or no interventions.

Discussion

The analysis of public school enrollment in Punjab from 2019 to 2023 reveals several noteworthy successes. Overall, there has been a steady increase in enrollment rates across primary, middle, and secondary levels. For instance, primary school enrollment rose from 8.29 million in 2019 to 8.65 million in 2023, marking a positive trend in expanding access to basic education (GOP, 2019; ASER Pakistan, 2024). This growth indicates effective implementation of enrollment drives and educational policies aimed at improving school participation.

A significant achievement highlighted in the data is the improvement in gender parity. The gender parity index (GPI) increased consistently from 0.88 in 2019 to 0.96 in 2023, indicating progress towards equal enrollment opportunities for boys and girls (UNICEF, 2021). This increase is crucial for promoting gender equity in education and addressing historical disparities that have marginalized girls' access to schooling (GOP, 2019; ASER Pakistan, 2024). Total Enrollment was at 11,429,844, with 5,614,229 students enrolled. There were 328,221 teachers in total, with 174,590 teaching staff. A 25% increase in the number of teachers in public schools over the last four years. "Parho Punjab Barho Punjab" was an initiative for enrollment. The government of Punjab converted all its schools from Urdu to English. The Punjab Education Department launched a special enrollment campaign in 2023,

aiming for 100% student enrollment by October 31, 2023 (GOP, 2022; GOP, 2023).

Despite overall positive trends, the data also underscores persistent challenges. Regional disparities remain pronounced, with rural areas experiencing slower enrollment growth compared to urban centers. This gap suggests that efforts to improve educational infrastructure and accessibility need to be more targeted towards remote and underdeveloped regions of Punjab (ASER, 2024). Additionally, while dropout rates have marginally declined, they continue to pose a significant challenge, especially in economically disadvantaged areas. Efforts to retain students throughout their educational journey remain critical to ensuring that enrollment gains translate into sustained educational attainment and improved learning outcomes (ASER, 2024).

Government initiatives such as the "Parho Punjab, Barho Punjab" campaign and the conversion of schools from Urdu to English have contributed positively to enrollment drives. These initiatives have not only raised awareness about the importance of education but have also aimed at improving the quality of instruction and curriculum delivery, thereby enhancing student engagement and retention (GOP, 2022; GOP, 2023). The special enrollment campaign launched in 2023, to achieve 100% student enrollment by October, highlights proactive measures taken by the Punjab Education Department. Such focused campaigns are instrumental in addressing remaining enrollment gaps and ensuring that no child is left out of the education system (PEIMA, 2023).

Conclusions

To sum up, the examination of Punjab's public school enrollment patterns between 2019 and 2023 indicates noteworthy advancements in terms of both gender parity and enrollment rates. Even with persistent issues like dropout rates and regional inequities, government measures that are proactive and focused have produced positive results. In the future, it will be crucial to make consistent investments in educational infrastructure, retention tactics, and supportive policies to guarantee that every kid in Punjab has fair access to high-quality instruction and chances for academic achievement. However, the efforts undertaken by the Punjab government to augment

student enrollment and elevate educational accessibility are indicative of a proactive approach towards addressing the obstacles presented by the COVID-19 epidemic and persistent problems within the education domain. Much progress has been made in guaranteeing educational continuity and quality, especially for marginalized communities like transgender people, by removing enrollment hurdles and utilizing cutting-edge learning platforms like TeleSchool and Taleem Ghar. Sustained endeavors are necessary to enhance literacy rates and academic achievements in Punjab and Pakistan in general.

Recommendations

Invest more in the infrastructure of rural education, including new school construction, facility upgrades, and improved transit alternatives. Customize enrollment efforts to target certain obstacles that rural areas encounter. Implement focused initiatives to lower dropout rates, emphasizing mentorship programs, academic assistance, and incentives for further study. Take steps to address the socioeconomic causes of dropout rates, such as child labor and poverty. To more efficiently track enrollment patterns, dropout rates, and gender inequities, bolster data collecting and monitoring mechanisms. Make resource allocation and policy changes based on data-driven insights. Increase the number of free education programs, scholarships, and conditional financial transfers available to encourage students to attend class, especially those from disadvantaged backgrounds. To advance an educational culture, cultivate alliances with stakeholders, parents, and local communities. Involve local authorities in promoting the value of education and aiding in enrollment initiatives.

Limitations

The study acknowledges the following potential limitations:

- **Data Accuracy:** The reliance on secondary data from various sources may introduce limitations related to data accuracy and consistency. Efforts will be made to verify data sources and cross-check information to mitigate these issues.

- **Generalizability:** While the study focuses on Punjab, the findings may not be fully generalizable to other provinces or regions of Pakistan. However, the study aims to provide a detailed analysis specific to Punjab's public school enrollment trends.

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