

SEACMEQ V

SOUTH AFRICAN

TECHNICAL REPORT

A study of the conditions of schooling and the quality of education



SEACMEQ

Southern and Eastern Africa Consortium
for Monitoring Educational Quality



basic education

Department:
Basic Education
REPUBLIC OF SOUTH AFRICA



This technical report of the SEACMEQ V. *A study of the conditions of schooling and the quality of education* was compiled by Dr Mark Chetty, Dr Nonhlanhla Shoji, and Prof Anil Kanjee.

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SEACMEQ MINISTRIES OF EDUCATION



MINISTRIES OF EDUCATION

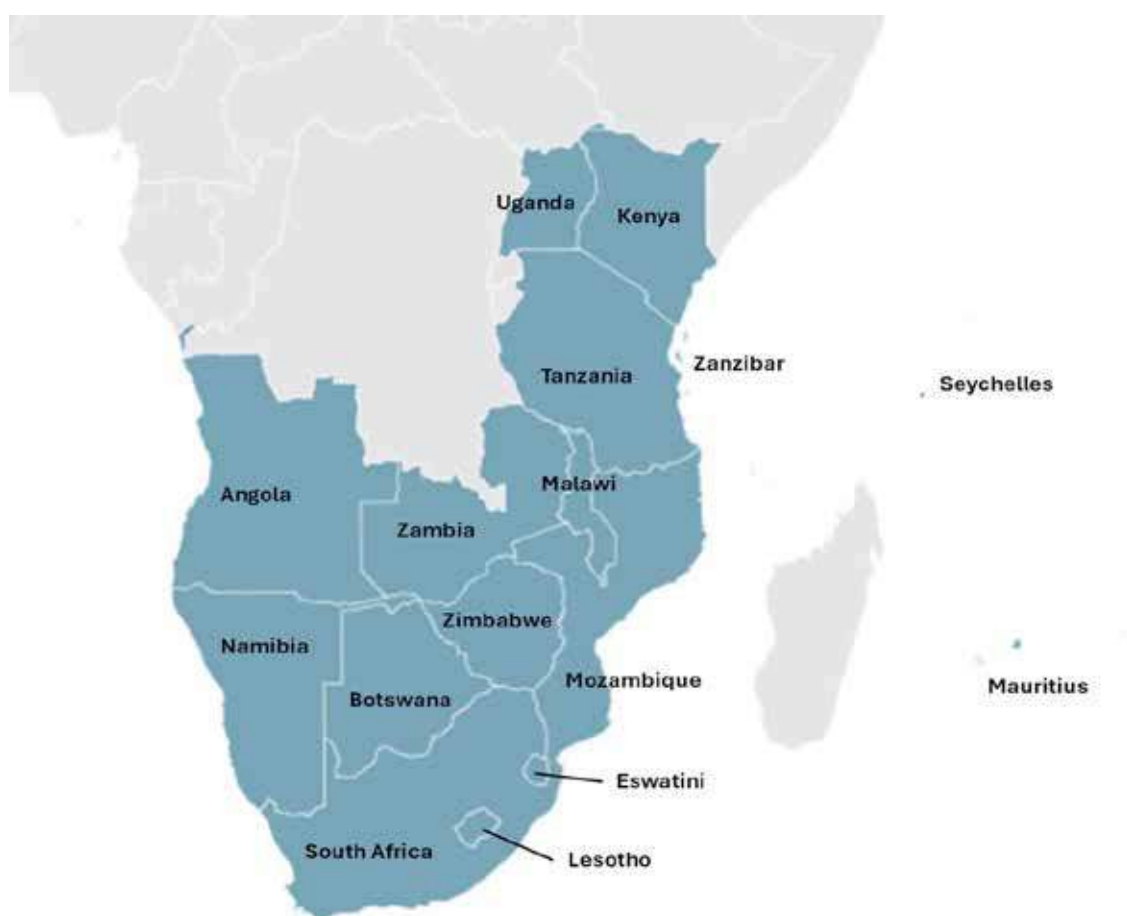


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Executive Summary

The fifth cycle of the Southern and Eastern Consortium for Monitoring Educational Quality (SEACMEQ V) serves a critical role in providing data and insights for assessing and improving education systems across member countries. The SEACMEQ V study, conducted in South Africa in 2021, aimed to evaluate the performance of Grade 6 learners and their teachers in reading, mathematics, HIV/AIDS, and health knowledge. In addition, the study examined contextual factors influencing education, such as school resources, learner environments, and geographical location. This report highlights the key findings from the study and discusses their implications for education policy, planning, and implementation in South Africa. Importantly, the SEACMEQ V study was adversely hampered by the global COVID-19 pandemic which coincided with the time the main data collection was to commence. As a result, disruptions, such as school lockdowns, during research processes affected the study's completion timelines. Moreover, the reality of future pandemics suggests that a greater focus on the expansion of digitalised learning platforms and the adoption of blended learning approaches needs to be considered.

SEACMEQ V Overall Learner Performance

Learners			
SEACMEQ	Reading	Mathematics	HIV/AIDS Knowledge Test
III	495	495	503
IV	538	552	471
V	505	525	453

The findings of the SEACMEQ V study reveal both progress and persistent challenges within the South African education system. Historically, the national average scores in reading and mathematics have shown incremental improvements compared to earlier SEACMEQ cycles. However, trend data from SEACMEQ V to SEACMEQ IV shows a drop in Reading and Mathematics scores. The data also indicates significant disparities in learner performance across provinces, between urban and rural areas, among boys and girls, and among socio-economic groups. Nationally, there has been a decline in the percentage of non-readers, from 27.2% in SEACMEQ III to 13.8% in SEACMEQ V, indicating progress in addressing basic literacy. However, a substantial proportion of learners remain classified as “non-readers” or “non-numerate,” pointing to ongoing difficulties in achieving foundational literacy and numeracy goals. These challenges highlight the urgent need for targeted interventions to support learners at risk of falling behind. Teacher performance in reading and mathematics assessments demonstrates important gaps in subject knowledge. The study reveals considerable variations in teacher competency across provinces, reflecting disparities in teacher training and professional development opportunities. Addressing these gaps is critical for improving the quality of education delivery and ensuring equitable learning outcomes for all learners. The report underscores the unequal distribution of essential resources, including textbooks, libraries, and classroom materials. Learners in rural areas and under-resourced schools face greater challenges in accessing conducive learning environments. These disparities create systemic barriers to quality education and exacerbate existing inequalities. Ensuring equitable access to resources is an essential step toward addressing these inequities.

Socio-economic disparities are another significant factor influencing learner outcomes. Learners from low-income families consistently demonstrate lower performance, reflecting the interplay between poverty and educational attainment. Language barriers further compound these challenges, as many learners do not speak the language of learning and teaching (LoLT) at home, drawing attention to important initiatives focusing on indigenous language development and curriculum decolonisation efforts. This misalignment between home and school environments creates additional obstacles to effective learning. The study also sheds light on the health and well-being of learners. Measures of HIV/AIDS knowledge and health awareness included in the survey reveal varying levels of awareness among learners. This finding underscores the importance of incorporating comprehensive life skills education into the curriculum to address health-related knowledge gaps and promote learner well-being.

These findings have several important implications for education policy and practice in South Africa. Strengthening curriculum implementation and integrating formative assessment practices can help address learning gaps and support continuous improvement. Teacher development must be prioritised to enhance pedagogical content knowledge, particularly in reading and mathematics. Tailored professional development programs should address the specific needs of underperforming regions and disadvantaged schools. In addition, equitable resource allocation is vital to reduce disparities in access to learning materials and infrastructure. Investments in early childhood education, which has been receiving much-needed attention in recent years, are also necessary to address learning gaps at the foundational level and improve school readiness.

To address these challenges, targeted interventions are required to support learners who have been identified as “non-readers” or “non-numerate.” These interventions should prioritise underperforming provinces and disadvantaged schools where learners face the greatest barriers to success, particularly in under-resourced and rural communities. Teachers must be provided with professional development opportunities to improve their subject knowledge and teaching strategies. Incentives can also be offered to encourage teachers to work in rural and under-resourced areas, helping to mitigate disparities in educational quality.

Resource provision must be a central focus of education policy. Consistent access to textbooks, libraries, and classroom materials should be ensured across all provinces. Learners’ access to libraries and textbooks continues to pose challenges as underlined in the study. The integration of technology and digital resources can further enhance teaching and learning, particularly in under-resourced settings, and taking cognisance of increasing digitisation in the sector (however, research has also drawn attention to the ‘digital divide’ and its implications for countries with deep socio-economic inequalities). Monitoring and evaluation systems must be strengthened to track progress in literacy, numeracy, and resource equity. SEACMEQ data should be used to inform regular reviews of policies and interventions, ensuring that they remain evidence-based and responsive to emerging challenges.

Community engagement is another critical component of improving education outcomes. Existing partnerships between schools, parents, communities, and other stakeholders, such as the private sector and teacher unions, should continue to be supported, particularly in addressing linguistic and socio-economic barriers in schools. By fostering collaborative efforts, stakeholders can create a more inclusive and supportive learning environment for all children.

The SEACMEQ V findings underscore the critical areas requiring attention to improve the quality and equity of education in South Africa. It forms a critical benchmark for reviewing and launching a programme of action linked to the priorities of the seventh administration with a particular focus of improving literacy and numeracy outcomes. Policymakers, education ministry officials, school leaders, and teachers must work collaboratively to implement evidence-based strategies that address disparities and enhance foundational skills. By prioritising these actions, South Africa can make

significant strides toward achieving its national development goals and ensuring that every learner has the opportunity to succeed. In so doing, it will be important to take cognisance of contemporary local and global challenges, such as the Fourth Industrial Revolution, pandemics, the continuing scourge of femicide and xenophobia, as well as education decolonisation efforts in South Africa and globally that seek to make education more inclusive and relevant for learners, teachers and the sector as a whole.

Chapter 1: The setting of the study

1.1. Introduction

The main goal of the Southern and Eastern Africa Consortium for Monitoring Educational Quality (SEACMEQ) is to provide educational planners with the technical skills needed to assess and monitor the overall state of schools and the quality of basic education in their systems. SEACMEQ also produces data that decision-makers can use to guide the planning and executing of improvements in their education systems. This report offers several policy recommendations based on the key findings of the SEACMEQ V study in South Africa.

South Africa has been involved in the SEACMEQ family since the SEACMEQ II project (2000) and has participated in subsequent studies, including SEACMEQ III, IV, and V. The findings from these studies are highly regarded in South Africa for monitoring the state of the education system and shaping policy decisions. In the Sector Plan, SEACMEQ learner scores serve as indicators of the sector's progress. This highlights South Africa's strong commitment to SEACMEQ and the significant value it derives from the studies.

The SEACMEQ V study took place in 2021, covering a representative sample of 298 schools and 6,629 learners from all nine provinces of South Africa. The study tested Grade 6 learners and their teachers in Reading and Mathematics while gathering contextual data through self-administered questionnaires to examine factors affecting teaching and learning in schools. The report addresses key policy concerns identified by SEACMEQ Ministries of Education and provides recommendations for improvements.

1.2. The administration of school education

The South African schooling system is divided into two bands: The General Education and Training (GET) band (Grades R to 9) and the Further Education and Training (FET) band (Grades 10 to 12). GET is subdivided into three phases: The Foundation Phase (Grades R to 3), the Intermediate Phase (Grades 4 to 6), and the Senior Phase (Grades 7 to 9).

Two types of schools provide the General and Further Education and Training Phases: public schools and independent schools (private schools). Independent schools must be registered with the Department of Education and maintain standards comparable to public schools. Finally, the Higher Education Phase covers all post-schooling education in various institutions.

Basic education is delivered, managed, and administered under the auspices of each of the nine Provincial Departments of Education. The DBE is responsible for developing policy, monitoring, and evaluating education. Within the broad policy framework provided by the DBE, each province can initiate and adapt programmes that are meant to enhance the delivery of education. To ensure strategic coordination and maintain the principle of a unitary state, three key bodies oversee education: the national parliament, the Council of Education Ministers (CEM), and the Heads of Education Department Committee (HEDCOM). The national parliament enacts laws governing education provision. The CEM, led by the Minister of Basic Education, includes provincial Members of the Education Council (MECs) who provide political oversight of education in their provinces. HEDCOM, chaired by the DBE Director-General and made up of the provincial Heads of Education, coordinates provincial education

programmes. HEDCOM also forms various subcommittees to focus on essential areas such as curriculum implementation, budgeting, assessments, and public examinations.

1.3. The main policy concerns of the South African Ministry of Education

The SEACMEQ V study was administered during the sixth administration of the South African government which prioritized enhancing education, skills, and health by improving the quality of education and training, addressing critical skills shortages, and expanding access to effective healthcare services. In addition, the priorities included building a capable, ethical, and developmental state, that focuses on strengthening governance, transparency, and accountability to deliver efficient services and foster sustainable development. Internationally, the government aimed to promote a better Africa and the world by advancing foreign policy objectives that support peace, stability, and economic integration across the continent, aligning with broader regional and global goals. These priorities aligned with South Africa's National Development Plan (NDP) 2030 to address the country's immediate challenges while setting the foundation for long-term growth and development.

The SEACMEQ V study provides data that helps the Department of Basic Education in evaluating its progress toward achieving the strategic goals outlined in South Africa's Medium-Term Strategic Framework (MTSF) now called the Medium-Term Development Plan (MTDP). Rigorous assessments of the SEACMEQ V study allow the Department to gauge how well foundational educational objectives are being met, such as improving literacy and numeracy rates

During the SEACMEQ V study, the key policy priorities of the Department of Basic Education (DBE) focused on building an equitable, inclusive, and high-quality education system that addresses challenges from early childhood education through higher grades. Key policies aimed to enhance literacy and numeracy, especially in under-resourced and low-income communities, with initiatives targeting reading comprehension and critical thinking. Addressing disparities in educational resources, particularly in rural areas, is central to these policies, as they strive to make quality education more accessible and inclusive. The DBE also prioritised curriculum relevance and adaptability, using curriculum differentiation to support diverse learning needs, especially in foundational phases, and emphasized integrating skills like critical thinking, language proficiency, Technology, Engineering, and Mathematics (STEM) across all grade levels.

Teacher training and development are critical to the DBE's policy agenda, with a focus on equipping educators to manage diverse classrooms, employ inclusive practices, and integrate ICT into teaching. Ensuring school safety and promoting a positive learning environment are also top priorities. Policies address issues of discipline and school violence, aiming to establish safe, supportive schools that incorporate positive behavioural interventions, helping to foster a secure and effective learning environment for all learners.

1.4. Curriculum implementation developments

The National Curriculum Statement (NCS) is South Africa's official educational framework that outlines the curriculum standards, learning outcomes, and assessment policies for all subjects and grades from Grade R to Grade 12. The NCS aims to ensure that learners develop the essential knowledge, skills, and

values needed for active and responsible citizenship, higher education, and the workplace. It is grounded in principles of social justice, human rights, and inclusivity, reflecting South Africa's democratic values. The following three documents constitute the NCS:

- Curriculum and Assessment Policy Statements (CAPS). CAPS is a single, comprehensive, and concise national policy document set out by the Department of Education that states what should be included in the curricula of schools for each grade in South Africa as well as how it is to be assessed.
- The National policy pertaining to the programme and promotion requirements (NPPPPR) Grades R – 12. This policy talks about how subjects are grouped in the NCS Grade R-12, general requirements including the duration, approved subjects for each phase, promotion requirements, assessment, time allocation, and certification requirements for the NSC qualification.
- The National Protocol for Assessment (NPA). This policy alludes to the importance of assessment and the types of assessments that are followed in the NCS curriculum. It further gives guidance on the requirements for the end-of-the-year examination and how to record and report learner performance

The DBE has implemented several initiatives to enhance the curriculum. Significant initiatives include the pilot studies of the three-stream model and the General Education Certificate (GEC), which aim to help learners make informed choices when selecting a pathway in the FET phase (Grades 10-12). The GEC focuses on five 21st-century skills, namely, communication, creativity, collaboration, critical thinking, and metacognition. These skills hold importance beyond just academic achievement. They play a crucial role in all spheres of life including education, employment, and entrepreneurship. Another important step taken by the department is the integration of Assessment for Learning (AfL) into school-based assessments. AfL is fostering a responsive, learner-centered environment that emphasises continuous growth, self-awareness, and skill-building. By prioritising learning over grading, AfL enables both learners and educators to focus on ongoing improvement and the development of lifelong learning skills. Moreover, it can provide important information that impacts curriculum planning, decision-making and policy.

1.5. Teacher development and support

Teacher education in South Africa is a national competence that is funded and regulated through the Department of Higher Education and Training (DHET). There are currently only two (2) pathways to becoming a fully qualified teacher:

- a) Complete a Bachelor of Education degree (NQF exit level 7; 480 credits; 4-year full-time); or
- b) Complete a general undergraduate degree (3 or 4-year full-time) or approved diploma (3-year full-time), and thereafter complete a Post-Graduate Certificate in Education (NQF exit level 7; 120 credits; 1-year full-time).

The DBE is responsible for developing an understanding of teacher demand and supply and ensuring proper planning thereof, recruiting appropriate candidates into the teaching profession, ensuring proper utilisation and placement of teachers, and offering induction programmes for newly appointed teachers. South Africa has followed a multi-pronged strategy to improve the quality of teaching and of the teachers

who serve at the basic education level. Part of the strategy includes efforts to promote teaching as a career of choice among young and competent people. The DBE's flagship in this regard has been the Funza Lushaka Teacher Education Bursary Scheme which targets learners who aspire to follow teaching as a profession, with teaching language and mathematics as priority subjects, and awards them full bursaries to complete initial professional training. Upon graduation, the bursars are allocated to schools that have shortages of the two subjects and must teach for a period that is at least equal to the duration of the training for which they received the bursaries.

Since 2010 the DBE has made observable strides in making continuing professional teacher development responsive to what data from both national and international assessments reveals about the levels and quality of learner competencies in the system. In collaboration with competent Non-governmental Organizations (NGOs) that specialise in education, the DBE undertakes comprehensive diagnostic analyses of what learners were able to do and know in each completed national and international study and then develops interventions to help teachers address the identified gaps in learning.

Despite conscious measures that have been taken to integrate schools, redress past inequities, and address current inequalities, the South African education system continues to experience challenges related to diversity and discrepant modes of education delivery. One area in which these phenomena manifest is the existence of a significant number of schools with multi-grade teaching. Many of these are small schools in rural and farming communities. This group of schools demands different approaches to teacher training and support. The DBE has embarked on various initiatives to empower teachers in multi-grade teaching settings to deliver the curriculum effectively and efficiently. Alongside the training of teachers, the Department trains district officials on how to support multiple schools to improve learner performance. A total of 1036 teachers participated in the SEACMEQ V study, of which 403 were males and 633 were females.

1.6. Health promotion and social welfare of learners

The CAPS document (DBE, 2011) addresses learner health and social welfare through the Life Skills curriculum in the Foundation and Intermediate Phases (Grades 1-6). One of the key objectives of teaching Life Skills, as outlined in the CAPS, is to help learners make informed and responsible choices regarding their health and environment (DBE, 2011:10). These efforts aim to foster well-being, resilience, and social responsibility among learners from an early age.

1.7. SEACMEQ V alignment to the seventh administration priorities

The SEACMEQ V study aligns closely with the current educational goals of South Africa's seventh administration by focusing on high-impact priorities which are foundational skills development in literacy and numeracy, early childhood development, safe learning environments, educational system strengthening, teacher training, and access to learning resources. A central priority is the improvement of literacy and numeracy as an essential area that forms the basis of quality education. SEACMEQ V assessed both grade six learners' and teachers' competencies, particularly in reading and mathematics. By focusing on these core areas, the study not only addresses learners' needs but also highlights where teachers require further support, thus creating a pathway for effective teaching and learning improvements.

The SEACMEQ V study collected comprehensive information on the availability and quality of learning and teaching materials in schools, a priority area for ensuring that all teachers have a standardised set of resources that supports effective teaching. By addressing these various elements, the SEACMEQ V study contributes to a well-rounded picture of current conditions in South Africa's education system. The study further evaluated external influences on education, such as the role of learners' home environments in shaping learning outcomes and the overall safety of school environments. School safety, an essential aspect of the seventh administration's priorities, directly impacts learners' readiness to learn and overall well-being. The SEACMEQ V study collects data on safety conditions, helping identify issues related to crime and other disruptions in schools. The examination of home factors that influence education such as parental involvement and socioeconomic conditions provides a broader understanding of the learning context. All these insights equip policymakers with data-driven evidence to make informed decisions, ultimately enabling strategic improvements that target both in-school and out-of-school factors influencing the learning outcomes.

CHAPTER 2: THE CONDUCT OF THE STUDY

2.1 Introduction

The purpose of the SEACMEQ project was to gather information on a) the general conditions of schooling, b) the reading and mathematics achievement levels of Grade 6 learners and their teachers, and c) the levels of knowledge that learners and their teachers have on HIV/AIDS, and the other new health topics. Over the years since its first project in 1995, SEACMEQ has developed research instruments and collected useful information using advanced research methods. An important principle in the studies is to ensure that SEACMEQ can generate valid measures of levels and changes in achievement: (a) across countries at single time points, and (b) across time points for individual countries.

To achieve this goal SEACMEQ follows the same methodologies across studies and uses the same instruments which must be kept confidential to remain valid. The methodology and instruments that were used in the SEACMEQ V project in 2021 were, therefore, the same as in SEACMEQ II, III, and IV. For a detailed account of the study design, sampling techniques and the development of the instruments reference should be made to the second chapter of the SEACMEQ II report. In response to growing new issues surrounding learner health and life skills, the SEACMEQ V research project includes items on HIV and AIDS, as well as items on other topics in the Health Knowledge Test (HKT) for Grade 6 pupils and their teachers. The other topics covered include personal hygiene, nutrition, pollution, diseases, sanitation, healthy lifestyle, and substance use and abuse.

The SEACMEQ V project was adversely hampered by the global COVID-19 pandemic which coincided with the time the main data collection was to commence. As a result, disruptions, such as school lockdowns, in research processes affected completion timelines in some countries. All member countries were financially and logistically affected, compelling some countries to withdraw from implementing the study. Therefore, the main focus of the project was on the conditions of schooling and the quality of education in nine education systems: Botswana, Kenya, Malawi, Mauritius, Namibia, Seychelles, South Africa, Tanzania (Zanzibar), and Uganda. Mozambique conducted the study under circumstances that do not permit it to compare their results with other participating countries but can use the results for informing some of their national education policy interventions. Angola, Eswatini, Lesotho, Tanzania (Mainland), Zambia, and Zimbabwe did not implement the study.

The main data collection for the current SEACMEQ study involved a total of around **41, 301** (62, 218) learners, **5, 237** (6, 667) teachers, and **1, 688** (2, 507) School Heads. The figures in brackets are for the SEACMEQ IV study. In this chapter, specific aspects of the methodology followed in the SEACMEQ V project are outlined, including a description of the samples drawn, data collection, data cleaning, and data analysis.

2.2 The Study Population

(a) Desired Target Population

The desired target population definition for the SEACMEQ V Project was the same as for the SEACMEQ II, III, and IV Projects. This consistency was maintained to enable the making of valid cross-national and cross-time estimates of “change” relating to schooling and the quality of education.

The desired target population definition for the SEACMEQ V Project is as follows:

“All learners at Grade 6 level in 2020 (at the first week of the eighth month of the school year) who were attending registered mainstream (primary) schools.”

(b) Excluded Target Population

One of the rules followed by SEACMEQ for ensuring valid data in large-scale studies is that no more than 5 percent of the learners in the desired target population may be excluded from the defined target population. As in SEACMEQ II, III, and IV, special schools that provide education to learners with severe educational needs were excluded from the SEACMEQ V sample. “Small” mainstream schools that had less than 15 learners enrolled in Grade 6 in 2020 were also allocated to the excluded population to reduce data collection costs – without the risk of leading to major distortions in the study population.

(c) Defined Target Population

The “defined target population” was constructed by removing the “excluded target population” from the “desired target population”. In Table 1 the numbers of schools and learners in the desired, defined, and excluded populations are presented.

Table 1. Desired, Defined, and Excluded Populations

	Desired		Defined		Excluded		Pupils % Excluded
	Schools	Pupils	Schools	Pupils	Schools	Pupils	
South Africa	14,821	1,050,092	14,558	1,038,374	263	11,718	1%

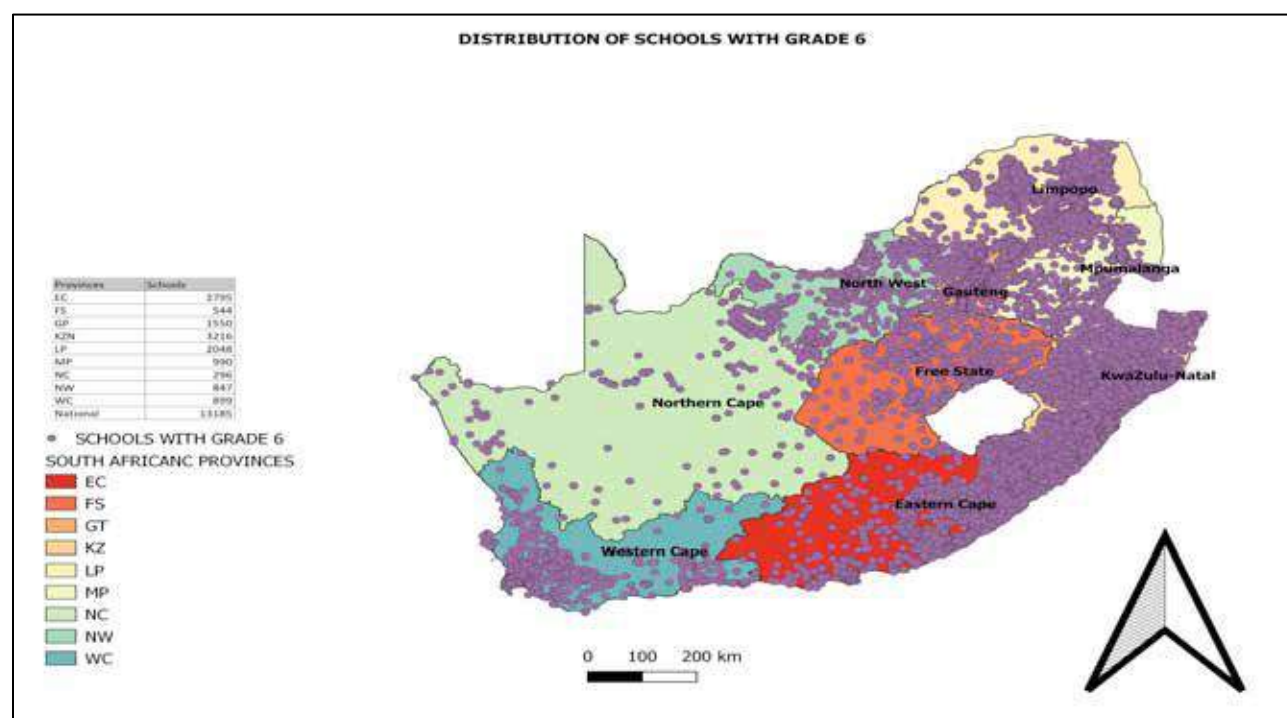


Figure 1: Distribution of the SEACMEQ V “Defined population” in South Africa

2.3 Data Collection

This report's "Data Collection" section includes preparations before the fieldwork, the actual fieldwork, and post-fieldwork activities to prepare the data collection instruments for safe storage.

Preparations for the main data review

Preparations focused on instrument review, communication to schools, printing and distribution of instruments, and training of data collectors.

(a) Instrument review

Following the 2017 SEACMEQ Assembly of Ministers decision to conduct the SEACMEQ V project in 2020, the National Research Teams (NRTs) under the auspices of the SEACMEQ Coordinating Centre (SCC), set out to prepare and update the instruments (tests and questionnaires). Between 2018 and 2019 the SEACMEQ Coordinating Centre hosted at least three working sessions for the NRTs in Johannesburg (South Africa), Port Louis (Mauritius), and Windhoek (Namibia) that were focused on reviewing existing test items and ensuring that, where there had been curriculum changes, the items were still relevant. As a result, several new reading passages-related test items, and mathematics test items were developed to potentially replace some of the older test items. Further, items on new Health Knowledge topics such as Personal Hygiene, Nutrition, Water, Sanitation, and Harmful Substances & Effects were developed to become the possible replacement for some of the old HIV/AIDS items. Following the pre-testing and pilot-testing of the new items, equivalent items were selected to replace some of the older items while ensuring that enough old items were carried on to SEACMEQ V for linking purposes. SEACMEQ V instruments were pre-tested in a few primary schools in Uganda and then pilot-tested in eight member countries. The pilot study was intended to ensure that the language in SEACMEQ V tests was accessible to learners, there were no cultural biases in the items, and learners comprehended how to write their responses. In some countries, the tests were subsequently translated into respective language(s) of instruction. Care was taken to ensure that the English and other languages used for the tests were equivalent to avoid unfair advantage in any of the language(s).

The final statistical and content validity and reliability checks of the instruments were carried out by National Research Teams (NRTs) and specialists at the SEACMEQ Coordinating Centre who then declared the instruments ready to print and take to the field.

From Figure 1 the distribution of schools in the "Defined" population was the densest in the eastern side of the country which includes Eastern Cape (n=2795), KwaZulu-Natal (n=3216), Limpopo(n=2048), and also in the urbanized Gauteng province(n=1550) at the Centre of the country. The population was very sparse on the western side, particularly in the Northern Cape (n=296). The total number of schools in the 'Defined' population' for the SEACMEQ V study was 13 185 schools drawn from the nine provinces of South Africa.

(b) Communication with schools

Officials in the respective Ministries of Education informed the sampled schools of their participation through the regional offices during mid-2020. The National Research Teams were responsible for distributing the data collection schedules, as well as intensifying and monitoring communication to schools and data collectors.

(c) Printing and distribution of data collection instruments

Data collection instruments included a) School Head Booklets, b) School Information Booklets, c) Teacher Booklets, d) Pupil Booklets, e) Pupil Name Forms, and f) School Forms. Each participating country received print-ready copies from the SEACMEQ Coordinating Centre (SCC) and was responsible for printing the correct numbers of copies for their respective schools.

After all instruments were printed, the NRTs conducted a “hand check” of all materials to verify that there were no missing/extra pages, misprints, or omissions. All work related to the printing and packaging of the data collection instruments was undertaken under strict security arrangements so that there was no possibility of “leakage” of information about the content of the learner and teacher Reading, Mathematics, and Health Knowledge tests.

The printed materials were distributed to leaders of research teams who were assigned to collect data in each school. The Team Leaders were responsible for checking the accuracy of the instruments in terms of the correctness of numbers and languages before carrying the instruments to the schools. The first level of checking was done during data collection training sessions. The data collectors were charged with further and final checks a day before the data collection.

(d) Training of data collectors

On the first day of training the NRT presented a “simulated” data collection exercise in which they acted as data collectors and the trainees took the roles of learners, teachers, and School Heads. The second day involved an intensive study of the Manual for Data Collectors. This document sets out, in sequential order, all the actions that were taken by the data collectors from the time of receiving packages of data collection instruments from the Ministry of Education to the time when the data collectors had completed the data collection and were preparing all materials for return. The third day involved a second “simulated” data collection whereby the trainees supervised fully-fledged data collection in several schools that were not involved in the main data collection. The experiences gathered during these exercises were shared and discussed during a meeting so that all data collectors understood the procedures to be completed within schools.

2.4 Main Data Collection

“Main Data Collection” in this report refers to the actual fieldwork. A minimum of three data collectors were assigned to three sampled schools per province to carry out the data collection exercise. Special effort was made to ensure that data collection was conducted according to explicit and fully scripted steps so that the same verbal instructions were used (for learners, teachers, and School Heads) by the data collectors in all sample schools, in all countries, and for each aspect of the data collection. This was a very important feature of the study because the validity of cross-national comparisons arising from the data analyses depended, in large part, on achieving carefully structured and standardized data collection environments.

The first two countries (Kenya and South Africa) collected data during August-September 2021. Due to significant variations in COVID-19 disruptions, huge gaps existed among participating countries in implementing data collection such that the last country carried out data collection in March 2023.

Two days of data collection were required for each sampled school. On the first day, the data collectors sampled the recommended 25 learners from all Grade 6 classes in each sampled school using a provided list of random numbers. However, the final number of Grade 6 learners participating in the study per school may be less or greater than 25 depending on the total number of sixth graders in that school. The sampled learners were then given the Reading test, Health Knowledge test, and Pupil Questionnaire Part D on day one. Pupil Questionnaire Part D required learners to get confirmation of the accuracy of their responses from their parents/guardians for validation purposes, therefore it was taken home by the learners and returned to school the following day. On the second day, the learners wrote the mathematics test and copied their responses from the Pupil Questionnaire Part D to Part D of the main Pupil Booklet.

In addition to completing a questionnaire, one teacher who taught the majority of the sampled learners for each Reading, Mathematics, and Life skills\ Health was required to write the relevant tests. However, some schools decided to allow more grade 6 teachers to write the test of the subject they taught. School Heads or delegated members of the senior management team completed the School Head Booklets, School Information Booklet, and School Form. The data collectors populated the Pupil Name Forms using the class registers and other necessary official records from the schools.

The data collectors were provided with a 40-point checklist in order to ensure that they completed all important tasks that were required before, during, and after they visited schools. Each task was cross-referenced to specific pages of instructions in the data collectors' manual. The data collectors also checked all completed questionnaires (Pupil, Teacher, and School Head) and, if necessary, obtained any missing or incomplete responses on the second day before they left the school. The materials were then handed over to the Regional Coordinator for safekeeping, "hand editing" and dispatching to the National Research Coordinator (NRC) at the Ministry of Education as soon as all data collection was completed.

2.5 Sampling and Sample Characteristics

A two-stage sampling design was employed. In the first stage, schools in the defined strata (regions/provinces) were sampled on a "Probability-Proportional-to-Size" (PPS) basis from sampling frames that individual countries submitted to the SEACMEQ Coordinating Centre. In the second stage of sampling, learners were sampled from all Grade 6 classes in each of the sampled schools using Simple Random Sampling. Computer-generated random numbers were used to facilitate the sampling of learners. Twenty-five (25) learners (minimum cluster size) were sampled where the total number of all enrolled Grade 6 learners at the time of data collection was greater than 25. Where the number of Grade 6 learners in the school was 25 or less, all the Grade 6 learners were included in the sample. In a few cases, a considered administrative decision was taken to include all grade sixers in schools where their total number is slightly greater than twenty-five. Further, Seychelles involved all primary schools and all Grade 6 learners in the study because of very low numbers in the country.

The numbers of schools and learners in the planned and achieved sample are presented in Table 2.1.

Table 2.1. Planned and Achieved Samples for SEACMEQ V

	Schools		Learners	
	Planned	Achieved	Planned	Achieved
South Africa	325	298	8,125	6629

2.6 Response rates, design effects, effective sample sizes

The size and the quality of the sample are critical to the accuracy of the research. The response rate, the design effect, and the effective sample size are some of the characteristics that SEACMEQ monitors in all the projects. The response rates, design effects, and effective sample sizes for the SEACMEQ V project are presented in Table 2.1.

Figures in the first two columns under the heading “Response Rate (%)” in Table 3 are the response rates for schools and learners, respectively. The third, fourth, and fifth columns under the heading “Design Effects” are numbers (ratios) that indicate the amount of “sampling error” associated with the two-stage sample for each of the Reading, Mathematics, and Health Knowledge (HKT) test estimates. Columns six, seven, and eight under the heading “Effective Sample Sizes” are numbers of sample units (learners) in a simple random sample that would give the same level of accuracy as the two-stage sample that was used in the study for each of Reading, Mathematics, and HKT. The response rate was above 90% and did not affect the accuracy of the data collected. It should be noted that due to the introduction of new health knowledge items on topics other than HIV/AIDS, the scoring, scaling, and standardization of the HKT were done separately for HIV/AIDS topics and the ‘Other Health Knowledge’ topics.

Table 2.2. Response Rates, Design Effects, Effective Sample Sizes for SEACMEQ V

	Response Rate (%)		Design Effect				Effective Sample Size			
	Schools	Pupils	Reading	Maths	HIV/ AIDS	Other Health Topics	Reading	Maths	HIV/ AIDS	Other Health Topics
South Africa	298(93.8)	6629(90.1)	20.46	18.01	26.70	26.75	308	346	236	236

DISTRIBUTION OF SEACMEQ V SCHOOLS IN SOUTH AFRICA

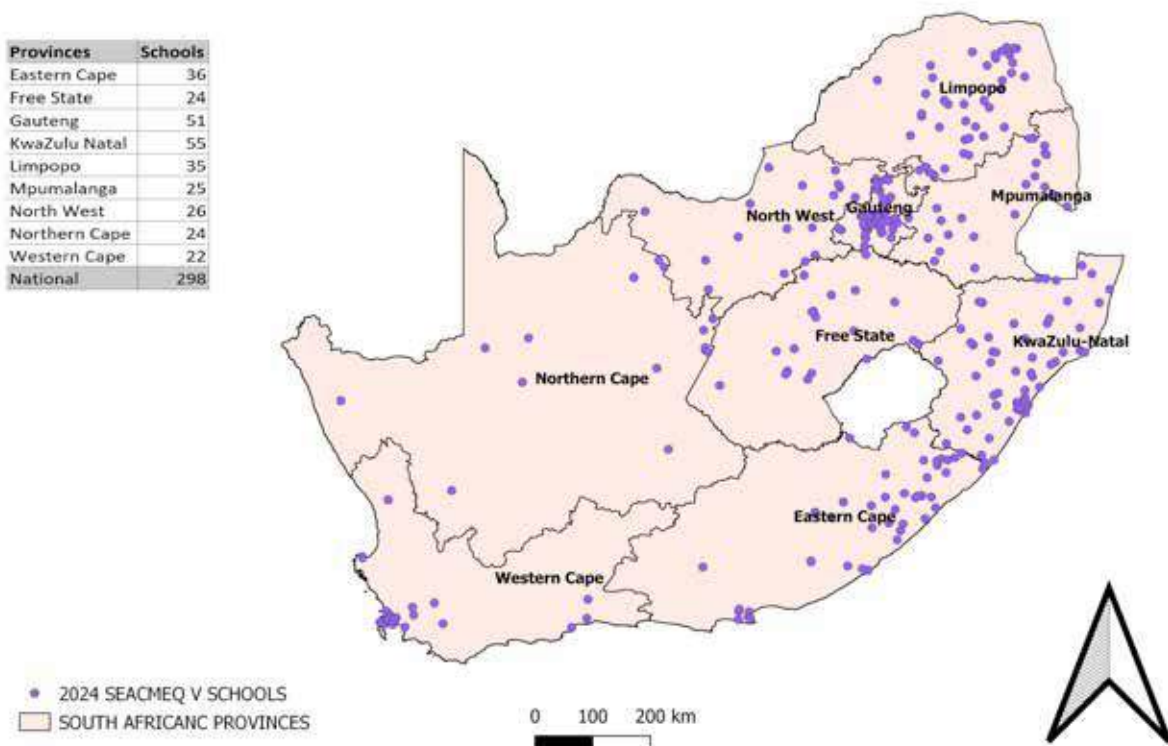


Figure 2: Distribution of the SEACMEQ V “Achieved” sample for South Africa

The realized SEACMEQ V sample for South Africa comprised 298 schools, as noted. The distribution of the “Achieved” sample of schools matches the distribution of the “Defined” population with the highest numbers of sampled Schools in KwaZulu-Natal, Eastern Cape, and Gauteng and the lowest in Northern Cape.

The response rate in surveys refers to the percentage of the total planned sample units who participated in the study. The SEACMEQ rule is that the overall response rate for both schools and learners should not be less than 90%. The South African study met the SEACMEQ requirement with school and pupils participating above 90 %.

A design effect is a number (ratio) that indicates the amount of “sampling error” that is introduced by the use of a clustered (two-stage) sampling method in relation to the “sampling error” that would result if a simple random sample of the same size had been used. Alternatively, the “design effect” is the ratio of the variance (of the sample mean) for a multi-stage sample to the variance for a simple random sample of the same size. Generally, the inaccuracy associated with a multi-stage sample is many times greater than the inaccuracy associated with a simple random sample of the same size.

The effective sample size is calculated from the design effect. The size of a simple random sample would be required to give the same level of accuracy as the given multi-stage sample. Generally, the “Effective Sample Size” will be smaller than the given actual multi-stage sample.

The sampling designs used in the SEACMEQ V Project were selected to meet the standards set by the SCC which are like standards set by other international assessment associations. These standards require that sample estimates of important learner population parameters in multi-stage designs should have sampling accuracy that is at least equivalent to a simple random sample of 400 learners (thereby guaranteeing 95 percent confidence limits for sample means of plus or minus one-tenth of a learner standard deviation unit).

2.7 Data entry, Data checking, and Data cleaning

In this section, the processes that were followed at the national level to check, enter, and clean the data are described.

Data preparation started soon after data collection was completed. The National Research Coordinators organised the safe return of all materials to the Ministry of Education where data collection instruments could be checked, data captured into computers, and data “cleaned” to remove errors before data analyses. Data-checking involved “hand editing” of data collection instruments by a team of trained staff. They were required to check that: (i) all questionnaires, tests, and forms had arrived back from the sampled schools, (ii) the identification numbers on all instruments were complete and accurate, and (iii) certain logical linkages between questions made sense (for example, the two questions to School Heads concerning “Do you have a school library?” and “How many books do you have in your school library?”)

The following step involved inputting data into computers with the Data Management Expert (DME) software. In South Africa, 60 temporary data capturers were hired for this task, completing the data entry within four months.

The data was then cleaned at the country level by the NRTs. A “cyclical” process was followed whereby data files were cleaned by the NRT and then emailed to the SEACMEQ Coordinating Centre for checking and then emailed back to the NRC for further cleaning.

To clean the data using the Data Management Expert (DME) software, the NRTs followed specific directions to (i) identify major errors in the sequence of identification numbers, (ii) cross-check identification numbers across files (for example, to ensure that all learners were linked with their Reading and Mathematics teachers), (iii) ensure that all schools listed on the original sampling frame also had valid data collection instruments and vice-versa, (iv) check for “wild codes” that occurred when some variables had values that fell outside pre-specified reasonable limits, (v) validate that variables used as linkage devices in later file merges were available and accurate, and (vi) make sure that the data entries in the ‘Main’ datasets were the same as those in the ‘Double Punching’ datasets.

Further and more intensive data cleaning was done using the SPSS software after the six datasets were exported from DME to SPSS. During this data cleaning process, all six datasets were checked and cleaned for ‘Within Instrument’ and ‘Between Instrument’ inconsistencies.

2.8 Merging and Weighting

After data cleaning was completed, the NRTs submitted the six datasets to the SEACMEQ Coordinating Centre for further processing. At the Coordinating Centre, a further merging process was undertaken that required the construction of a single data file in which learners were the units of analysis and the rest of the data from the other respondents were linked to the learner data. That is, each record of the final data file for the country consisted of the following four components: (a) the questionnaire and test data for an individual learner, (b) the questionnaire and test data for his/her Mathematics, Reading, and Health teacher, (c) the questionnaire data for his/her School Head, and (d) school and learner forms.

To illustrate this, it was possible to examine questions of the following kind from the final merged dataset: “What are the average Reading and Mathematics test scores (based on information taken from the learner tests) for groups of learners who attend urban or rural schools (based on information taken from the School Head questionnaire), and who are taught by male or female teachers (based on information taken from the teacher questionnaire)?”

The calculation of sampling weights could only be conducted after all files had been cleaned and merged. Sampling weights were used to adjust for variations in the stratum and cluster sizes, missing data, and variations in probabilities of selection that arose from the application of stratified multi-stage sample designs. There were also certain country-specific aspects of the sampling procedures, and these had to be reflected in the calculation of sampling weights.

To obtain the sampling weights for the SEACMEQ V Project, the ‘raising factors’ were calculated first. These ‘raising factors’ were equal to the number of learners in the defined target population that were “represented by a single learner” in the sample. The sampling weight (pweight2) was obtained by multiplying the raising factors by a constant so that the sum of the sampling weights was equal to the achieved sample size. A detailed account of weighting procedures can be found in SEACMEQ II.

2.9 Analysing the data

The data analyses for the SEACMEQ V Project were very clearly defined because they were focused specifically on generating results. Two working meetings were arranged to train the NRTs on data analysis and report writing. The working meetings aimed to empower the NRTs with the skills to carry out in-depth analyses of their data and produce policy briefs, infographics, and national reports. For uniformity, standard results tables were generated by the SEACMEQ Coordinating Centre and dispatched to respective countries. There were two main tasks in this area. First, SPSS software was used to construct new variables (often referred to as “indices”) or to re-code existing variables. For example, an index of “socio-economic level” was constructed by combining re-coded variables related to learners’ homes, and the number of possessions in learners’ homes. Second, the SEACMEQ Coordinating Centre used SPSS syntaxes to generate standard tables of results with appropriate estimates and corresponding sampling errors. The standard tables were formatted by the SEACMEQ Coordinating Centre and sent to countries for interpretation and national report writing.

2.10 Writing the SEACMEQ V National Reports

The NRT commenced the process of drafting their national reports in early 2024. A working meeting held in Mahe; Seychelles in March 2024 supported the NRT in this work. This working meeting permitted the NRT to work together and exchange ideas concerning the policy implications of the research results.

2.10 Chapter Summary

This Chapter aimed to describe the research procedures that were applied for the execution of SEACMEQ V project. The Chapter was prepared to give an overview of how the study was conducted in participating countries. The sampling design/procedures and the construction of the Reading, Mathematics, and Health Knowledge tests for learners and their teachers were to a large extent modeled on the SEACMEQ II, III, and IV projects.

Following the trend started in the SEACMEQ II project, the fifth SEACMEQ project moved away from traditional approaches of calculating test scores (based on numbers of correct responses to test items) to the use of Modern Item Response Theory to generate descriptions of “levels of increasing learner competence”. This approach to describing learner Reading, Mathematics, and Health Knowledge achievements offered a mechanism for describing the performance of learners in a manner that was more meaningful within the teaching and learning context.

One of the important messages that emerged from this Project was that the speed at which the SEACMEQ cross-national research project proceeds can be adversely influenced by natural calamities such as the COVID-19 pandemic, and the speed with which the slowest country completes all aspects of its data collection and data preparation.

CHAPTER 3: LEARNERS AND THEIR LEARNING ENVIRONMENT

3.1 Introduction

This chapter examines a comprehensive range of learner and school-level factors that contribute to the quality of education in South Africa, based on data from the SEACMEQ V study. Key aspects include demographic details such as the age distribution of learners and their mean ages across successive SEACMEQ cycles. The chapter also explores geographical and logistical considerations, such as the distances learners travel to school and their distribution by proximity. These contextual elements provide insight into barriers learners may face in accessing education, along with trends in pre-school attendance that influence early learning foundations.

In addition, the chapter delves into the resources and conditions that shape learners' educational experiences, both at home and in school. It investigates the distribution of learners' access to essential materials like textbooks and school libraries, alongside the availability of desirable physical and human resources within schools. The impact of supplementary education is analysed through the distribution of learners receiving extra tuition and those paying for it. Furthermore, the role of language is explored, focusing on learners' use of the language of learning and teaching (LOLT) at home. Other critical factors include the frequency of homework corrections by teachers, learners' access to basic resources like adequate lighting at home, and the status of classroom essentials. By synthesising these elements, this chapter provides a holistic view of the educational environment and its influence on learning outcomes in South Africa.

The figure below illustrates how the 90th percentile range was used in analysing the data in this chapter. The lowest 5% and the highest 5% of values were essentially excluded, focusing on the middle 90% of the data. This range assisted in providing a better sense of the spread of values, without being influenced by extreme outliers.

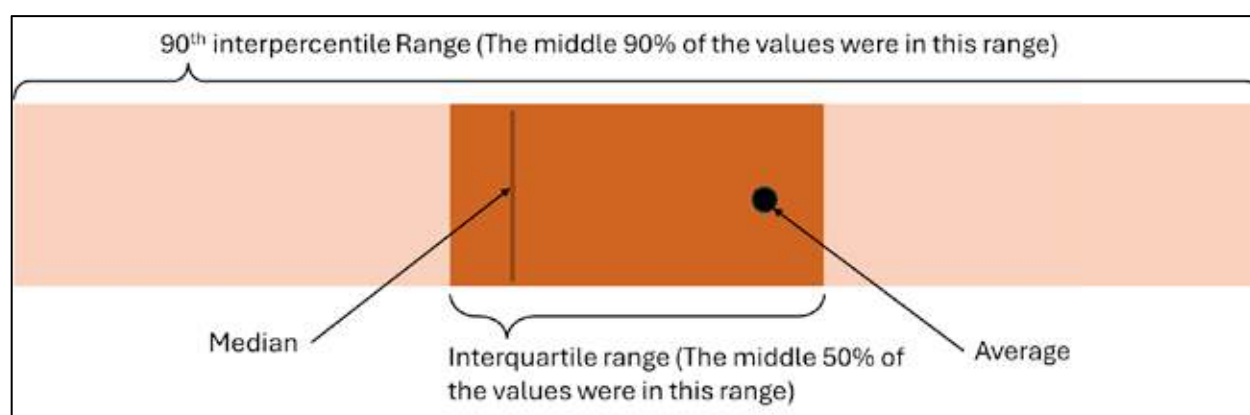


Figure 3: Distribution of data points

3.2 Age distribution of learners

This section presents information on the average ages of learners (in months) across various provinces in South Africa, as recorded in the SEACMEQ V study. The data highlights the average age and gender distribution of learners in SEACMEQ III, IV, and V.

A comprehensive analysis of data related to learner ages and gender distribution from the SEACMEQ IV and SEACMEQ V studies is provided. This chapter examines the mean age of learners by province and highlights the distribution patterns across different provinces in South Africa for both SEACMEQ IV and V. Additionally, it explores gender distribution trends among learners by province for each study. Further comparisons are made between SEACMEQ studies, offering insights into the shifts in learner age averages and gender balance over time. This analysis covers the average learner age, provincial distribution, and gender representation across SEACMEQ III, IV, and V, providing a detailed view of changes and trends in the demographics of learners.

Table 3. Learner mean ages for RSA

Project	RSA	
	Learner age (months)	Female learner
	Mean	%
IV	142.5	49.1
V	148.1	50.7

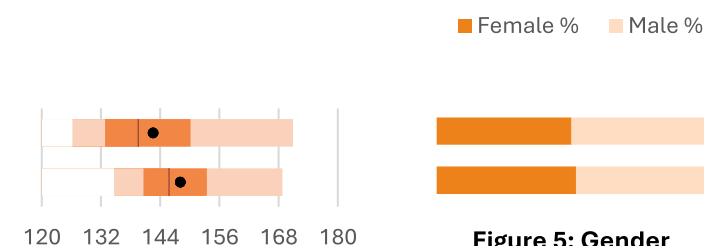


Figure 4: Mean learner age and distribution by SEACMEQ

Figure 5: Gender distribution of learners by SEACMEQ

Table 4. Learner mean ages in months for SEACMEQ IV

Province	SEACMEQ IV	
	Learner age (in months)	Female learner
	Mean	%
Eastern Cape	148.0	46.9
Free State	142.3	52.3
Gauteng	138.5	48.5
Kwazulu-Natal	142.0	50.3
Limpopo	142.2	47.3
Mpumalanga	144.5	47.7
Northern Cape	142.5	48.8
North West	143.6	51.3
Western Cape	140.8	50.9
South Africa	142.5	49.1

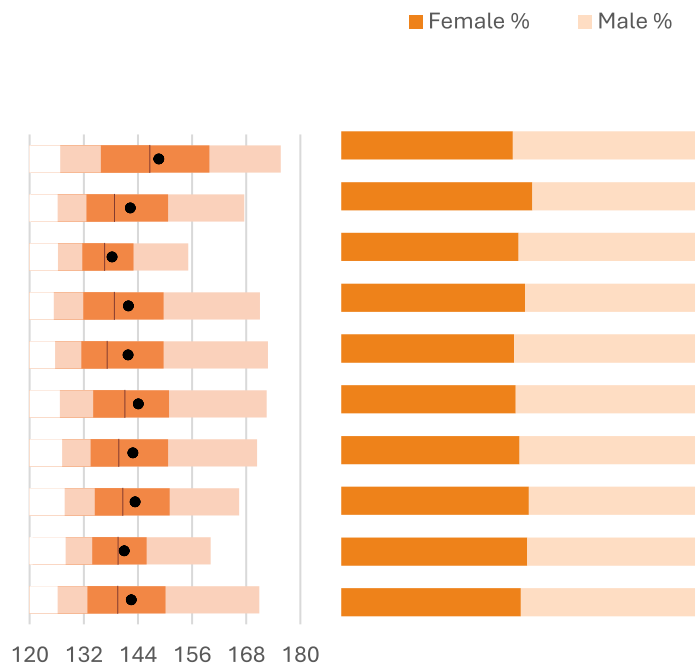


Figure 6: Mean learner age in months and distribution by the province in SEACMEQ IV

Figure 7: Gender distribution of learners by province

Table 5. Learner mean ages for SEACMEQ V

Province	SEACMEQ V	
	Learner age (months)	Female learner
	Mean	%
Eastern Cape	150.9	50.5
Free State	151.4	45.3
Gauteng	146.6	52.7
Kwazulu-Natal	146.4	48.0
Limpopo	147.3	53.0
Mpumalanga	148.6	53.2
Northern Cape	151.4	51.6
North West	147.4	51.2
Western Cape	149.1	49.9
South Africa	148.1	50.7

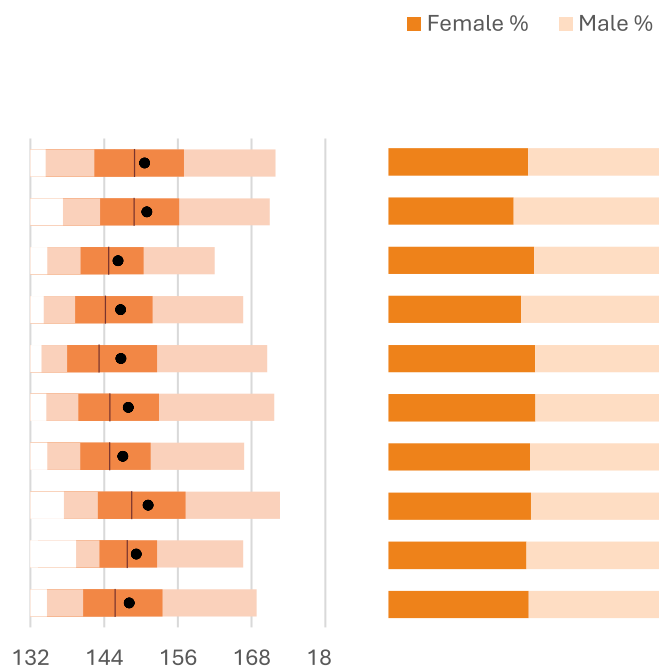


Figure 8: Mean learner age and distribution by province in SEACMEQ V

Figure 9: Gender distribution of learners by province

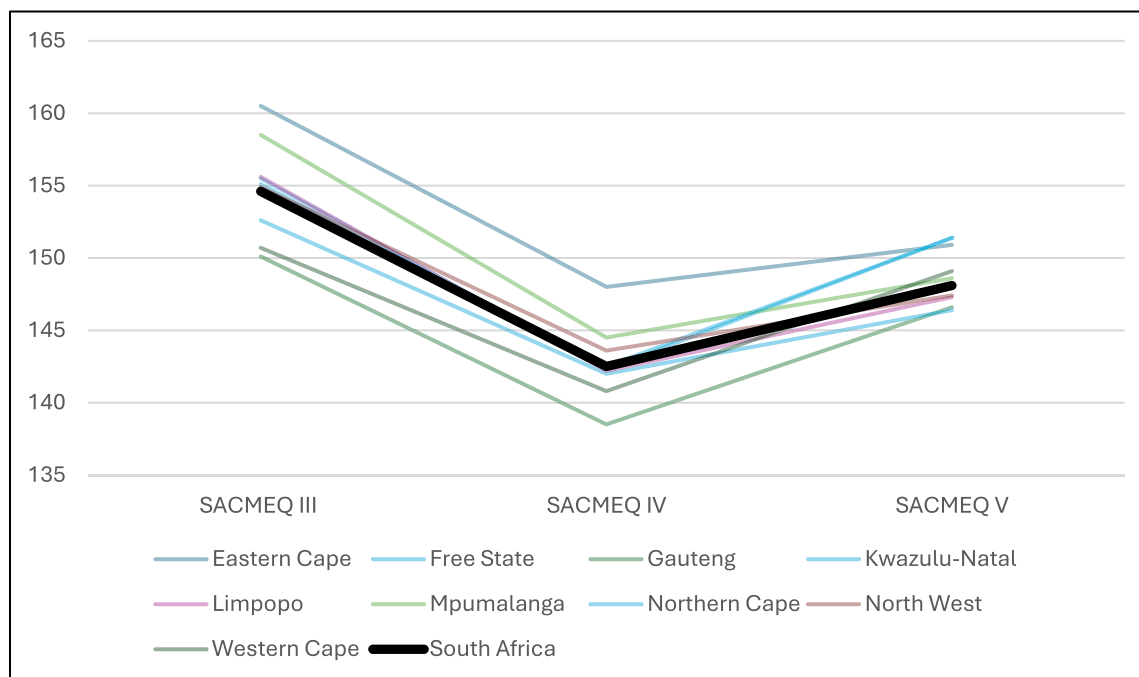


Figure 10: Mean ages for learners in the successive SEACMEQs

The data presented from Tables 3 to 5 and Figures 4 to 10 reveal notable shifts in the age distribution of learners over the analysed period, with implications for both educational planning and classroom dynamics. The increase in the average age of learners from 142.5 to 148.1 months and the median age from 139.5 to 145.8 months indicates a trend towards older learners within the educational system. This could be attributed to delayed school entry, grade repetition, or a combination of socio-economic and systemic factors that affect the timely progression of learners through grades. Such trends might reflect broader challenges in access to early childhood education or inefficiencies within the schooling system, requiring interventions to ensure learners are at age-appropriate levels.

Simultaneously, the contraction in the middle 90% age range, from 45 months (126–171) to 26 months (143–169), and the middle 50% range, from 18 months (132–150) to 13 months (140–153), highlights a narrowing variation in learners' ages. This suggests improved consistency in age-grade alignment among the majority of learners, which could enhance classroom management and the standardisation of pedagogical approaches.

3.3 Learners' location from the school they attend

The section examines the distribution of learners by the distance they travel to school, shedding light on the accessibility of educational institutions across South African provinces.

Table 6. Distribution of Learners by distance away from school

Province	Percentage learners by distance range			
	0 - 2 km	2 - 4 km	4 - 5 km	> 5 km
Eastern Cape	61.9	29.0	4.7	4.4
Free State	60.3	25.4	5.4	8.9
Gauteng	52.0	28.6	4.7	14.7
Kwazulu-Natal	56.0	29.3	4.9	9.8
Limpopo	65.1	25.0	3.8	6.1
Mpumalanga	61.8	28.1	3.2	6.8
Northern Cape	65.4	26.5	2.0	6.1
North West	55.1	29.9	4.2	10.8
Western Cape	63.5	20.9	4.9	10.7
South Africa	59.1	27.5	4.3	9.1

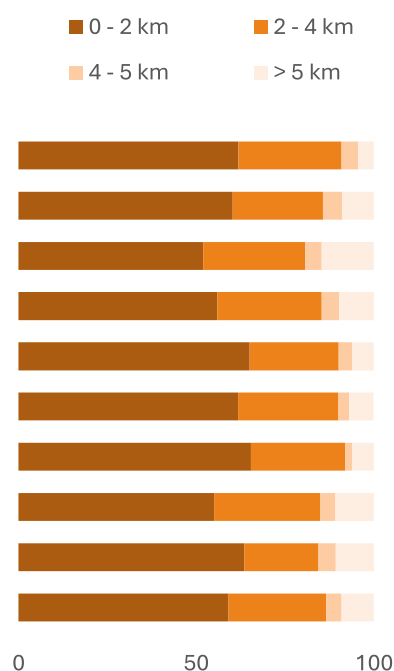


Figure 11: Distribution of Learners by distance away from school by province

Table 6 and Figure 11 above present the distribution of learners by distance from school. The distribution varies significantly across South African provinces, reflecting diverse geographic and infrastructural contexts. Nationally, the majority of learners (59.1%) live within 0–2 km of their school, followed by 27.5% within 2–4 km. Smaller proportions of learners travel 4–5 km (4.3%) or more than 5 km (9.1%). These

figures indicate that most learners reside relatively close to their schools, but a non-negligible minority faces considerable travel distances that could impact their attendance, punctuality, and overall engagement with learning.

At the provincial level, Limpopo (65.1%) and the Northern Cape (65.4%) have the highest percentages of learners living within 0–2 km, suggesting better school proximity in these regions. Conversely, Gauteng shows the highest percentage of learners traveling over 5 km (14.7%), potentially reflecting urban sprawl and school choice dynamics in metropolitan areas. Similarly, the Western Cape and North West provinces show significant proportions of learners traveling over 5 km, at 10.7% and 10.8%, respectively. This contrasts with provinces like the Northern Cape and Mpumalanga, where fewer learners face such distances, indicating varied challenges in school access depending on regional geography and infrastructure. Overall, this finding is unexpected, as significant proportions of learners traveling over 5 km are more likely to be found in rural provinces, such as Limpopo and Mpumalanga.

Table 7. Learner mean reading scores by distance from school

Distance	Learners
	Reading
	Mean
0-2KM	500.1
2-4KM	503.7
4-5KM	533.5
>5KM	554.0
South Africa	507.5

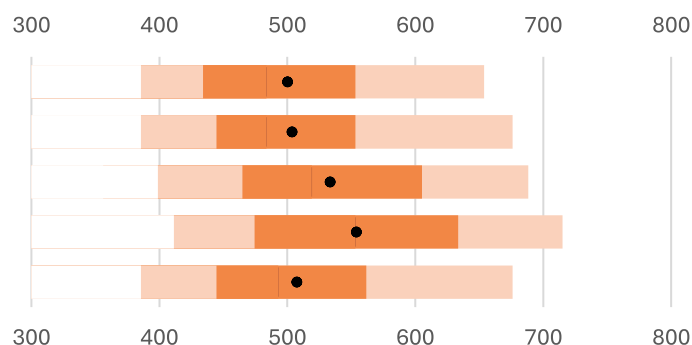


Figure 12: Learner reading score by distance from school

Table 8. Learner Maths mean scores by distance from school

Distance	Learners
	Math
	Mean
0-2KM	519.9
2-4KM	525.9
4-5KM	541.5
>5KM	563.2
South Africa	526.4

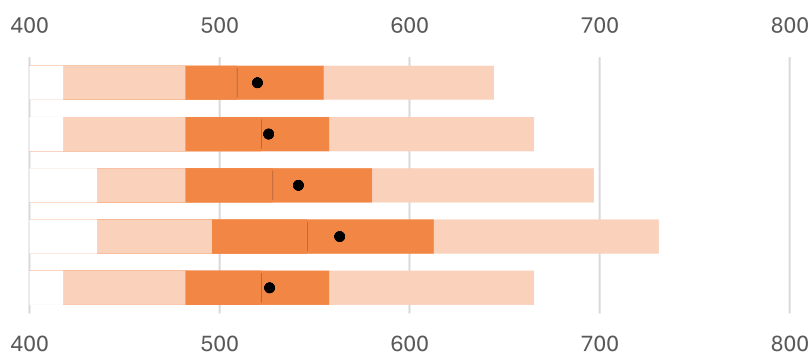


Figure 13: Learner mathematics score by distance from school

Tables 7 and 8 and Figures 12 and 13 above provide the data in learner mean math scores by distance from school. Nationally, the mean score is 526.4. Learners living more than 5 kilometers from school achieve the highest mean score (563.2), significantly outperforming those living closer. This is observed in more affluent provinces, which can be indication of learners travelling from townships and less urban areas to attend well-resourced schools. Similarly, learners residing 4–5 kilometers away score above average (541.5), followed by those 2–4 kilometers away (525.9), whose performance aligns closely with the national mean. In contrast, learners living within 0–2 kilometers of the school have the lowest mean score (519.9).

This pattern may indicate that learners traveling farther distances have unique characteristics, such as greater motivation or access to higher-quality schools. Alternatively, it may reflect disparities in resource distribution or school quality based on location. These findings suggest a need for further investigation

into factors influencing this trend and targeted strategies to support learners closer to school to enhance their math achievement. The impact of COVID-19 pandemic could also have played a role in the results.

3.4 Learners who repeated a grade

This section presents the data on grade repetition and school attendance as critical indicators of educational performance and learner engagement.

Table 9. Distribution of learners by number of times they have repeated

Province	Percentage learners by number of times they have repeated			
	never	once	twice	Three or more
Eastern Cape	58.5	30.3	6.8	4.4
Free State	65.5	25.6	7.1	1.7
Gauteng	76.0	19.5	3.3	1.2
Kwazulu-Natal	73.0	19.4	5.2	2.3
Limpopo	67.8	20.5	9.0	2.7
Mpumalanga	73.9	19.5	5.8	0.8
Northern Cape	67.9	23.3	6.6	2.2
North West	77.8	16.7	4.6	0.9
Western Cape	77.0	18.0	3.8	1.3
South Africa	71.1	21.3	5.6	2.1

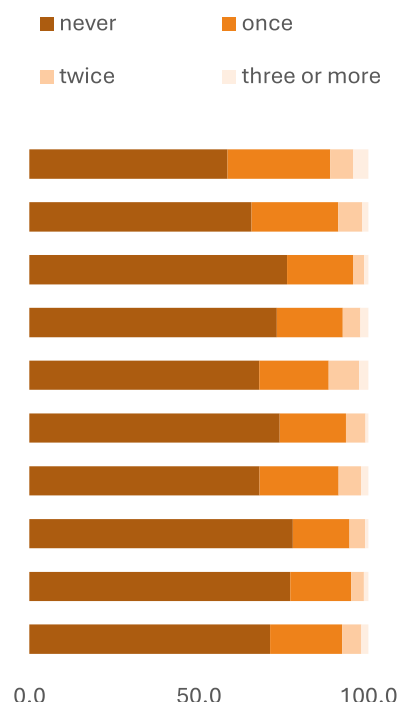


Figure 14: Distribution of learners by number of times they have repeated by province

Tables 9 and Figures 14 above show that nationally, 28.9% of Grade 6 learners have repeated a grade, reflecting challenges in curriculum comprehension and progression. The Eastern Cape has the highest proportion of repeaters at 41.5%, suggesting systemic issues such as insufficient educational resources or socio-economic constraints that impact learning outcomes. In contrast, the North West reports the lowest repetition rate at 22.2%, potentially indicative of more effective teaching strategies, support systems, or localised interventions to enhance learner performance.

Table 10. The mean for number of days absent

Province	SEACMEQ V
	Number of days absent
	Mean
Eastern Cape	1.71
Free State	1.58
Gauteng	1.34
KwaZulu-Natal	1.37
Limpopo	1.05
Mpumalanga	0.69
Northern Cape	2.12
North West	1.14
Western Cape	2.13
South Africa	1.41

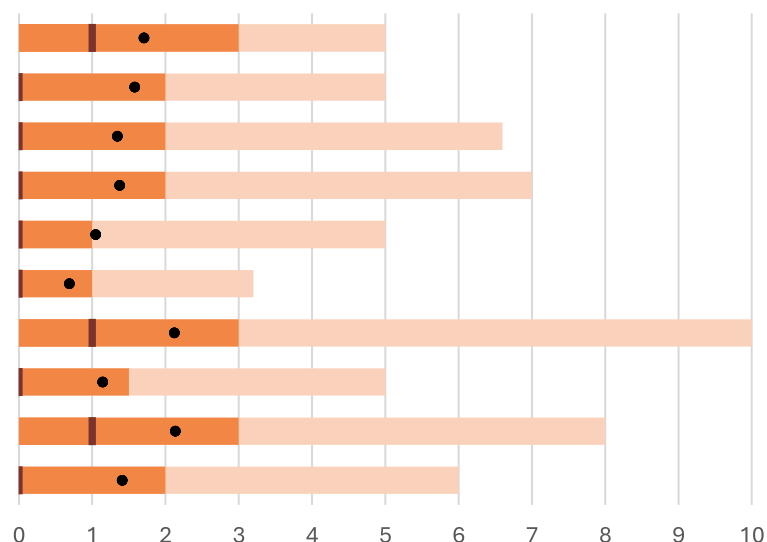


Figure 15: Mean number of days absent by province

Attendance patterns further illustrate disparities across provinces as shown in Table 10 and Figure 15 above. The Western Cape reports the highest average number of days learners are absent from school (2.13 days), potentially pointing to socio-economic or health-related factors that interrupt consistent attendance. Meanwhile, Mpumalanga has the lowest average absenteeism at 0.69 days, which may reflect stronger community or institutional support for regular attendance. Notably, provinces such as Free State, Gauteng, KwaZulu-Natal, Limpopo, Mpumalanga, and North West stand out as regions where 50% or more learners reported zero days of absence, demonstrating a commendable level of learner engagement and stability in attendance.

3.6 Payment for extra tuition

The distribution of learners by the method of payment for extra tuition in the table and figure above reveals significant provincial differences, highlighting varying socio-economic and cultural dynamics across South Africa.

Table 11. Learners that take extra tuition by province

Province	Extra tuition (%)	
	No	Yes
Eastern Cape	0.0	100
Free State	0.0	100
Gauteng	0.0	100
Kwazulu-Natal	0.0	100
Limpopo	0.0	100
Mpumalanga	0.0	100
Northern Cape	0.0	100
North West	0.0	100
Western Cape	0.0	100
South Africa	0.0	100

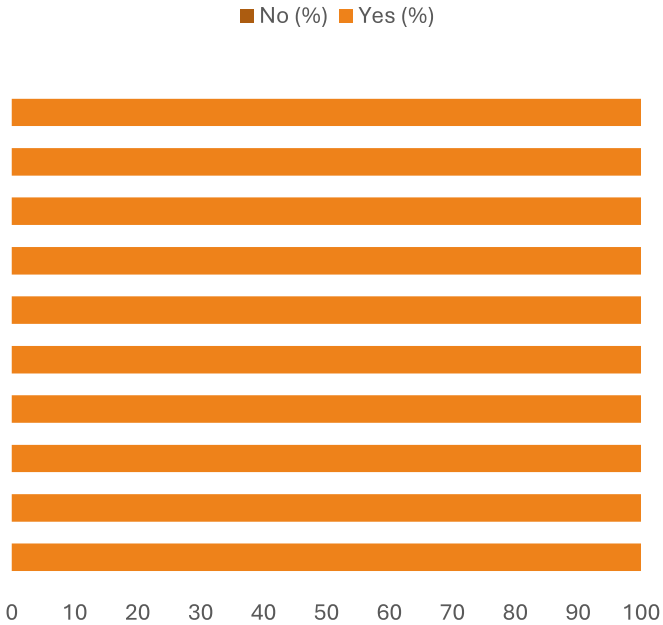


Figure 16: Learners that take extra tuition by province

Table 11 and Figure 16 above indicate that all learners take extra tuition in South Africa.

Table 12. Distribution of learners by payment for extra tuition

Province	Method of extra tuition payment (%)			
	No Payment	Money	Other kind	Money and other kind
Eastern Cape	56.0	29.6	8.7	5.8
Free State	42.5	40.9	6.4	10.2
Gauteng	36.5	37.9	20.4	5.1
Kwazulu-Natal	69.0	21.7	5.0	4.3
Limpopo	30.8	41.5	12.4	15.2
Mpumalanga	65.4	22.4	5.9	6.3
Northern Cape	31.1	42.6	10.4	16.0
North West	39.9	43.7	12.0	4.4
Western Cape	55.2	29.1	7.4	8.4
South Africa	48.1	33.4	10.3	8.2

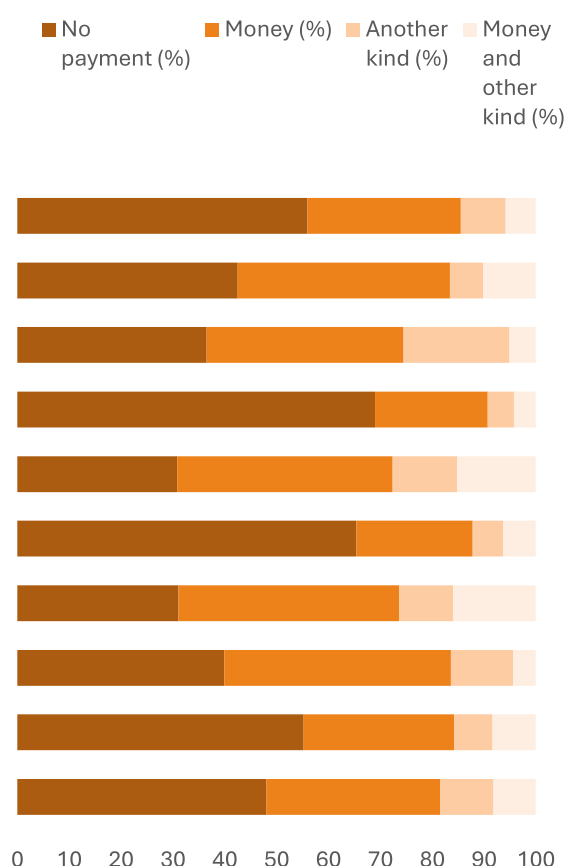


Figure 17: Proportion of learners by payment for extra tuition by province

Table 12 and Figure 17 indicate that nationally, 48.1% of learners receive extra tuition without payment, while 33.4% pay money for this service, 10.3% offer other forms of compensation, and 8.2% combine money with other kinds of payment. This distribution suggests that while many learners can access tuition without financial cost, a considerable proportion rely on monetary or alternative payment methods, reflecting diverse access mechanisms to supplementary education.

Provincially, KwaZulu-Natal (69.0%) and Mpumalanga (65.4%) have the highest proportions of learners receiving extra tuition without payment, indicating relatively widespread availability of free support. Conversely, the Northern Cape (42.6%), North West (43.7%), and Limpopo (41.5%) have the highest percentages of learners paying money for extra tuition, potentially signifying greater reliance on private providers in these regions. Notably, Gauteng exhibits the highest percentage of learners compensating in other kinds (20.4%), reflecting unique socio-economic arrangements. Provinces such as Limpopo (15.2%) and the Northern Cape (16.0%) also stand out for their significant use of mixed payment methods (money and other kinds).

Table 13. Distribution of learners by payment for extra tuition by location

Province	Method of tuition payment (%)			
	No Payment	Money	Other kind	Money and other kind
Rural	45.0	34.7	9.9	10.5
Urban	51.2	32.2	10.8	5.8
South Africa	48.1	33.4	10.3	8.1

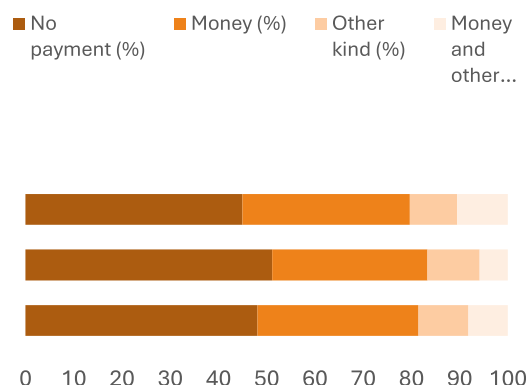


Figure 18: Proportion of learners by payment for extra tuition by school location

The distribution of learners by payment method for extra tuition across rural and urban areas in Table 13 and Figure 18 reveal notable differences that reflect underlying socio-economic and infrastructural disparities. Nationally, 48.1% of learners receive extra tuition without payment, while 33.4% pay money, 10.3% use other kinds of compensation, and 8.1% combine monetary and alternative methods. However, the rural-urban divide offers deeper insights into access and affordability trends.

In rural areas, 45.0% of learners access extra tuition without payment, a slightly lower proportion compared to 51.2% in urban areas. This disparity suggests that urban areas may have more initiatives or resources to provide free tuition, such as non-governmental programs or community-driven efforts. Conversely, the proportion of learners using mixed payment methods (10.5%) is higher in rural areas than in urban areas (5.8%), likely reflecting a reliance on informal or barter-based arrangements in rural settings where financial resources are limited. Rural areas also show a slightly higher percentage of learners paying money (34.7%) compared to urban areas (32.2%), underscoring the financial burden faced by rural families to access supplementary education despite generally lower income levels.

3.7 Frequency of homework correction

The data presented in this section provides insights into the frequency of homework correction by teachers across provinces.

Table 14. Proportion of learners according to how often homework is corrected by teacher by province

Province	How often homework is corrected by the teacher (%)				
	No Home-work	Never	Sometimes	Mostly	Always
Eastern Cape	0.4	3.3	28.6	28.1	39.7
Free State	0.3	2.4	31.3	23.2	42.7
Gauteng	0.9	2.8	33.7	25.2	37.4
Kwazulu-Natal	0.2	0.5	23.2	29.4	46.7
Limpopo	0.1	1.7	15.3	26.2	56.7
Mpumalanga	0.2	0.5	18.7	30.2	50.4
Northern Cape	0.0	2.0	28.3	29.4	40.3
North West	0.2	2.0	25.0	28.3	44.5
Western Cape	0.7	2.1	38.0	26.2	33.1
South Africa	0.4	1.9	26.4	27.3	43.9

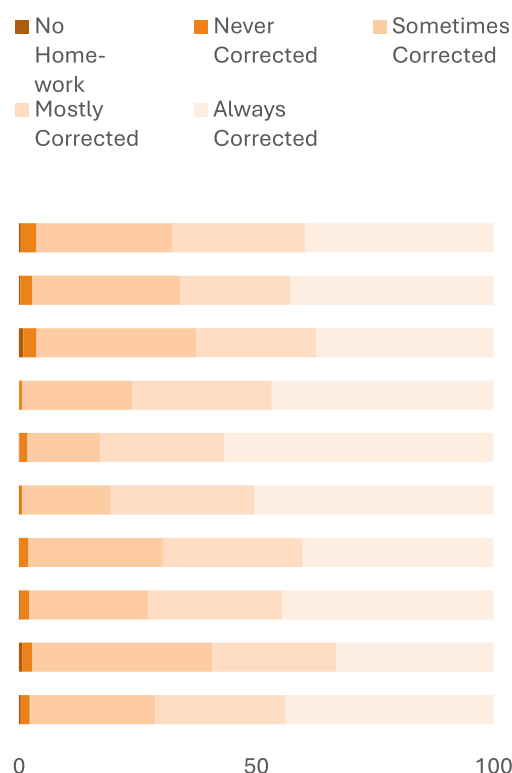


Figure 19: Proportion of learners according to how often homework is corrected by teacher by province

The data in Table 14 and Figure 19 reveal significant provincial variations in the frequency of homework correction by teachers. Nationally, 43.9% of learners report their homework is "always corrected," with Limpopo (56.7%) and Mpumalanga (50.4%) leading in consistent feedback. In contrast, the Western Cape has the lowest rate of "always corrected" (33.1%) and the highest "sometimes corrected" (38.0%), highlighting inconsistency. Gauteng also shows high irregularity, with 33.7% reporting "sometimes corrected" and a below average 37.4% for "always corrected." Provinces like KwaZulu-Natal (46.7%) and North West (44.5%) perform above average in "always corrected," while neglect remains low across provinces, with "never corrected" ranging from 0.5% to 3.3%.

3.8 Learners who speak LOLT at home

The data in this section presents the distribution of learners who speak the language of learning and teaching at home.

Table 15. Distribution of learners according to the frequency of speaking English at home by province

Province	How often learners speak LOLT at home (%)			
	Never	Some-times	Most of the time	All the time
Eastern Cape	10.6	70.2	7.7	11.5
Free State	10.3	70.8	10.3	8.7
Gauteng	8.0	55.1	19.6	17.3
Kwazulu-Natal	15.8	68.3	10.2	5.7
Limpopo	12.1	71.2	11.1	5.6
Mpumalanga	13.6	70.1	11.4	5.0
Northern Cape	5.8	41.0	9.0	44.2
North West	7.6	67.5	14.9	10.1
Western Cape	4.4	38.1	19.2	38.3
South Africa	10.8	63.7	13.0	12.5

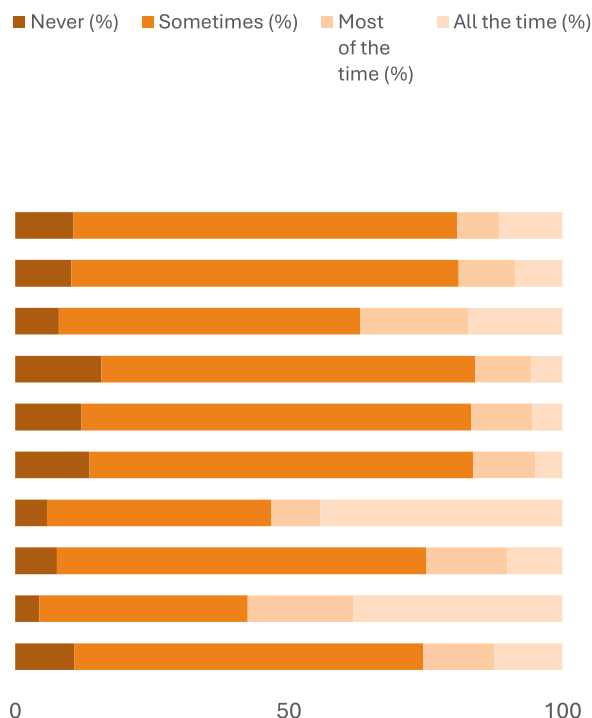


Figure 20: Proportion of learners according to the frequency of speaking English at home by province

The data in Table 15 and Figure 20 highlight significant provincial differences in the frequency with which learners speak the language of learning and teaching (LOLT) at home. The tables and figures above show that nationally, most learners (63.7%) speak LOLT "sometimes," with the highest proportion found in Limpopo (71.2%) and Mpumalanga (70.1%). A substantial number "never" speak LOLT at home (10.8%), particularly in KwaZulu-Natal (15.8%). Consistent use ("all the time") is rare nationally (12.5%) but is highest in the Northern Cape (44.2%) and Western Cape (38.3%), reflecting these provinces' linguistic alignment with LOLT. Gauteng stands out with the highest proportion speaking LOLT "most of the time" (19.6%), while provinces like Limpopo and Mpumalanga have lower rates of frequent use. These patterns suggest disparities in linguistic alignment with LOLT, likely influenced by regional language diversity and socio-cultural factors.

3.9 Learners’ access to learning materials

The data in Table 16 and Figures 21 to 22 on learner access to learning materials across various provinces reveals notable differences in the availability of essential resources for education. Nationally, 87.4% of learners have access to a proper sitting and writing place, with provinces like Mpumalanga (96.6%) and Gauteng (90.0%) showing the highest access rates. Access to basic materials such as exercise books, pens, and rulers is generally high, with Free State (89.4%) and Gauteng (90.7%) reporting the highest access. When it comes to subject-specific resources, such as reading and math textbooks, there is considerable variation. The Western Cape (78.4%) and Northern Cape (80.5%) have higher access to

reading textbooks, while Gauteng (71.9%) and Limpopo (72.5%) have the highest access to math textbooks. Access to notebooks or workbooks is also widespread, with Gauteng (64.9%) having the lowest proportion and provinces like Free State (81.8%) and Limpopo (81.8%) performing better.

Table 16. Distribution of learners according to access to learning materials by province

Province	Percentage learner access to learning materials (%)				
	Sitting and Writing Place	Exercise Book, Pen, Ruler	Own Reading Textbook	Own Math Textbook	Notebooks or Workbooks
Eastern Cape	76.1	87.5	39.1	42.5	84.5
Free State	86.9	89.4	70.0	59.6	81.8
Gauteng	90.0	90.7	69.4	71.9	64.9
Kwazulu-Natal	90.9	90.6	71.9	71.8	71.0
Limpopo	83.4	83.8	73.6	72.5	81.8
Mpumalanga	96.6	90.7	50.8	70.4	72.3
Northern Cape	87.7	81.2	80.5	74.7	71.4
North West	86.9	90.1	72.6	76.0	78.8
Western Cape	89.2	83.0	78.4	79.1	71.1
South Africa	87.4	88.4	65.6	67.7	74.4

■ Sitting and Writing Place
■ Exercise Book, Pen, Ruler
■ Own Reading Textbook
■ Own Math Textbook
■ Notebooks or Workbooks



Figure 21: Distribution of learners according to access to learning materials by province

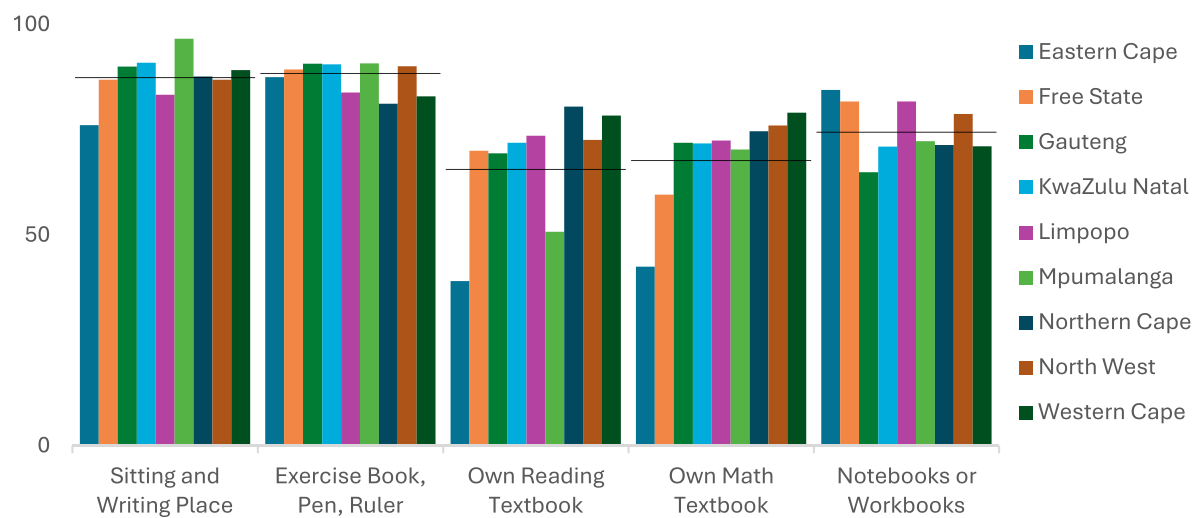


Figure 22: Distribution of learners according to access to learning materials by province

Table 17. Distribution of learners according to access to learning materials by province

Province	Percentage learner access to learning materials (%)				
	Sitting and Writing Place	Exercise Book, Pen, Ruler	Own Reading Textbook	Own Math Textbook	Notebooks or Workbooks
Eastern Cape	76.1	87.5	39.1	42.5	84.5
Free State	86.9	89.4	70.0	59.6	81.8
Gauteng	90.0	90.7	69.4	71.9	64.9
Kwazulu-Natal	90.9	90.6	71.9	71.8	71.0
Limpopo	83.4	83.8	73.6	72.5	81.8
Mpumalanga	96.6	90.7	50.8	70.4	72.3
Northern Cape	87.7	81.2	80.5	74.7	71.4
North West	86.9	90.1	72.6	76.0	78.8
Western Cape	89.2	83.0	78.4	79.1	71.1
South Africa	87.4	88.4	65.6	67.7	74.4

■ Sitting and Writing Place
 ■ Exercise Book, Pen, Ruler
 ■ Own Reading Textbook
 ■ Own Math Textbook
 ■ Notebooks or Workbooks



Figure 23: Distribution of learners according to access to learning materials by province

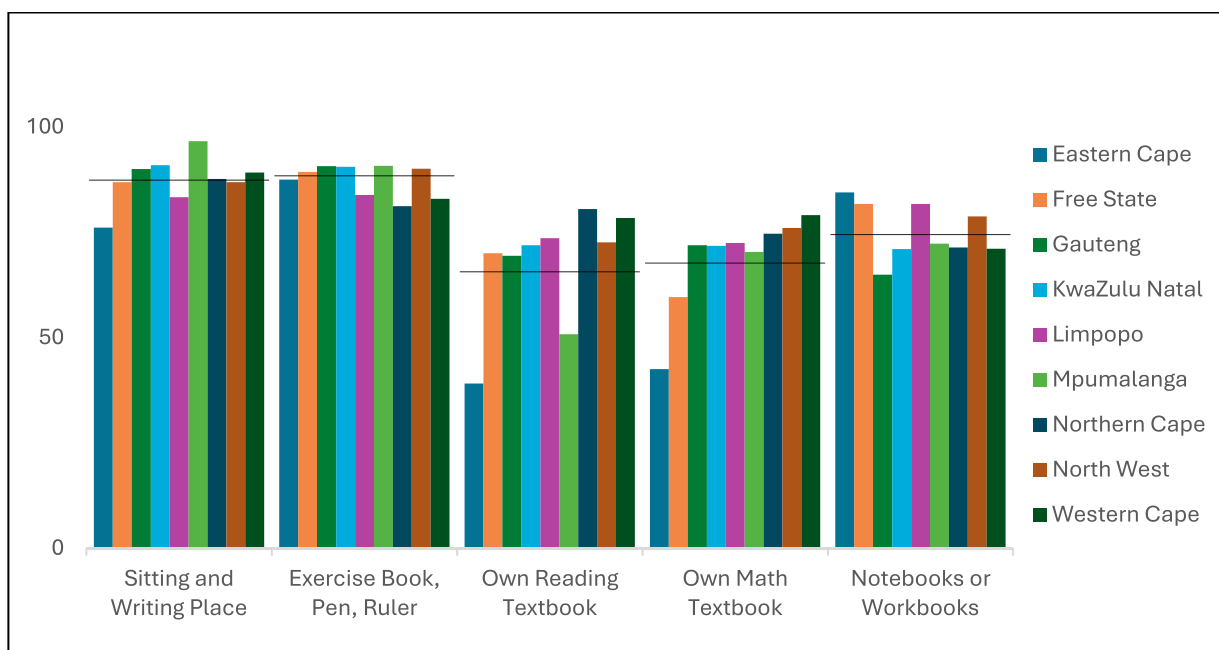


Figure 24: Distribution of learners according to access to learning materials by province

The data in Table 17 and Figures 23 to 24 on learner access to learning materials across various provinces reveals notable differences in the availability of essential resources for education. Nationally, 87.4% of learners have access to a proper sitting and writing place, with provinces like Mpumalanga (96.6%) and Gauteng (90.0%) showing the highest access rates. Access to basic materials such as exercise books, pens, and rulers is generally high, with Free State (89.4%) and Gauteng (90.7%) reporting the highest access. When it comes to subject-specific resources, such as reading and math textbooks, there is considerable variation. The Western Cape (78.4%) and Northern Cape (80.5%) have higher access to reading textbooks, while Gauteng (71.9%) and Limpopo (72.5%) have the highest access to math textbooks. Access to notebooks or workbooks is also widespread, with Gauteng (64.9%) having the lowest proportion and provinces like Free State (81.8%) and Limpopo (81.8%) performing better.

3.10 Learners' access to a school library

This section presents the distribution of learners who have access to the school library.

Table 18. Distribution of learners according to access to a library

Province	Percentage learner access to a school library			
	No School Library	Not Allowed to Borrow Books	Allowed to Borrow Books	I do not know if I am allowed to borrow books
Eastern Cape	60.8	8.4	30.8	0.0
Free State	21.0	29.1	49.8	0.0
Gauteng	41.1	19.7	38.3	0.9
Kwazulu-Natal	56.2	12.7	31.1	0.0
Limpopo	68.1	5.4	26.5	0.0
Mpumalanga	38.2	8.2	53.6	0.0
Northern Cape	44.8	26.0	29.2	0.0
North West	66.9	4.0	29.0	0.1
Western Cape	27.0	23.7	49.3	0.0
South Africa	50.2	13.5	36.0	0.2

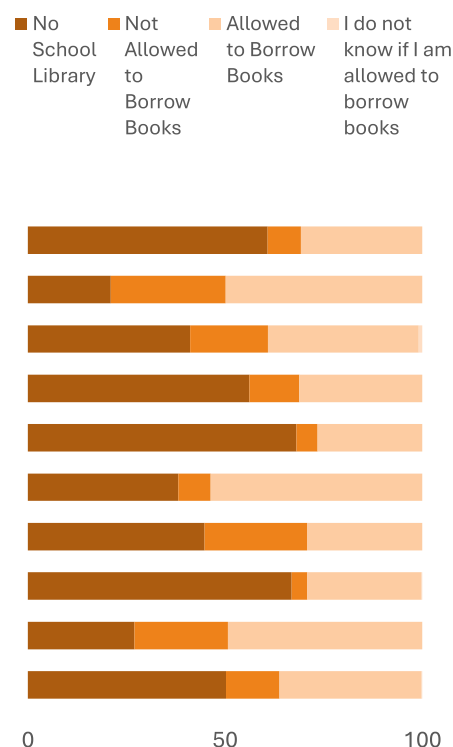


Figure 25: Distribution of learners according to access to a library

Table 18 and Figure 25 on the distribution of learners' access to school libraries highlight significant disparities across provinces. Nationally, 50.2% of learners report their schools lack a library, with Limpopo (68.1%), North West (66.9%), and Eastern Cape (60.8%) having the highest proportions without libraries, indicating a critical gap in these regions. In contrast, the Free State (21.0%) and Western Cape (27.0%) have the lowest proportions without libraries, showing better infrastructure. Regarding borrowing privileges, Mpumalanga (53.6%) and Free State (49.8%) lead in allowing learners to borrow books, suggesting greater resource utilisation, while Limpopo (26.5%) and Northern Cape (29.2%) are the lowest. Notably, a small percentage of learners nationally (13.5%) are not allowed to borrow books, with Northern Cape (26.0%) and Free State (29.1%) being particularly restrictive. Only 0.2% of learners are uncertain about borrowing permissions, indicating clear policies in most schools.

3.11 Learners' sources of lighting in their homes

This section presents the data on the distribution of learners' sources of lighting at their homes.

Table 19. Distribution of sources of lighting at learners' homes

Province	Percentage learners using different sources of lighting at home			
	Fire	Paraffin / Oil	Electricity	None
Eastern Cape	2.1	2.3	76.4	19.2
Free State	3.8	3.3	83.1	9.7
Gauteng	1.5	2.1	88.1	8.4
Kwazulu-Natal	1.1	2.3	91.1	5.5
Limpopo	3.1	2.2	80.6	14.1
Mpumalanga	0.0	1.1	95.3	3.7
Northern Cape	3.3	1.1	85.9	9.6
North West	4.0	1.6	87.2	7.1
Western Cape	1.9	1.2	86.0	10.9
South Africa	1.9	1.9	86.1	9.9

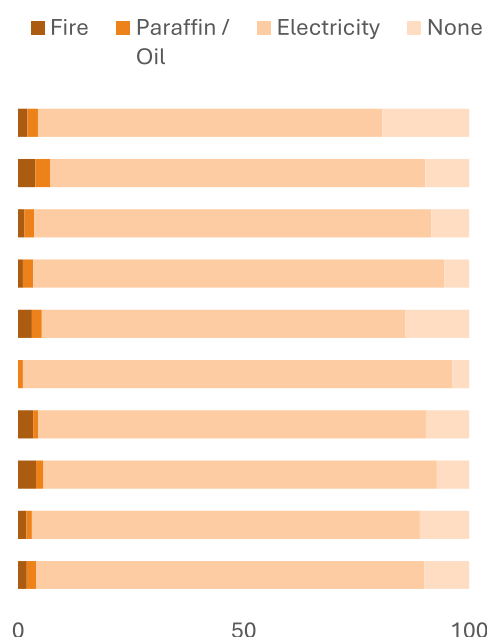


Figure 26: Distribution of sources of lighting at learners' homes

The data in Table 19 and Figure 26 reveal the distribution of lighting sources at learners' homes across South African provinces, showing significant reliance on electricity as the primary source of lighting. Nationally, 86.1% of learners' households use electricity, with provinces like Mpumalanga (95.3%) and KwaZulu-Natal (91.1%) demonstrating the highest access. In contrast, Eastern Cape (76.4%) and Limpopo (80.6%) exhibit comparatively lower electricity usage, indicating disparities in infrastructure. Alternative lighting sources such as fire and paraffin/oil are minimally utilised across all provinces, with the highest usage observed in Free State (fire, 3.8%) and Eastern Cape (paraffin/oil, 2.3%). Notably, some households report no access to any form of lighting, with Eastern Cape (19.2%) and Limpopo (14.1%) leading in this category, highlighting socio-economic challenges in these provinces. As much as electricity dominates as a lighting source, significant provincial disparities persist, emphasising the need for targeted infrastructure development in under-resourced areas.





3.12 Status of essential classroom materials

This section presents the status of essential classroom materials like a dictionary, writing board, library (class/school) teacher table, and chair.

Table 20. Distribution of learners according to access to learning materials by province

Province	Percentage learner access to learning materials and Equipment(%)		
	Dictionary	Writing Board	Teacher table & chair
Eastern Cape	82.2	95.8	58.6
Free State	86.6	97.1	67.6
Gauteng	91.5	97.8	67.1
Kwazulu-Natal	86.6	97.7	49.3
Limpopo	80.9	92.2	38.5
Mpumalanga	72.2	100.0	31.8
Northern Cape	79.2	100.0	67.2
North West	75.5	100.0	58.2
Western Cape	95.9	100.0	78.8
South Africa	84.9	97.3	55.8



Figure 27: Distribution of learners according to access to learning materials by province

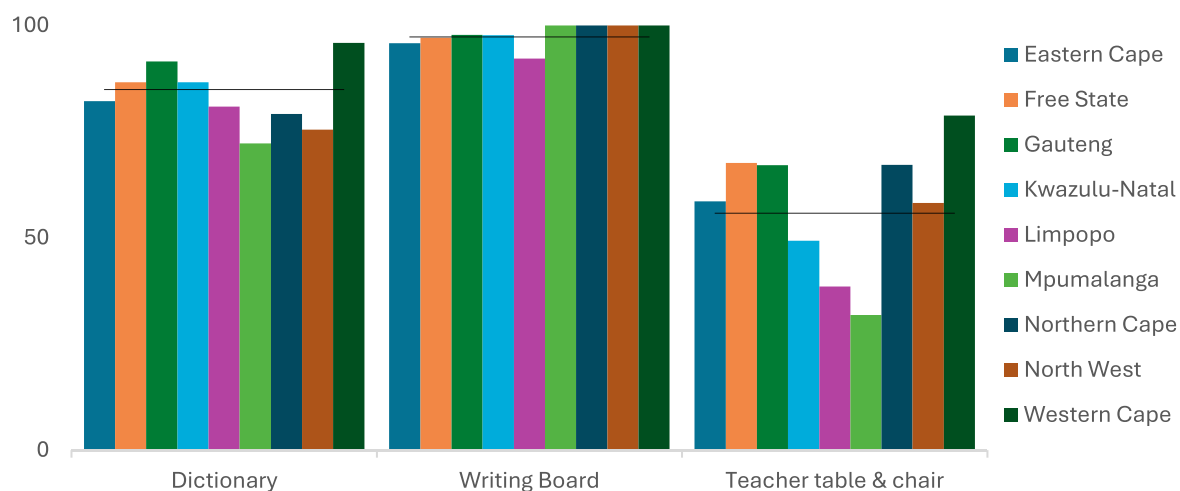


Figure 28: Distribution of learners according to access to learning materials by province

The data in Table 20 and Figures 27 to 28 show notable provincial differences in learners' access to learning materials and equipment. Nationally, access to dictionaries stands at 84.9%, with the Western Cape (95.9%) and Gauteng (91.5%) leading, while Mpumalanga (72.2%) lags. Writing boards are widely available (97.3% nationally), with Mpumalanga, Northern Cape, North West, and Western Cape achieving universal access. Access to teacher tables and chairs is less consistent, with a national average of 55.8%; the Western Cape (78.8%) and Free State (67.6%) perform best, while Mpumalanga (31.8%) and Limpopo (38.5%) have the lowest rates. Provinces like Free State (90.0%) and Gauteng (89.8%) excel, while Limpopo (51.9%) and North West (65.9%) face challenges.

3.13 Status of desirable physical and human resources

This section presents the status of desirable physical and human resources in schools. In the tables and figure below the focus is on school buildings, fencing, school head office, staff room, and meeting hall.

Table 21. Grade 6 learners attending schools with essential infrastructure

Province	Percentage learner access to learning materials and Equipment(%)				
	School Building	School Head Office	Staff Room	Meeting Hall	Fence
Eastern Cape	38.7	81.7	79.5	33.0	79.3
Free State	74.8	94.8	100.0	44.4	90.4
Gauteng	71.6	89.8	94.4	47.6	95.9
Kwazulu-Natal	52.5	91.5	71.9	37.6	90.9
Limpopo	70.4	84.1	61.9	44.8	92.3
Mpumalanga	64.2	95.6	72.4	41.2	84.2
Northern Cape	52.4	86.2	81.9	36.3	87.1
North West	79.7	88.6	60.7	48.3	97.6
Western Cape	80.3	83.7	100.0	42.0	94.2
South Africa	63.1	88.4	79.5	41.7	90.5



Figure 29: Grade 6 learners attending schools with essential infrastructure

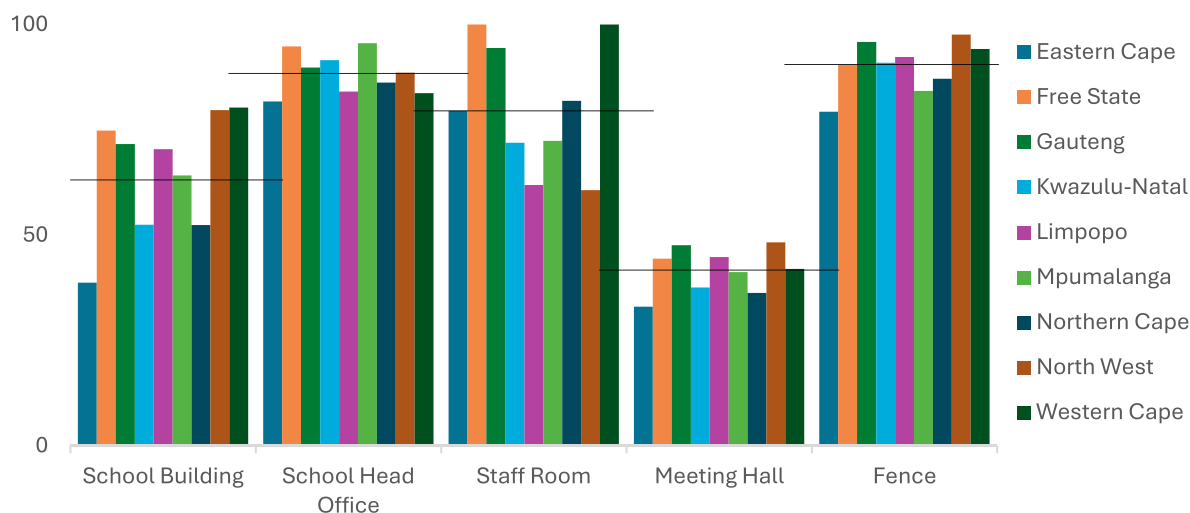


Figure 30: Grade 6 learners attending schools with essential infrastructure

The data in Table 21 and Figures 29 to 30 above reveal disparities in learners' access to essential school infrastructure across provinces. Nationally, 63.1% of learners have access to proper school buildings, with the Western Cape (80.3%) and North West (79.7%) performing well, while the Eastern Cape (38.7%) lags significantly. Access to a school head office is relatively high at 88.4%, with Mpumalanga (95.6%) and Free State (94.8%) excelling. Staff rooms are accessible to 79.5% of teachers nationwide, with universal access in the Free State and Western Cape, but much lower availability in Limpopo (61.9%) and North West (60.7%). Meeting halls are less common, with a national average of 41.7%, and the Eastern Cape (33.0%) and Northern Cape (36.3%) have the least access. Fencing is widely available (90.5% nationally), with the North West (97.6%) and Gauteng (95.9%) leading, while the Eastern Cape (79.3%) and Mpumalanga (84.2%) are below the average. These disparities indicate a need for investment in basic infrastructure, particularly in the Eastern Cape, Limpopo, and Northern Cape.

Furthermore, the tables below continue with providing the data on the availability of resources like electricity, television, photocopiers, and computers.

Table 22. Distribution of learners according to access to learning materials by province

Province	Percentage learner access to learning materials and Equipment (%)			
	Electricity	Television	Photocopier	Computer
Eastern Cape	100.0	55.2	100.0	90.4
Free State	100.0	69.9	100.0	100.0
Gauteng	100.0	77.5	100.0	98.1
Kwazulu-Natal	100.0	59.3	100.0	93.8
Limpopo	100.0	73.2	100.0	100.0
Mpumalanga	100.0	72.3	100.0	100.0
Northern Cape	100.0	79.2	100.0	100.0
North West	100.0	42.5	100.0	91.7
Western Cape	100.0	67.8	100.0	100.0
South Africa	100.0	65.5	100.0	96.3



Figure 31: Distribution of learners according to access to learning materials by province

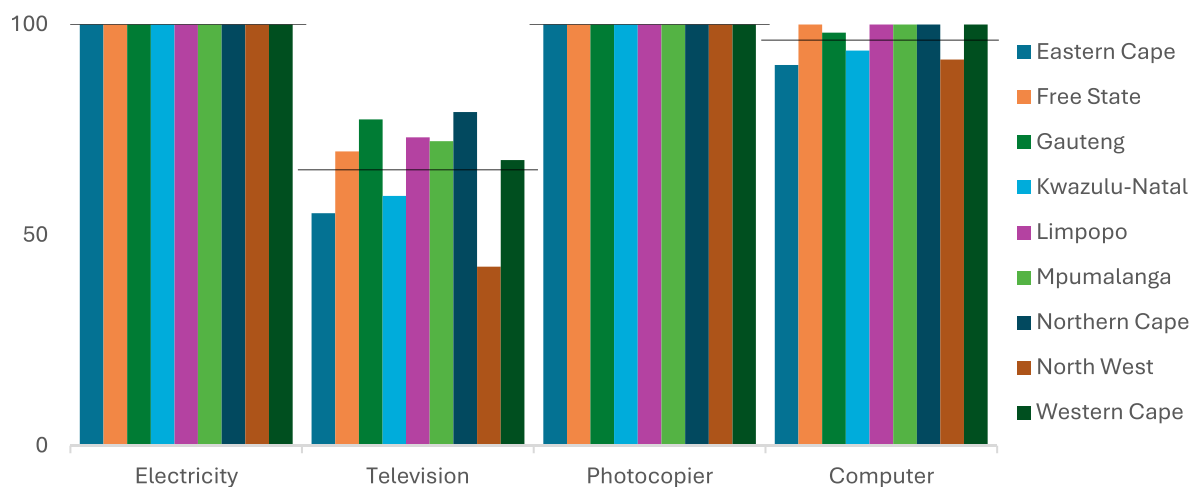


Figure 32: Distribution of learners according to access to learning materials by province

The data in the above Table 22 and Figures 31 to 32 indicate that access to electricity and photocopiers is universal across all provinces, reflecting consistent infrastructure support in these areas. Access to computers is also high nationally (96.3%), with all provinces except North West (91.7%) and Eastern Cape (90.4%) achieving full access. Television access varies significantly, with a national average of 65.5%. Provinces like the Northern Cape (79.2%), Gauteng (77.5%), and Limpopo (73.2%) exhibit the highest access, while North West (42.5%) lags far behind. These findings suggest strong national provision of essential electricity and equipment like photocopiers and computers, but disparities in television access highlight room for improvement, particularly in the North West and Eastern Cape. Additionally, lack of television access may speak to learners and teachers making greater use of other forms of visual technology or remote learning platforms, such as cell phones and tablets, suggesting an area for future focus. Research on teaching and learning experiences during COVID-19 has highlighted a marked trend towards blended learning in many schools.

The tables below provide data on the availability of resources like reading teacher cupboard, reading teacher bookshelf, mathematics teacher cupboard, and mathematics teacher bookshelf.

Table 23. Distribution of learners according to access to learning materials by province

Province	Percentage learner access to learning materials and Equipment(%)			
	Reading Teacher Cupboard	Reading Teacher Bookshelf	Mathematics Teacher Cupboard	Mathematics Teacher Bookshelf
Eastern Cape	88.5	47.0	88.9	47.6
Free State	82.0	56.7	97.0	72.6
Gauteng	85.4	61.0	97.4	69.8
Kwazulu-Natal	89.0	67.3	93.9	59.2
Limpopo	78.6	25.6	78.2	22.3
Mpumalanga	58.4	38.3	57.7	33.6
Northern Cape	91.6	61.9	95.9	54.4
North West	95.1	77.2	94.8	72.4
Western Cape	98.0	79.7	97.5	88.2
South Africa	85.2	56.6	89.3	56.8

■ Reading Teacher Cupboard
■ Reading Teacher Bookshelf
■ Mathematics Teacher Cupboard
■ Mathematics Teacher Bookshelf



Figure 33: Distribution of learners according to access to learning materials by province

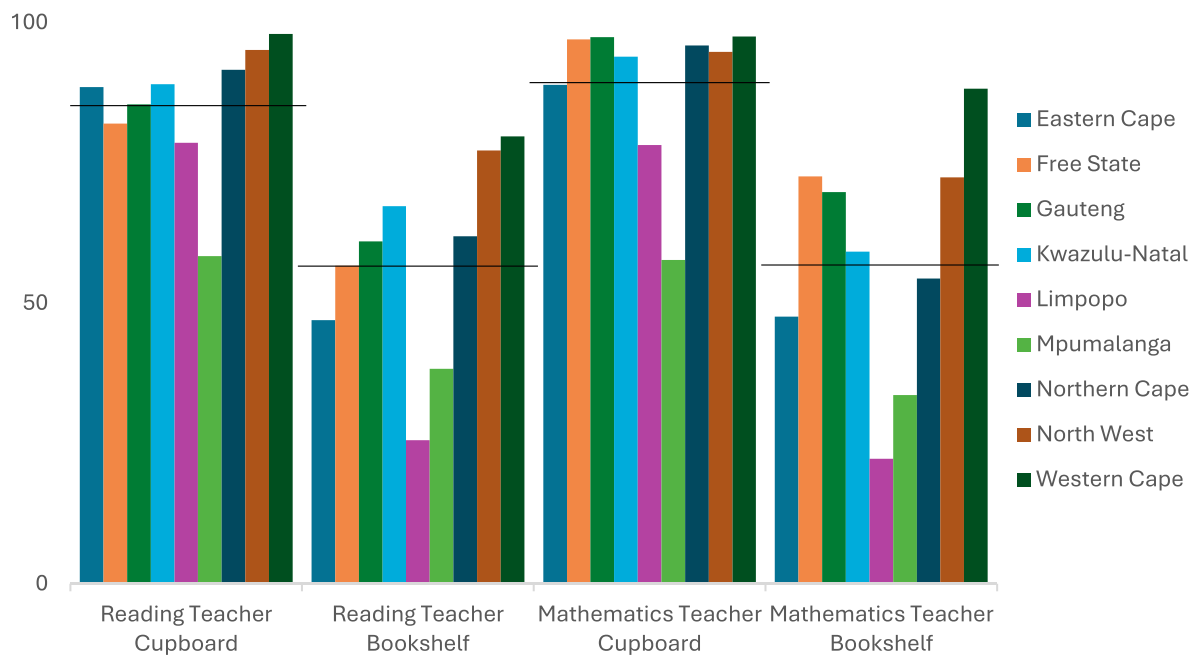


Figure 34: Distribution of learners according to access to learning materials by province

The data in Table 23 and Figures 33 to 34 reveal varied access to teaching resources across provinces. Nationally, access to reading teacher cupboards (85.2%) and mathematics teacher cupboards (89.3%) is relatively high, with the Western Cape (98.0% and 97.5%, respectively) and North West (95.1% and 94.8%) leading. However, Mpumalanga (58.4% and 57.7%) and Limpopo (78.6% and 78.2%) show the lowest access, indicating disparities in resource allocation. Access to reading teacher bookshelves (56.6%) and mathematics teacher bookshelves (56.8%) is notably lower nationwide, with Western Cape (79.7% and 88.2%) and North West (77.2% and 72.4%) performing best, while Limpopo (25.6% and 22.3%) and Mpumalanga (38.3% and 33.6%) significantly underperform. These differences highlight a critical need for equitable distribution of resources, particularly in Limpopo and Mpumalanga, to ensure better learning environments. The lower availability of reading and mathematics bookshelves nationally underline the turn towards digitalized learning and teaching platforms, and might have relevance for learners' reading competency, with associated implications for teachers' language teaching competency.

3.14 Status of pre-school attendance

This section presents the data on the number of years in preschool attendance.

Table 24. Distribution of learners by number of years in preschool

Province	Percentage learners by number of years preschool was attended				
	Never	Less than one year	One year	Two years	Three or more
Eastern Cape	15.1	5.0	38.5	22.1	19.3
Free State	14.8	4.9	26.5	19.5	34.3
Gauteng	10.7	4.4	29.0	16.2	39.7
Kwazulu-Natal	17.2	4.8	40.4	22.3	15.4
Limpopo	11.8	5.3	27.9	24.2	30.8
Mpumalanga	12.1	3.7	38.0	25.0	21.1
Northern Cape	18.2	3.5	30.9	23.5	23.8
North West	16.2	3.4	37.0	19.4	24.1
Western Cape	14.6	3.4	31.7	19.8	30.6
South Africa	14.4	4.4	33.6	21.2	26.5

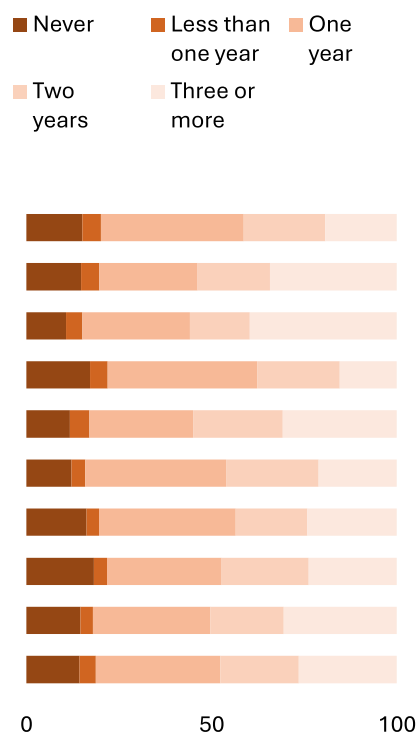


Figure 35: Distribution of learners by numbers of years in preschool

The distribution of learners by the number of years in preschool in Table 24 and Figure 35 above highlights significant provincial variations in early childhood education participation. Nationally, 14.4% of learners never attended preschool, with the Northern Cape (18.2%) and KwaZulu-Natal (17.2%) having the highest proportions. Most learners attended preschool for one year (33.6%) or two years (21.2%), with KwaZulu-Natal leading in one-year attendance (40.4%) and Mpumalanga showing the highest for two years (25.0%). Notably, 26.5% of learners attended preschool for three or more years, with Gauteng (39.7%) and Free State (34.3%) leading in extended preschool attendance, emphasising strong early education participation in these provinces.

CHAPTER 4: READING AND MATHEMATICS ACHIEVEMENT AND TRENDS

4.1 Introduction

In this chapter, the achievements of learners and their teachers in Reading and Mathematics, and HIV and Aids tests are presented in SEACMEQ scale scores and in percentages of participants who achieved various levels of performance. The results are reported to show trends from the SEACMEQ II (2000) through the SEACMEQ III (2007) and SEACMEQ IV (2013) to the SEACMEQ V (2021) study. The achievement levels must be considered within the findings on learning conditions indicated in the previous section.

4.2 Overall achievement trends

The reading and mathematics scores show a pattern of improvement between SEACMEQ II and SEACMEQ IV, with SEACMEQ IV being the high point. However, SEACMEQ V shows a dip in both subjects, signalling potential challenges in recent years after a peak in SEACMEQ IV.

Table 25. Overall achievement trends

SEACMEQ	Learners	
	Reading	Mathematics
II	492	486
III	495	495
IV	538	552
V	505	525

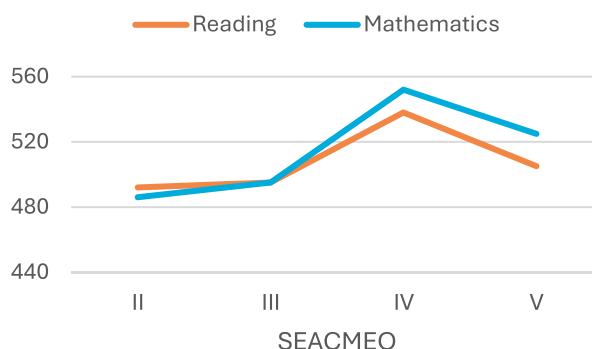


Figure 36: Overall achievement trends

The reading achievement trends in the above Table 25 and Figure 36 above show a gradual increase over time, starting with a baseline score of 492 in SEACMEQ II. This score saw a slight improvement to 495 in SEACMEQ III, reflecting minimal progress. However, SEACMEQ IV marked a significant jump to 538, indicating substantial growth in reading performance. By SEACMEQ V, the score dropped to 505, showing some regression from the peak in SEACMEQ IV, though it remained higher than the levels recorded in SEACMEQ II and III. The mathematics performance trends start with a baseline score of 486 in SEACMEQ II. This improved to 495 in SEACMEQ III, showing a noticeable rise. SEACMEQ IV saw a substantial increase to 552, marking a significant leap in performance. However, by SEACMEQ V, the score decreased to 525, reflecting a drop from the previous high but remaining above the levels seen in SEACMEQ II and III. Mathematics performance consistently improved from SEACMEQ II to IV, peaking in SEACMEQ IV, followed by a slight decline in SEACMEQ V.



4.3. Reading and Mathematics achievement of learners and teachers

The overall mean scores for Grade 6 learners and teachers across Reading and Mathematics for each province and South Africa are presented in this section. The comparison includes SEACMEQ IV and SEACMEQ V results.

Table 26. Overall learners mean for Reading SEACMEQ IV-V

Provinces	Learners	
	READING	
	IV	V
Eastern Cape	503 (IV)	485 (V)
Free State	543 (IV)	492 (V)
Gauteng	579 (IV)	540 (V)
Kwazulu-Natal	529 (IV)	492 (V)
Limpopo	487 (IV)	480 (V)
Mpumalanga	535 (IV)	507 (V)
Northern Cape	538 (IV)	512 (V)
North West	522 (IV)	513 (V)
Western Cape	627 (IV)	534 (V)
South Africa	538 (IV)	505 (V)

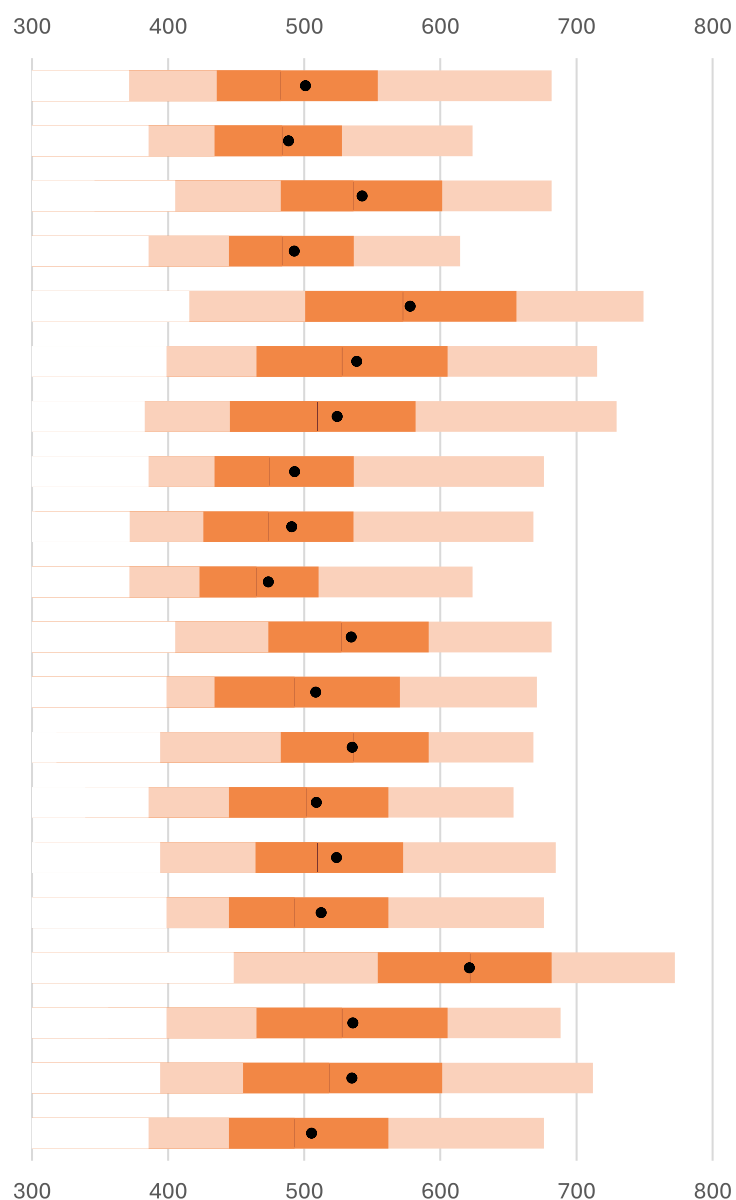


Figure 37: Overall learners mean scores for Reading SEACMEQ IV-V

Learners reading mean scores by province

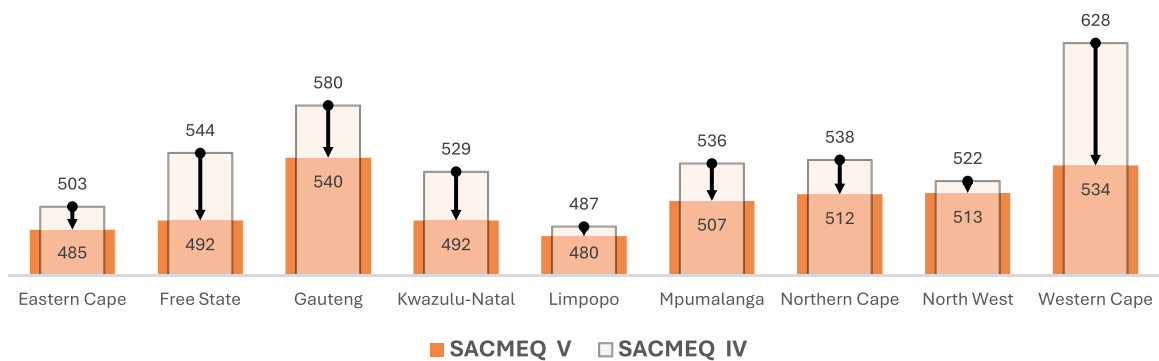


Figure 38: Overall learners' mean scores for Reading SEACMEQ IV-V

Table 26 and Figures 37 to 38 which have the overall mean scores for Reading in SEACMEQ IV and V reveal trends in learners' reading performance across South African provinces, with a national decline from 538.3 in SEACMEQ IV to 505 in SEACMEQ V. The Western Cape consistently leads in performance, scoring the highest in both cycles (627.6 in IV and 534 in V), demonstrating relative strength in reading proficiency. Gauteng follows, maintaining high scores (579.9 in IV and 540 in V), though also reflecting a decline. Most provinces experienced decreases, with Eastern Cape (502.6 to 485) and Limpopo (487.3 to 480) showing lower performance in both cycles. Mpumalanga and Northern Cape show moderate scores with slight declines, while North West shows stability with a minor increase from 512 to 513 in SEACMEQ V.

Table 27. Overall learners mean for Mathematics SEACMEQ IV-V

Provinces	Learners	
	MATHEMATICS	
	IV	V
Eastern Cape	525 (IV)	518 (V)
Free State	551 (IV)	512 (V)
Gauteng	576 (IV)	546 (V)
Kwazulu-Natal	541.8 (IV)	521 (V)
Limpopo	513 (IV)	502 (V)
Mpumalanga	539 (IV)	525 (V)
Northern Cape	544 (IV)	532 (V)
North West	540 (IV)	528 (V)
Western Cape	654 (IV)	545 (V)
South Africa	552 (IV)	525 (V)

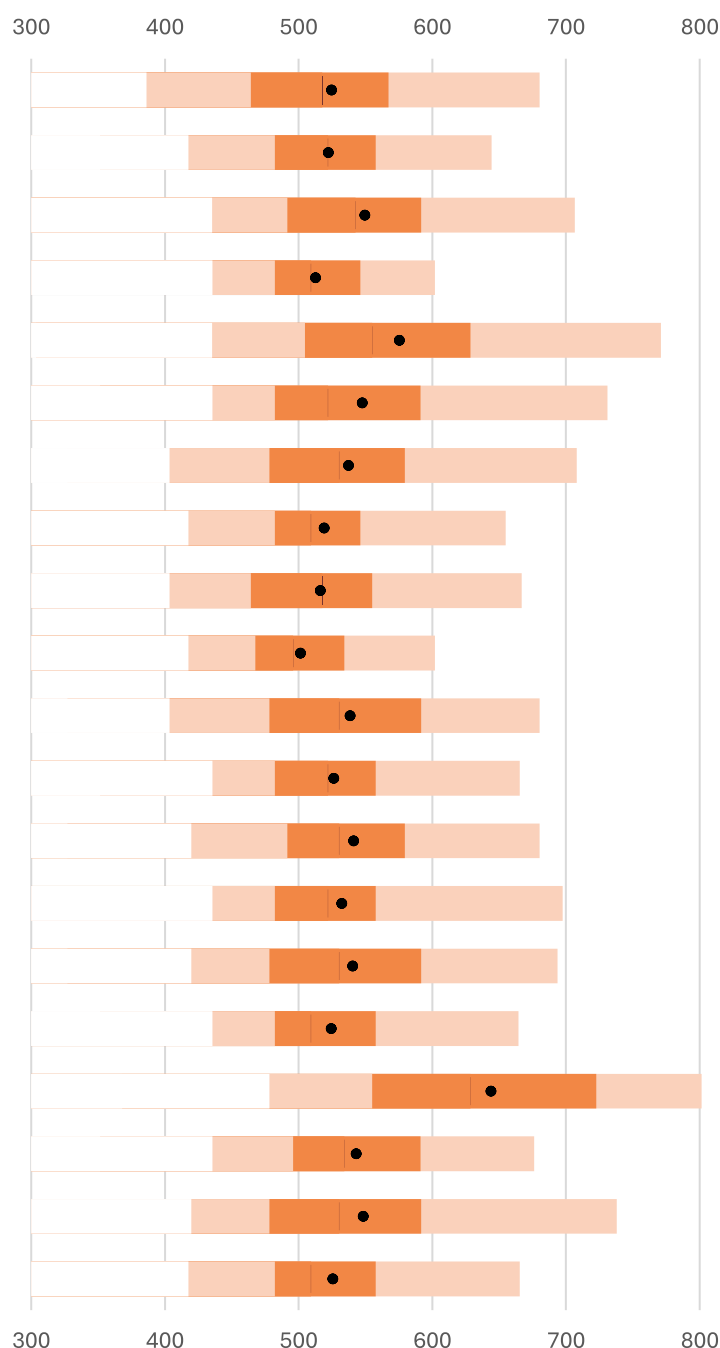


Figure 39: Overall learners mean scores for Math SEACMEQ IV-V

Learners mathematics mean scores by province

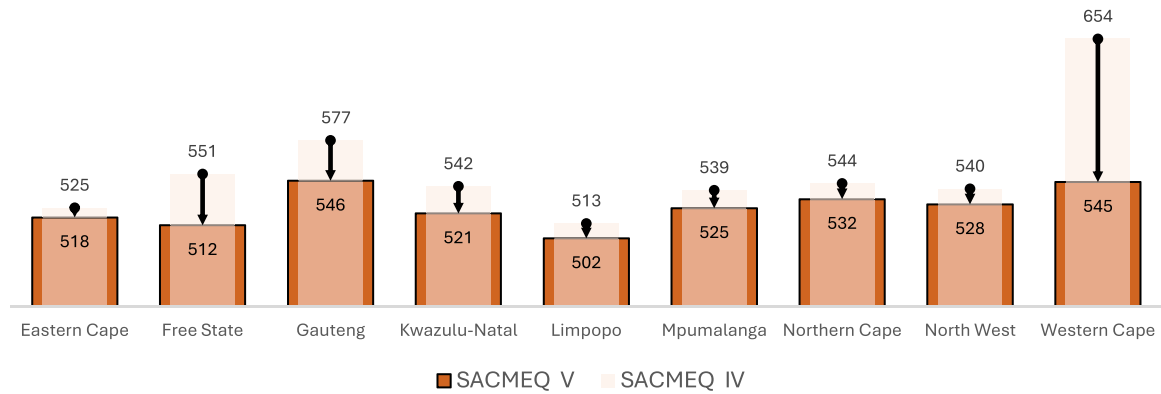


Figure 40: Overall learners' mean scores for Math SEACMEQ IV-V

Table 27 and Figures 39 and 40 present the overall mean scores for Mathematics in SEACMEQ IV and V that indicate a general decline in performance across South African provinces, with the national average dropping from 551.5 in SEACMEQ IV to 525 in SEACMEQ V. The Western Cape consistently leads, achieving the highest score of 654.4 in SEACMEQ IV but experiencing a significant drop to 545 in SEACMEQ V. Gauteng follows with high scores (576.9 in IV and 546 in V), although it also reflects a decline. Most provinces show decreases, with the Free State (551.2 to 512) and Limpopo (513.4 to 502) showing notable reductions. Mpumalanga, Northern Cape, and North West display relatively moderate scores, with minor declines, while KwaZulu-Natal shows a decrease from 541.8 to 521. Eastern Cape demonstrates the least fluctuation, moving slightly from 525.4 to 518.

Table 28. Overall teachers mean for Reading SEACMEQ IV-V

Provinces	Teachers
	READING
	IV V
Eastern Cape	701 (IV)
	776 (V)
Free State	701 (IV)
	807 (V)
Gauteng	734 (IV)
	837 (V)
Kwazulu-Natal	722 (IV)
	806 (V)
Limpopo	727 (IV)
	810 (V)
Mpumalanga	716 (IV)
	823 (V)
Northern Cape	731 (IV)
	843 (V)
North West	748 (IV)
	812 (V)
Western Cape	790 (IV)
	820 (V)
South Africa	726 (IV)
	811 (V)

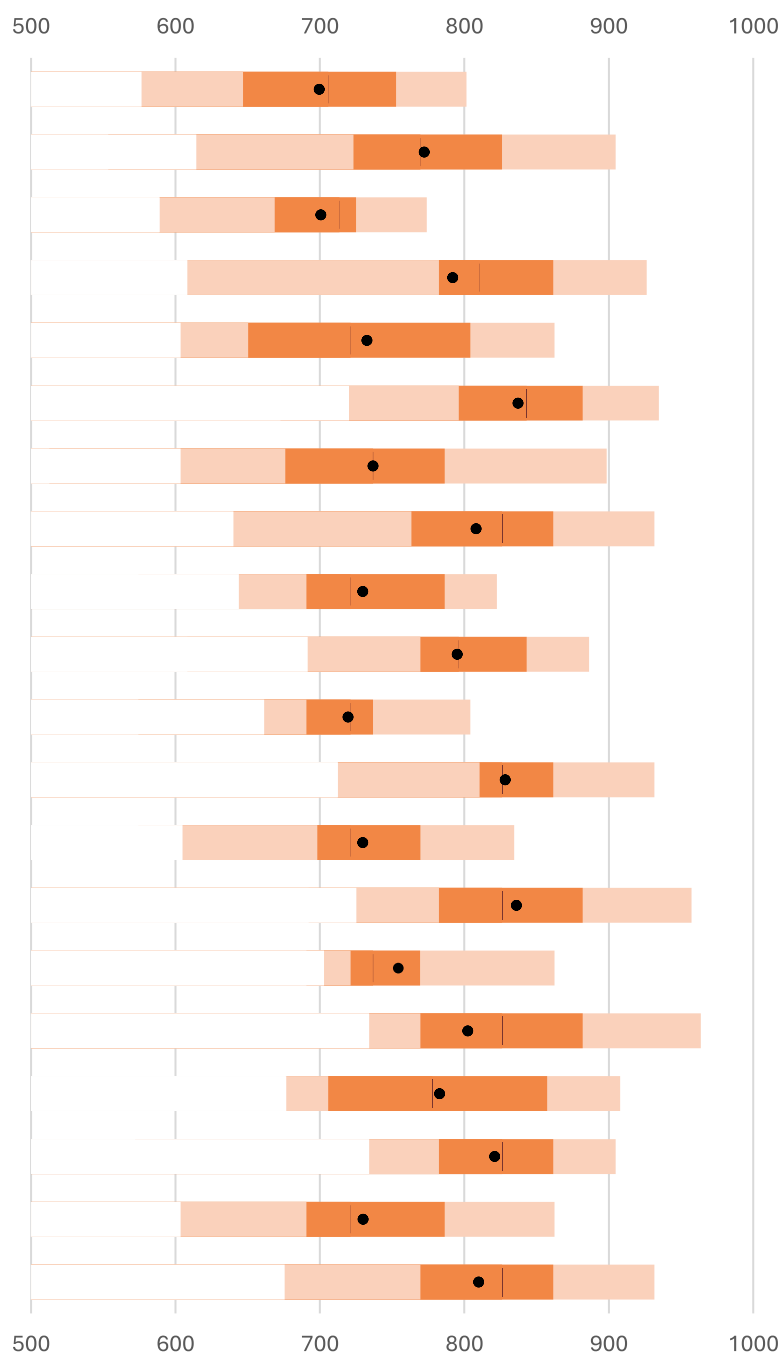


Figure 41: Overall teachers' mean scores for Reading SEACMEQ IV-V

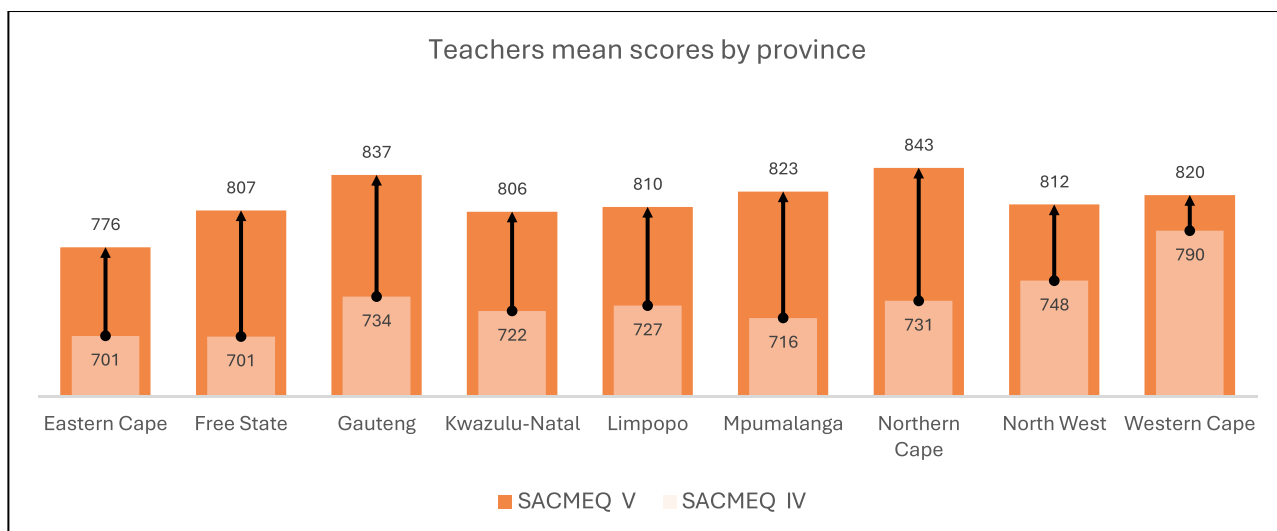


Figure 42: Overall teachers' mean scores for Reading SEACMEQ IV-V

Table 28 and Figures 41 and 42 overall mean scores for teachers in Reading in SEACMEQ IV and V show a significant improvement across all provinces, with the national average increasing from 726.6 in SEACMEQ IV to 811 in SEACMEQ V. The Northern Cape (730.7 to 843) and Gauteng (734.3 to 837) display the highest gains, highlighting substantial progress in teacher performance. The Western Cape continues to lead in absolute scores, maintaining consistently high performance (789.9 to 820). Other provinces, such as Limpopo (726.7 to 810), Free State (700.6 to 807), and KwaZulu-Natal (722.2 to 806), also showed marked improvement. Even the provinces with relatively lower starting scores in SEACMEQ IV, such as Eastern Cape (701.2), have demonstrated significant growth, reaching 776 in SEACMEQ V. These increases indicate enhanced teacher competencies in reading instruction, reflecting possible improvements in professional development and teaching strategies, though disparities among provinces remain, emphasising the need for sustained efforts to bridge gaps.

Table 29. Overall teachers mean for Mathematics SEACMEQ IV-V

Provinces	Teachers
	Mathematics
	IV V
Eastern Cape	781 (IV)
	752 (V)
Free State	791 (IV)
	751 (V)
Gauteng	833 (IV)
	756 (V)
Kwazulu-Natal	759 (IV)
	802 (V)
Limpopo	746 (IV)
	706 (V)
Mpumalanga	793 (IV)
	769 (V)
Northern Cape	782 (IV)
	785 (V)
North West	731 (IV)
	735 (V)
Western Cape	843 (IV)
	703 (V)
South Africa	780 (IV)
	759 (V)

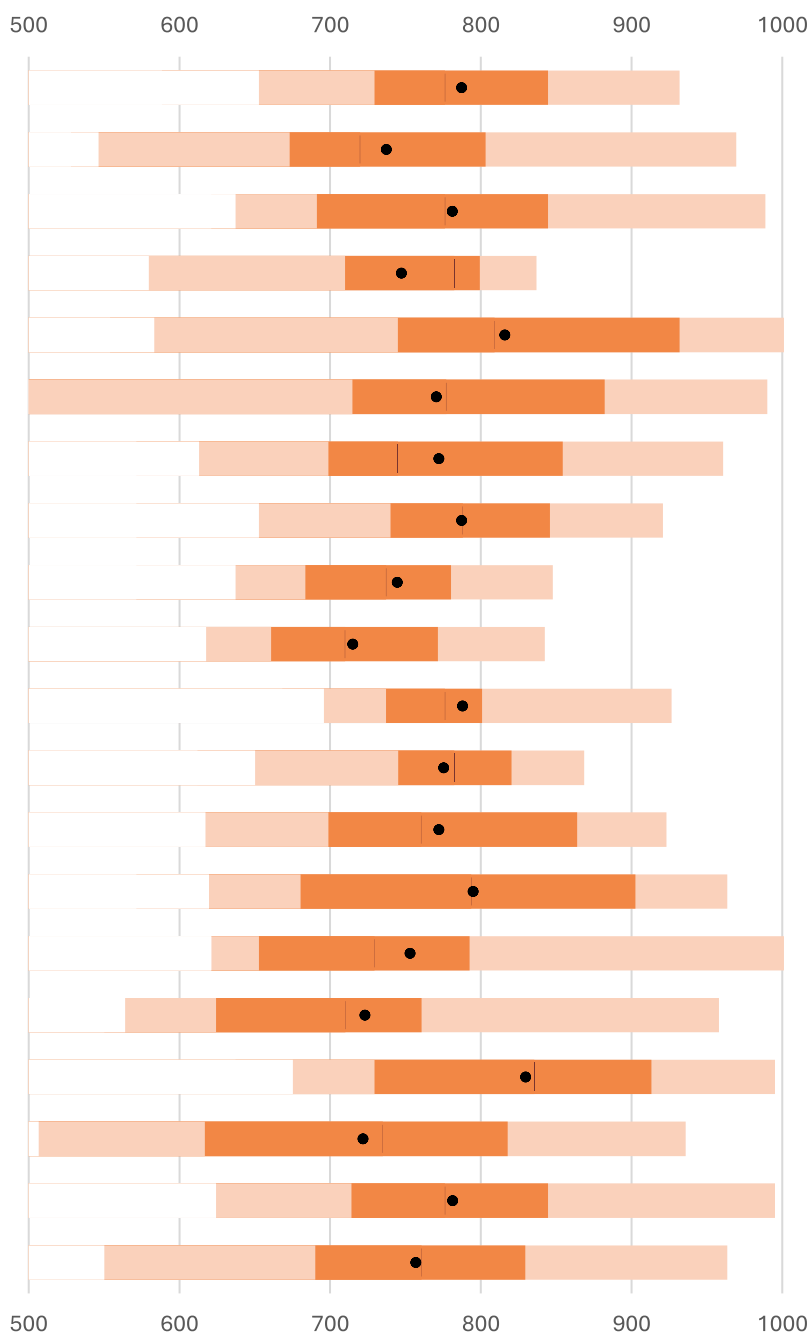


Figure 43: Overall teachers mean scores for Mathematics SEACMEQ IV-V

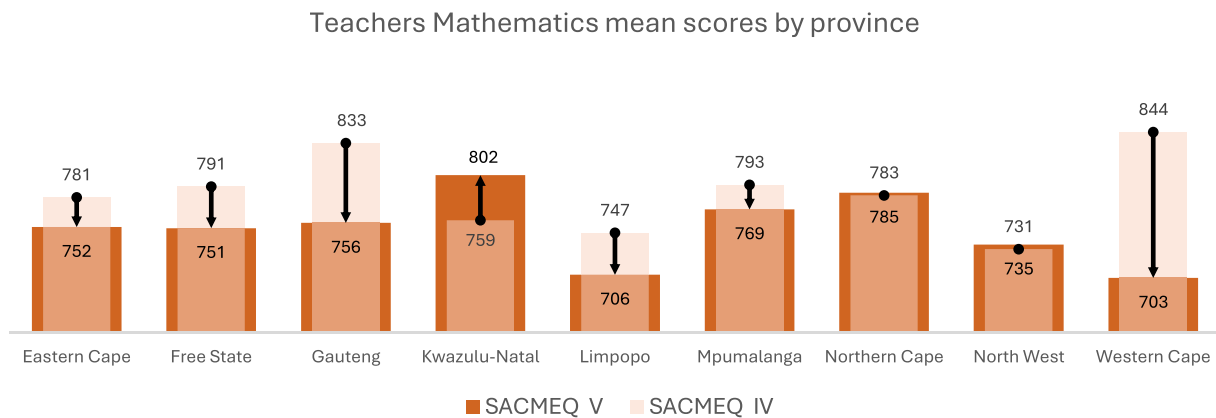


Figure 44: Overall teachers' mean scores for Mathematics SEACMEQ IV-V

Table 29 and Figures 43 and 44 highlight the overall mean scores of teachers in Mathematics for SEACMEQ IV and V across South African provinces, revealing notable shifts in performance over time. Nationally, the mean score decreased slightly from 780 in SEACMEQ IV to 759 in SEACMEQ V, suggesting a marginal decline in mathematics proficiency among teachers. Provincially, Gauteng and Western Cape led in SEACMEQ IV with scores of 833 and 843, respectively, but both experienced significant declines in SEACMEQ V, particularly Western Cape, which dropped to 703. Conversely, KwaZulu-Natal showed improvement, rising from 759 in SEACMEQ IV to 802 in SEACMEQ V, marking the highest score in the latter assessment. Limpopo consistently underperformed, with scores decreasing from 746 to 706, highlighting ongoing challenges in teacher mathematics competency. Northern Cape showed steady improvement, increasing from 782 to 785. The data highlights varying provincial trends, with some provinces showing progress while others, particularly historically high-performing ones, experienced declines, necessitating targeted interventions to improve teacher proficiency in mathematics.

4.4 Learner Reading competency levels by Province

Eight levels of achievement are used where learners who perform at a higher level demonstrate more understanding and competency than those at a lower level. The SEACMEQ reading competency levels and their descriptions are summarised in Table 30.

Table 30. SEACMEQ reading competency levels and their descriptions

ADVANCED READING SKILLS	Level	Descriptor	Competencies
	1	Pre-reading	Matches words and pictures involving concrete concepts and everyday objects
	2	Emergent Reading	Matches words and pictures involving prepositions and abstract concepts.
	3	Basic Reading	Interprets meaning (by matching words and phrases, and completing sentences).
	4	Reading for Meaning	Reads to link and interpret information located in various parts of the text.
	5	Interpretive Reading	Interprets information from various parts of the text in association with external information.
	6	Inferential Reading	Reads to combine information from various parts of the text so as to infer the writer's purpose.
	7	Analytical Reading	Locates information in longer texts (narrative, document or expository) in order to combine information from various parts of the text so as to infer the writer's personal beliefs (value systems, prejudices and biases).
	8	Critical Reading	Reads from various parts of the text so as to infer and evaluate what the writer has assumed about both the topic and the characteristics of the reader

According to the Level Descriptions in Table 30 learners at the lowest reading competency levels, specifically the Pre-Reading and Emergent Reading levels, display very limited literacy skills. In contrast, those at the highest levels of reading competency, such as Analytical Reading and Critical Reading, exhibit advanced and complex reading abilities.

Reading performance is analysed based on the achievements of each province as recorded in SEACMEQ V. This analysis examines the percentage of learners who have attained different levels of reading competency, enabling a province-by-province comparison of literacy skills. By categorising learners according to distinct competency levels, the study provides a clear picture of reading proficiency across provinces, highlighting disparities and areas for improvement.

Province	Reading Levels by %							
	1	2	3	4	5	6	7	8
	III	III	III	III	III	III	III	III
	IV	IV	IV	IV	IV	IV	IV	IV
	V	V	V	V	V	V	V	V
Eastern Cape	14.1	24.5	25.8	16.7	9.7	3.9	3.7	1.7
	5.2	10.5	21.6	19.6	19.2	10.2	10.9	2.8
	3.2	9.9	25.8	27.5	20.5	8.2	4.2	0.6
Free State	6.9	15.4	24.7	18.5	11.2	10.2	9	4
	1.7	3.6	10.1	21.0	26.0	19.8	13.4	4.4
	2.6	8.8	22.9	28.6	21.9	10.5	4.1	0.6
Gauteng	4	7.6	10.5	10.2	12.6	16.2	23.8	15.1
	1.3	3.1	7.3	14.6	19.6	18.8	23.1	12.1
	1.8	7.7	15.0	17.8	20.2	15.0	16.6	6.1
Kwazulu-Natal	9	19.4	26.1	14.7	8.9	7.9	7.5	6.7
	3.1	6.4	18.6	19.7	21.1	12.0	11.4	7.7
	3.6	14.5	25.5	23.2	14.7	7.9	8.0	2.7
Limpopo	22.5	26.5	25.4	13.1	6.8	3.3	1.7	0.7
	5.4	11.1	27.4	22.2	16.7	8.0	7.1	2.1
	5.9	15.0	25.5	21.9	16.7	9.4	5.3	0.4
Mpumalanga	9.4	19	24.1	19	12	8.8	5	2.7
	1.7	3.9	13.7	19.7	28.4	15.1	14.4	3.1
	3.1	10.9	22.0	21.3	16.7	12.3	11.8	2.1
Northern Cape	7.7	13.7	19.4	16	14.6	12.1	11.1	5.4
	1.7	5.4	11.8	16.2	27.9	18.9	16.9	1.3
	2.1	7.2	18.9	23.1	24.5	14.4	8.6	1.2
North West	6.9	15	19.4	17.4	12.3	11.4	10.8	6.7
	2.3	4.7	18.0	22.0	27.2	11.1	11.4	3.3
	2.5	8.7	21.1	21.5	21.6	9.6	11.9	3.1
Western Cape	1.2	3.9	8.1	13.7	16	20.7	22.3	14.1
	0.7	1.0	3.9	5.3	16.4	16.7	34.9	21.1
	1.6	5.7	14.4	21.0	21.6	18.8	14.0	3.0
South Africa	9.9	17.3	21.1	14.7	10.6	9.6	10.2	6.6
	2.9	6.0	15.8	18.1	21.1	13.7	15.3	7.1
	3.1	10.7	21.7	22.4	18.7	11.2	9.7	2.6

Table 31. Learners Reading levels

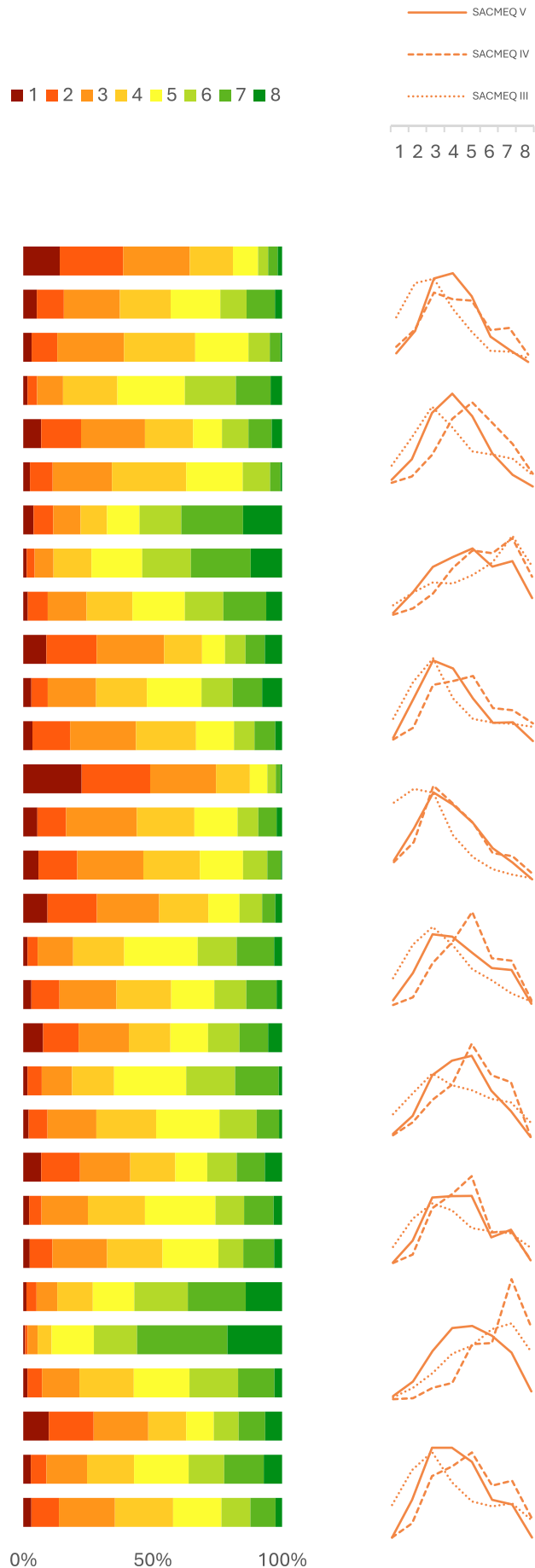


Figure 45: Learners Reading levels

Table 31 and Figure 45 show that the largest proportion of learners was at level 3 in (SEACMEQ III) improved to level 5 in SEACMEQ IV then back to level 3 in SEACMEQ V, further evidence of this can be seen in an increase (53% to 75 %) then decrease (75% to 65%) in the proportion of learners with acceptable reading skills.

The provinces where level 5 has the highest proportion of learners for SEACMEQ V are Gauteng, Northern Cape, North West, and Western Cape, the provinces where level 4 has the highest proportion of learners for SEACMEQ V are Eastern Cape and Free State, the provinces where level 3 has the highest proportion of learners for SEACMEQ V are Kwazulu-Natal, Limpopo and Mpumalanga.

4.6 Learner Mathematics Competency Levels by Province

Mathematics performance is analysed by tracking the achievements of each province over the SEACMEQ III to SEACMEQ V period. This analysis focuses on the percentage of learners reaching various competency levels in Mathematics, providing a detailed look at proficiency across different provinces. By categorising learners' skills within specific competency levels, the study allows for a comparative view of Mathematics abilities by province, helping to identify trends, improvements, or areas in need of attention in each province's learning outcomes. The SEACMEQ Mathematics competency levels and their descriptions are summarised in Table 32.

Table 32. SEACMEQ mathematics competency levels and their descriptions

BASIC MATH SKILLS	Level	Descriptor	Competencies
	1	Pre- Numeracy	Applies single-step addition and subtraction.
	2	Emergent Numeracy	Applies a two-step addition and subtraction involving carrying.
	3	Basic Numeracy	Translates verbal information into arithmetic operations.
	4	Beginning Numeracy	Translates verbal or graphic information into simple arithmetic problems.
	5	Competent Numeracy	Translates verbal, graphic, or tabular information into an arithmetic form in order to solve a given problem.
	6	Mathematically Skilled	Solves multiple-operation problems (using the correct order) involving fractions, ratios, and decimals.
	7	Concrete Problem Solving	Extracts and converts information from tables, charts and other symbolic Presentations in order to identify, and then solve multi-step problems
	8	Abstract Problem Solving	Identifies the nature of an unstated mathematical problem embedded within verbal or graphic information and then translate this into symbolic, algebraic, or equation form in order to solve a problem.
ADVANCED MATHEMATICS SKILLS			

According to the Level Descriptions outlined in Table 32, learners with the lowest Mathematics competencies classified as Pre-Numeracy and Emergent Numeracy levels exhibit minimal numeracy

skills. In contrast, those at the highest competency levels, Concrete Problem Solving and Abstract Problem Solving demonstrate advanced and complex Mathematical abilities. The table illustrates the percentages of South African learners achieving each SEACMEQ level in Mathematics, with separate sections for SEACMEQ III (upper section) and SEACMEQ IV (lower section), detailing results by province and for South Africa as a whole. By comparing these datasets, the table highlights trends in mathematical proficiency over time across different provinces. The implications point to significant challenges in foundational numeracy among South African learners, emphasising the need for targeted interventions to address these gaps while monitoring trends in proficiency across provinces.

Province	Mathematics Levels by %							
	1	2	3	4	5	6	7	8
	III	III	III	III	III	III	III	III
	IV	IV	IV	IV	IV	IV	IV	IV
	V	V	V	V	V	V	V	V
Eastern Cape	7.9	42.4	30.3	11.7	3.5	1.8	2.3	0
	1.5	19.0	39.5	18.1	13.7	4.4	3.3	0.6
	0.1	16.6	47.3	22.1	10.3	2.2	0.9	0.3
Free State	3.8	34.3	34.7	14.4	7.2	4.3	1.1	0.1
	0.6	9.3	36.8	24.6	18.6	5.5	3.1	1.4
	0.4	15.7	49.9	24.4	8.0	1.1	0.6	0.0
Gauteng	3.1	17.4	24.6	21.4	16.1	13.5	3.1	0.7
	0.3	8.9	29.4	22.2	17.8	10.8	6.5	4.1
	0.1	13.2	37.7	23.3	12.1	8.1	3.6	2.0
Kwazulu-Natal	5.7	38.3	29.6	14.5	5.1	5.1	1.3	0.4
	0.3	15.6	38.3	20.6	13.7	6.0	3.5	1.9
	0.1	16.1	44.7	25.7	8.4	3.6	1.2	0.3
Limpopo	9.6	51	28.2	8.6	1.7	0.9	0	0
	1.9	22.0	42.1	18.4	9.0	3.9	2.1	0.6
	0.7	20.2	50.5	21.1	5.9	1.3	0.1	0.1
Mpumalanga	5.4	38.4	34.9	13.9	4.2	2.3	0.5	0.3
	1.0	15.0	38.2	20.0	14.5	8.7	1.9	0.7
	0.4	15.4	41.8	24.3	10.5	5.3	1.9	0.3
Northern Cape	4.6	32.5	31.7	16.5	6.2	5.7	2	0.7
	0.3	12.5	37.5	24.5	15.3	7.7	0.6	1.6
	0.6	11.5	43.5	27.8	8.4	4.2	3.3	0.8
North West	3.6	34.5	30.2	15.3	6	6.7	2.3	1.3
	1.2	14.2	38.9	20.3	14.7	7.0	2.4	1.4
	0.1	13.2	41.9	27.2	10.7	5.0	1.7	0.1
Western Cape	0.9	14.1	23.4	26.2	14.1	13.3	4.6	3.2
	0.0	2.7	12.3	17.7	20.0	17.9	17.0	12.4
	0.2	10.3	36.0	27.1	14.8	9.6	2.0	0.0
South Africa	5.5	34.7	29	15.4	7.1	5.9	1.9	0.6
	0.8	14.1	35.1	20.3	14.8	7.7	4.6	2.6
	0.3	15.3	43.6	24.1	9.9	4.5	1.7	0.6

Table 33. Learners Mathematics levels

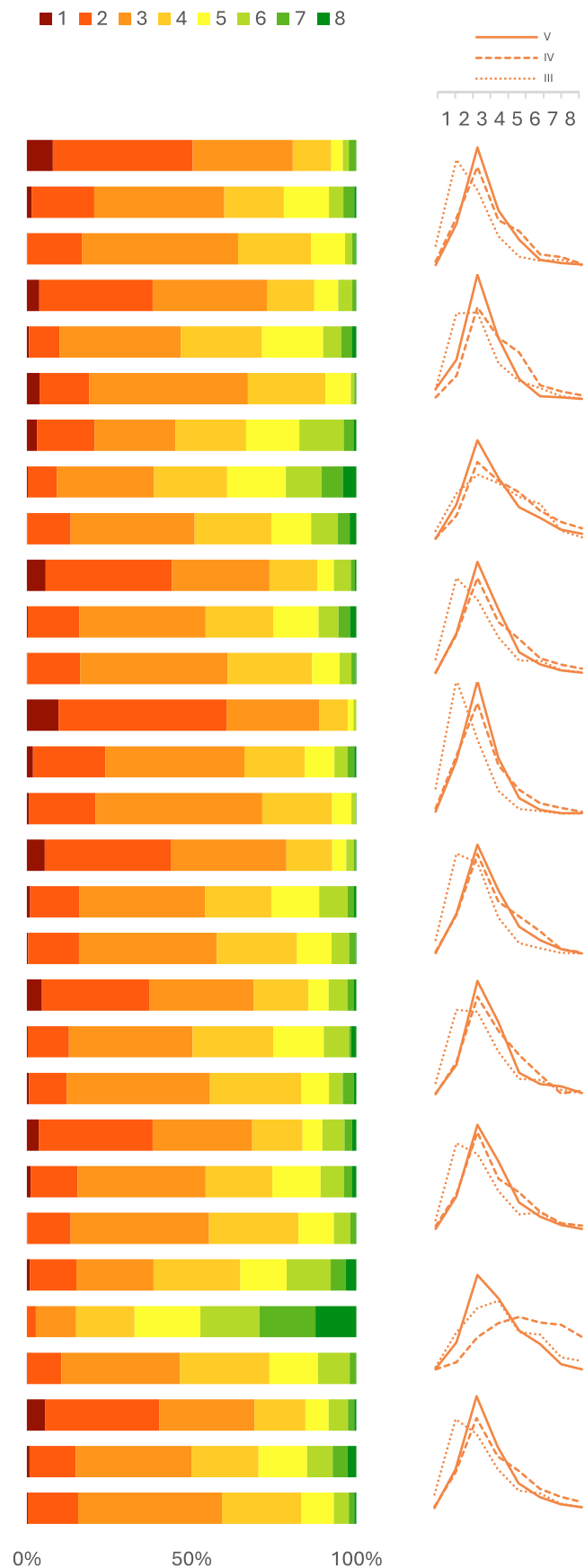


Figure 46: Learners Mathematics levels

Table 33 and Figure 46 show that in all provinces except WC and GP, the largest proportion of learners with Mathematics competency was at level 2 during SEACMEQ III, and the largest proportion moved to level 3. In Gauteng, the largest proportion of learners was competent to level 3 consistently whilst there has been a decreasing proportion in higher levels in each concurrent SEACMEQ. In the WC, the largest proportion of competency was initially (SEACMEQ III) at level 3, then moved to level 5 for (SEACMEQ IV) and is currently (SEACMEQ V) at level 3. The implications highlight uneven progress in Mathematics competency across provinces, with most improving from level 2 to level 3, while Gauteng and the Western Cape show inconsistent trends, including a decline in higher-level competencies over successive SEACMEQ assessments.

4.7 Learners classified as ‘non-readers’, ‘basic readers’, and ‘advanced readers’

This section presents the overview of the levels and distribution of Learners Identified as ‘Non-Readers’ in SEACMEQ III, SEACMEQ IV, and SEACMEQ V. Additionally, data regarding the percentage of Grade 6 learners classified as non-readers, specifically those who fall into levels 1 and 2, is broken down by province.

Table 34 below shows the percentage of Grade 6 learners who fall into levels 1 and 2 that are considered Non-readers per Province.

Reading Classification by %			
Province	Non-Reader	Basic	Advanced
	III	III	III
	IV	IV	IV
	V	V	V
Eastern Cape	38.6	52.2	9.3
	15.7	60.4	23.9
	13.1	73.8	13.0
Free State	22.3	54.4	23.2
	5.3	57.1	37.6
	11.4	73.4	15.2
Gauteng	11.6	33.3	55.1
	4.4	41.5	54.0
	9.5	53.0	37.7
Kwazulu-Natal	28.4	49.7	22.1
	9.5	59.4	31.1
	18.1	63.4	18.6
Limpopo	49.0	45.3	5.7
	16.5	66.3	17.2
	20.9	64.1	15.1
Mpumalanga	28.4	55.1	16.5
	5.6	61.8	32.6
	14.0	60.0	26.2
Northern Cape	21.4	50.0	28.6
	7.1	55.9	37.1
	9.3	66.5	24.2
North West	21.9	49.1	28.9
	7.0	67.2	25.8
	11.2	64.2	24.6
Western Cape	5.1	37.8	57.1
	1.7	25.6	72.7
	7.3	57.0	35.8
South Africa	27.2	46.4	26.4
	8.9	55.0	36.1
	13.8	62.8	23.5

Table 34. Learners Reading Classification

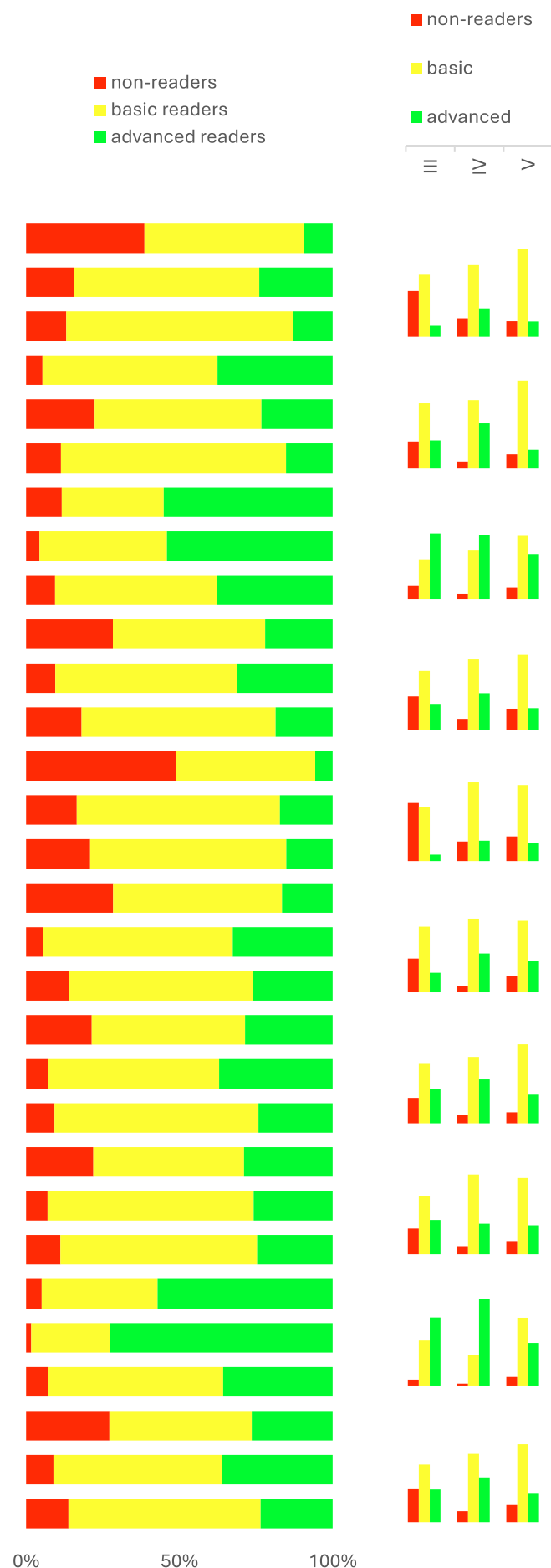


Figure 47: Learners Reading Classification

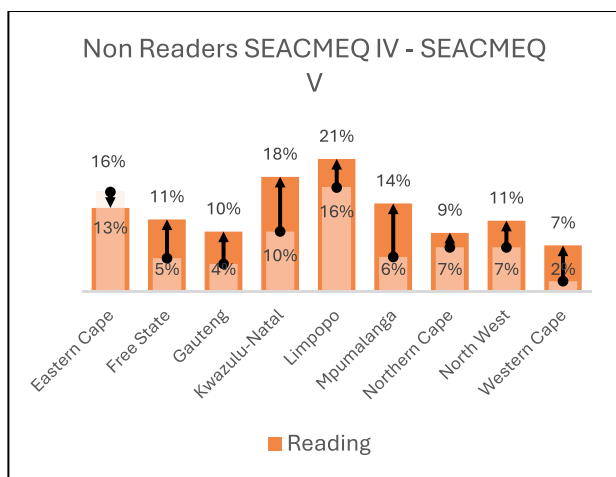


Figure 48: Shows the learners' who are classified as non-readers per province and the difference from the previous SEACMEQ

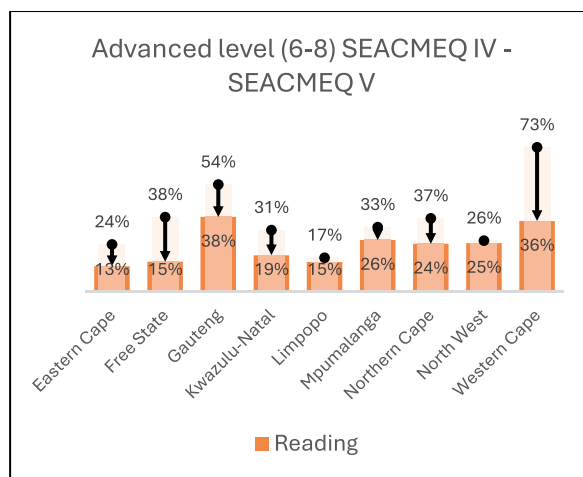


Figure 49: Shows the learners' who are classified as advanced readers per province and the difference from the previous SEACMEQ

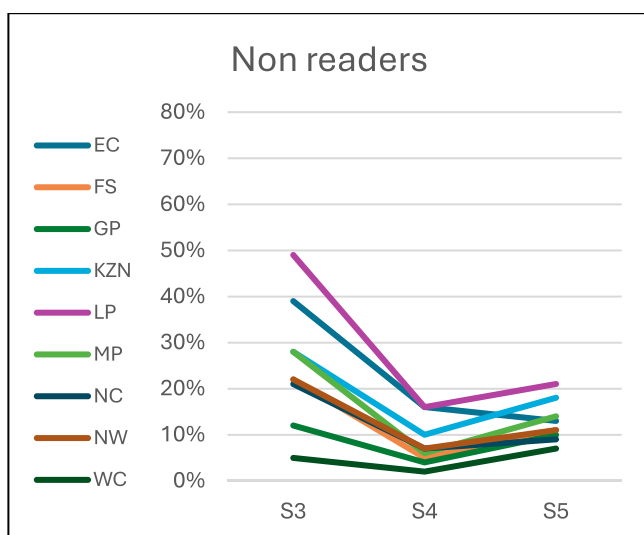


Figure 50: Shows the learners' who are classified as non-readers per province and the difference from the previous SEACMEQ

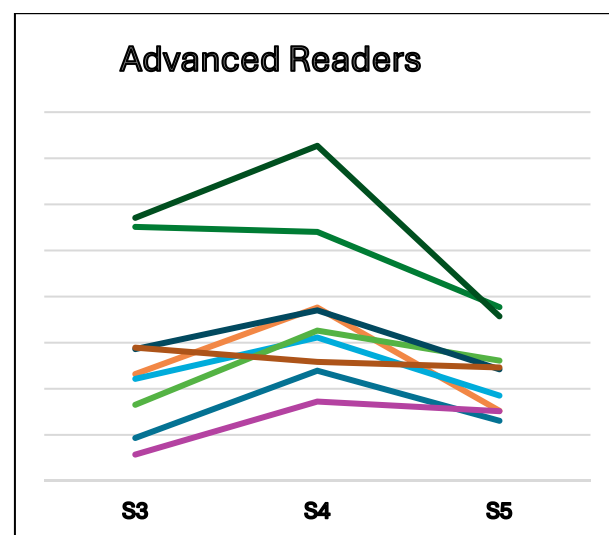


Figure 51: Shows the learners' who are classified as Advanced reading skills per province and the difference from previous SEACMEQ

The data in Table 34 and Figure 47 to 51 highlight shifts in learners' reading classifications across provinces and SEACMEQ cycles (III, IV, and V), revealing trends in literacy development. Nationally, there has been a decline in the percentage of non-readers, from 27.2% in SEACMEQ III to 13.8% in SEACMEQ V, indicating progress in addressing basic literacy. However, this improvement is uneven across provinces. For example, Limpopo and the Eastern Cape, which had the highest percentages of non-readers in SEACMEQ III (49.0% and 38.6%, respectively), show significant reductions but still lag behind more developed provinces like Gauteng and the Western Cape.

In terms of advanced reading skills, provinces like Gauteng and the Western Cape consistently perform better, maintaining high percentages of learners classified as advanced readers across all cycles.

Notably, the Western Cape had a peak in SEACMEQ IV with 72.7% advanced readers but declined to 35.8% in SEACMEQ V, suggesting possible regression or inconsistencies in sustaining literacy gains. Similarly, Gauteng's proportion of advanced readers decreased from 55.1% in SEACMEQ III to 37.7% in SEACMEQ V, despite starting from a stronger baseline.

Other provinces like the Free State and Northern Cape show steady improvements in reducing non-readers and increasing basic readers, with notable gains in advanced reading percentages. However, the data also highlights that several provinces struggle to move learners from basic to advanced reading classifications, reflecting disparities in literacy development that align with broader socio-economic and resource-based inequalities across the country. These trends underline the need for targeted interventions to sustain gains in literacy and address the barriers to achieving advanced reading proficiency nationwide.

4.8 Learners classified as 'non-numerate', 'basic numerate', and 'advanced numerate'

This section examines the levels and distribution of Grade 6 learners across three numeracy classifications 'Non-Numerate,' 'Basic Numerate,' and 'Advanced Numerate'—as measured in SEACMEQ III, IV, and V. The analysis focuses on the percentage of learners categorised as Non-Numerate (levels 1 and 2), providing a provincial breakdown to highlight disparities in foundational numeracy skills. The data offers insights into trends over time, revealing both progress and persistent challenges in achieving numeracy competence across South Africa's provinces.

Mathematics Levels by %			
Province	Non-Numerate	Basic	Advanced
	III	III	III
	IV	IV	IV
	V	V	V
Eastern Cape	50.3	45.5	4.1
	20.5	71.3	8.3
	16.7	79.7	3.4
Free State	38.1	56.3	5.5
	9.9	80.0	10.0
	19.7	82.3	1.7
Gauteng	20.5	62.1	17.3
	9.2	69.4	21.4
	13.3	73.1	13.7
Kwazulu-Natal	44.0	49.2	6.8
	15.9	72.6	11.4
	16.2	78.8	5.1
Limpopo	60.6	38.5	0.9
	23.9	69.5	6.6
	20.9	77.5	1.5
Mpumalanga	43.8	53.0	3.1
	16.0	72.7	11.3
	15.8	76.6	7.5
Northern Cape	37.1	54.4	8.4
	12.8	77.3	9.9
	12.1	79.7	8.3
North West	38.1	51.5	10.3
	15.4	73.9	10.8
	13.3	79.8	6.8
Western Cape	15.0	63.7	21.1
	2.7	50.0	47.3
	10.5	77.9	11.6
South Africa	40.2	51.5	8.4
	14.9	70.2	14.9
	15.6	77.6	6.8

Table 35. Learners Mathematics Classification

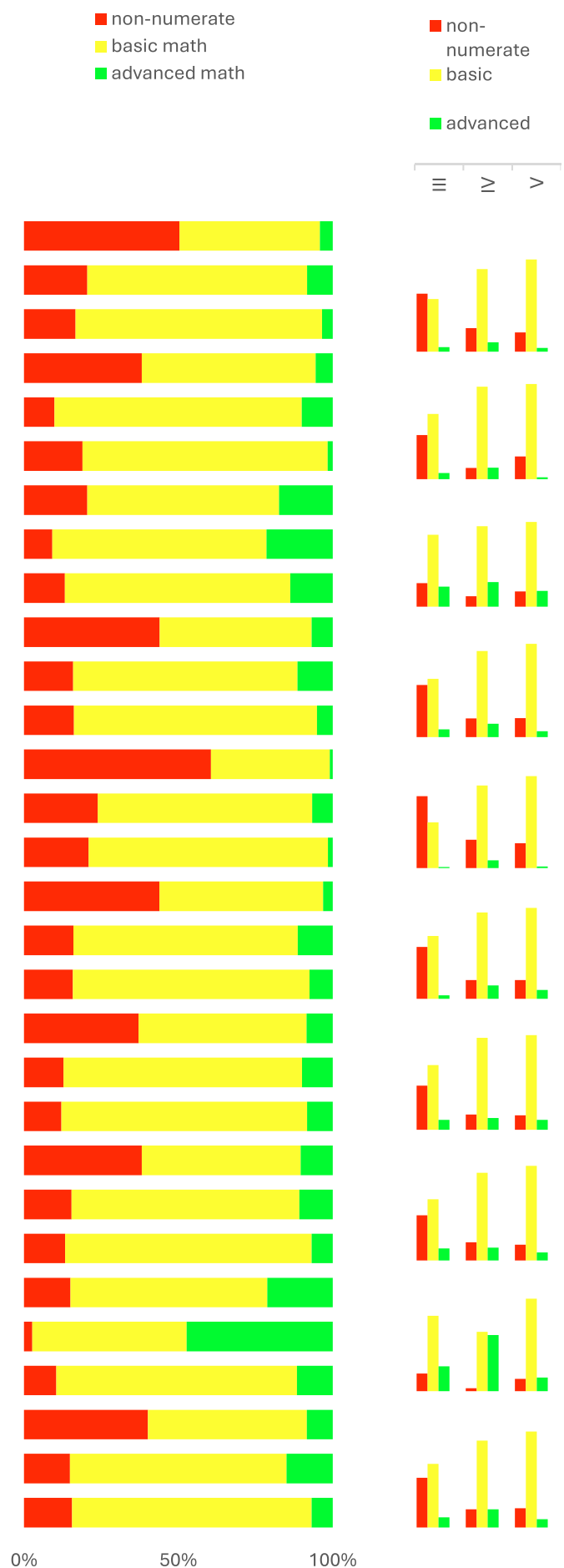


Figure 52: Learners Mathematics Classification

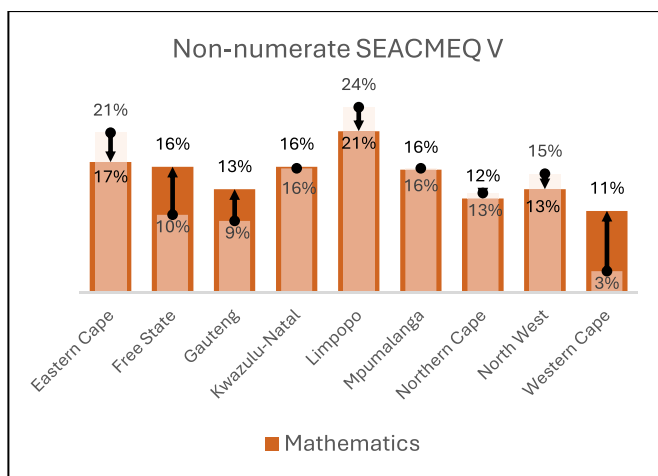


Figure 53: Shows the learners' who are classified as non-numerate per province and the difference from the previous SEACMEQ

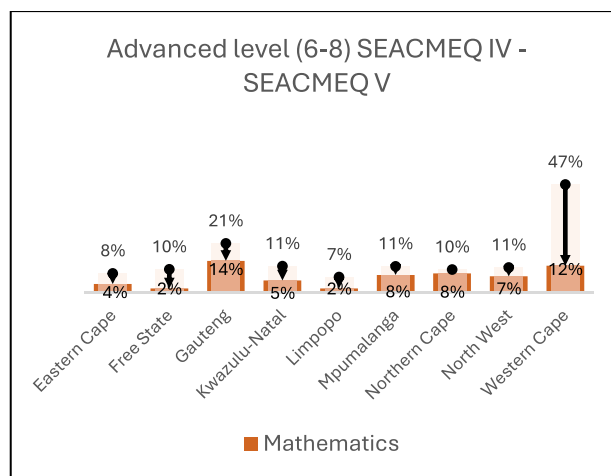


Figure 54: Shows the learners' who are classified as advanced Mathematics per province and the difference from previous SEACMEQ

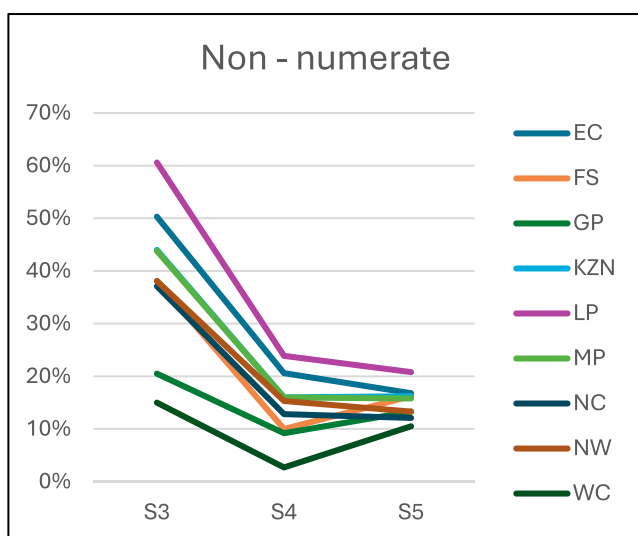


Figure 55: Shows the learners' who are classified as non-enumerate per province and the difference from the previous SEACMEQ

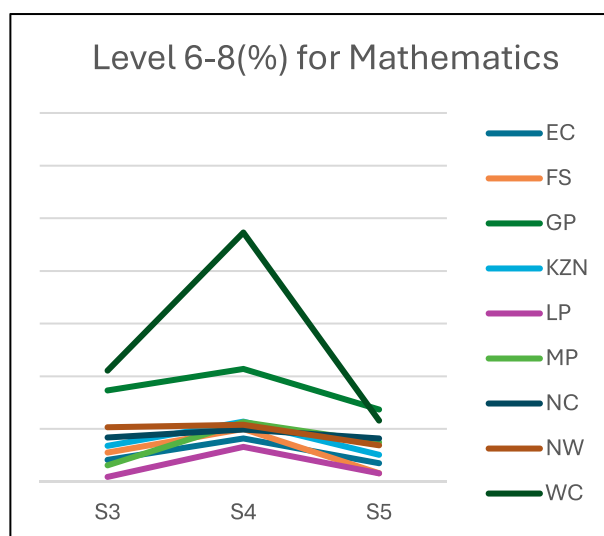


Figure 56: Shows the learners' who are classified as Advanced Mathematics skills per province and the difference from previous SEACMEQ

Table 35 and Figures 52 to 56 present the learners' mathematics classification data for SEACMEQ III, IV, and V. The data reveal trends in the proportion of Grade 6 learners categorised as Non-Numerate, Basic Numerate, and Advanced Numerate across South African provinces. Nationally, the percentage of Non-Numerate learners decreased from 40.2% in SEACMEQ III to 15.6% in SEACMEQ V, reflecting progress in foundational numeracy skills. However, there was also a decline in the proportion of Advanced Numerate

learners, dropping from 14.9% in SEACMEQ IV to 6.8% in SEACMEQ V, indicating challenges in cultivating higher-order numeracy competencies.

Provincially, the Western Cape consistently performs best, with the lowest percentage of Non-Numerate learners and a relatively high proportion of Advanced Numerate learners, though the latter dropped significantly between SEACMEQ IV (47.3%) and V (11.6%). Gauteng also shows strong performance, with a steady decrease in Non-Numerate learners and moderate retention of Advanced Numerate learners. Eastern Cape and Limpopo, while reducing Non-Numerate percentages, have persistently low Advanced Numerate rates, with Limpopo registering only 1.5% in SEACMEQ V.

Provinces such as KwaZulu-Natal, Mpumalanga, and North West show improvements in reducing Non-Numerate learners, yet they struggle to elevate more learners to Advanced Numerate levels. The Free State, while achieving a low Non-Numerate rate, recorded a sharp decline in Advanced Numerate learners from 10% in SEACMEQ IV to 1.7% in SEACMEQ V.

4.10 Teacher reading competency levels by Province

This section provides an analysis of the percentages of teachers in each province who attained different levels of reading competency across SEACMEQ III, SEACMEQ IV, and SEACMEQ V. Data for SEACMEQ III and SEACMEQ V specifically detail the distribution of teachers' reading skills at various competency levels, allowing for a comparative view over time. By presenting these metrics for each province, this analysis highlights trends in teacher reading proficiency, helping to identify both advancements in literacy skills among educators and regions where further support may be needed.

The percentages of teachers who achieved various levels of Reading competency in SEACMEQ III (top part) and SEACMEQ V (bottom part) are shown in Table 36.

Reading Levels by %								
Province	1	2	3	4	5	6	7	8
	III	III	III	III	III	III	III	III
	IV	IV	IV	IV	IV	IV	IV	IV
	V	V	V	V	V	V	V	V
Eastern Cape	0.0	0.0	0.0	0.0	1.1	0.0	36.4	62.5
	0.0	0.0	0.0	1.8	2.0	14.0	30.2	52.0
	0.0	0.0	0.0	0.0	2.4	2.4	2.5	92.7
Free State	0.0	0.0	0.0	0.0	0.0	0.0	20.5	79.5
	0.0	0.0	0.0	0.0	0.0	15.8	20.2	64.0
	1.8	0.0	0.0	0.0	0.0	1.1	5.2	91.9
Gauteng	0.7	0.0	1.7	0.0	0.0	0.0	10.0	87.6
	0.0	0.0	0.0	2.2	0.0	7.4	23.9	66.5
	0.0	0.0	0.0	0.0	0.0	0.0	6.2	93.8
Kwazulu-Natal	0.0	0.0	0.0	2.7	0.0	2.3	8.7	86.2
	0	0	2	0.0	1.9	6.5	35.7	55.9
	0.0	0.0	0.0	0.0	0.0	3.6	22.4	73.9
Limpopo	0.0	0.0	0.0	0.0	0.0	2.0	11.0	87.1
	0.0	0.0	0.0	0.0	0.0	2.0	37.3	60.7
	0.0	0.0	0.0	0.0	0.0	1.2	0.0	98.8
Mpumalanga	0.0	0.0	0.0	0.0	0.0	0.0	37.8	62.2
	0.0	0.0	0.0	0.0	0.0	5.3	30.0	64.6
	0.0	0.0	0.0	0.0	0.0	0.0	0.0	100.0
Northern Cape	0.0	0.0	0.0	0.0	2.3	0.0	10.5	87.1
	0.0	0.0	0.0	0.0	0.0	9.2	16.7	74.1
	0.0	0.0	0.0	0.0	0.0	0.0	1.2	98.8
North West	0.0	0.0	0.0	0.0	0.0	0.0	19.4	80.6
	0.0	0.0	0.0	0.0	0.0	0.0	6.0	94.0
	2.7	0.0	0.0	0.0	0.0	0.0	0.0	97.3
Western Cape	0.0	0.0	0.0	0.0	0.0	0.0	6.1	93.9
	0.0	0.0	0.0	0.0	0.0	0.0	12.7	87.3
	0.0	0.0	0.0	0.0	0.0	2.1	0.0	97.9
South Africa	0.1	0.0	0.3	0.0	0.2	1.2	20.5	77.8
	0.0	0.0	0.5	0.6	0.8	6.7	27.8	64.0
	0.3	0.0	0.0	0.6	0.4	1.3	4.0	93.4

Table 36. Teachers Reading levels

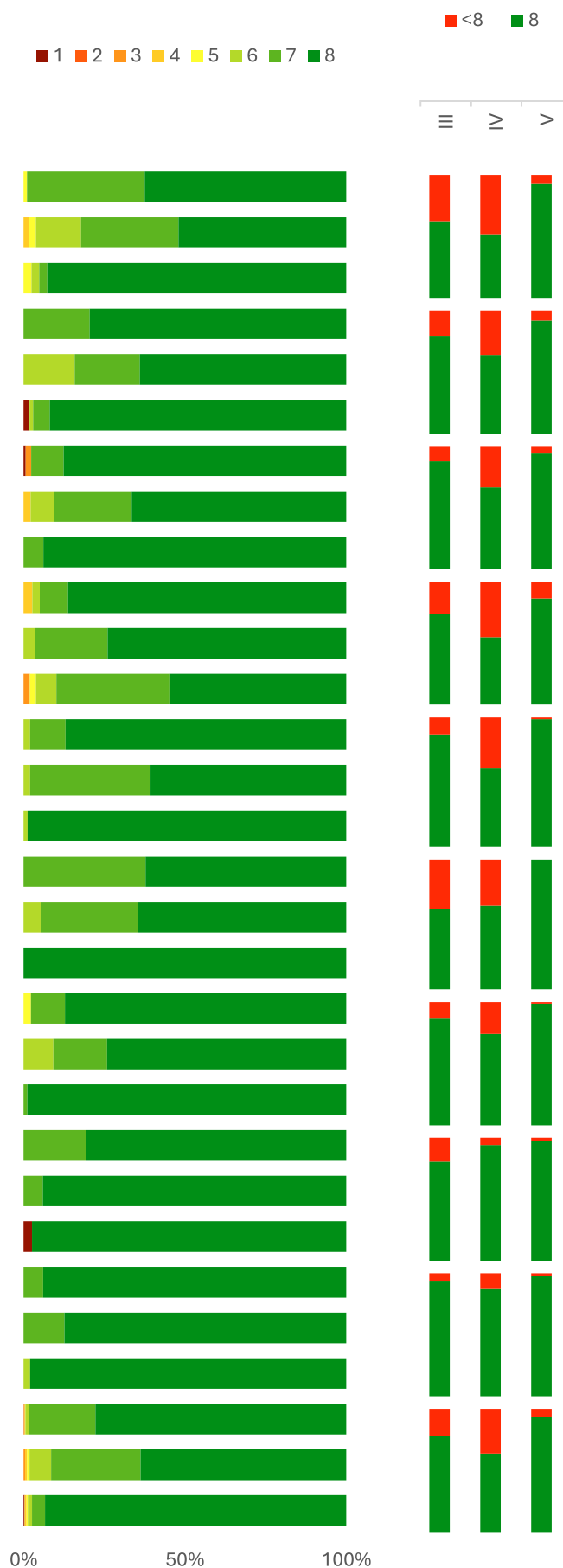


Figure 57: Teachers reading levels

The data in Table 36 and Figure 57 on teachers' reading proficiency levels from SEACMEQ III, IV, and V highlight significant progress in the higher proficiency levels (Levels 7 and 8) across all provinces. Nationally, the percentage of teachers at Level 8 rose from 77.8% in SEACMEQ III to 93.4% in SEACMEQ V, indicating a marked improvement in reading expertise among educators. Level 7 saw a consistent decline, as more teachers moved to the highest proficiency level, showing an overall upward shift in reading competence.

Provincially, the Western Cape and Northern Cape consistently reported the highest percentages of teachers at Level 8, reaching over 97% in SEACMEQ V. Similarly, Gauteng and Limpopo showed strong performances, with over 93% of teachers in Level 8 during SEACMEQ V. In contrast, provinces such as KwaZulu-Natal and Mpumalanga, while improving, still have a small proportion of teachers in intermediate levels, reflecting some room for further development.

4.11 Teacher mathematics competence levels by Province

This section presents data on the percentages of teachers in each province who attained different levels of Mathematics competency across the SEACMEQ III, SEACMEQ IV, and SEACMEQ V studies. By showcasing teacher performance in Mathematics over these assessment periods, the data reveals a shift in competency levels, highlighting trends in Mathematical proficiency among educators. These province-specific insights allow for a comprehensive comparison of skills development over time, helping identify provinces with strong gains as well as those where additional training and support in Mathematics instruction may be beneficial.

Table 37 shows the percentages of teachers who achieved various levels of Mathematics competency from SEACMEQ III to SEACMEQ V.

Mathematics Levels by %								
Province	1	2	3	4	5	6	7	8
	III	III	III	III	III	III	III	III
	IV	IV	IV	IV	IV	IV	IV	IV
	V	V	V	V	V	V	V	V
Eastern Cape	0.0	0.0	0.0	3.0	8.4	37.6	39.5	11.5
	0.0	0.0	0.0	0.0	4.7	22.9	39.5	32.9
	0.0	0.0	0.0	3.7	7.9	31.5	30.0	26.6
Free State	0.0	0.0	0.0	2.5	1.6	33.9	31.2	30.9
	0.0	0.0	0.0	0.0	13.8	17.7	31.2	37.3
	0.0	0.0	0.0	7.0	13.8	17.6	60.4	15.0
Gauteng	0.0	0.0	0.0	4.8	6.7	6.6	42.9	39.0
	0.0	0.0	0.0	3.4	9.9	7.7	16.2	62.8
	7.8	0.0	3.0	3.3	0.0	17.6	29.4	39.0
Kwazulu-Natal	0.0	0.0	0.7	4.5	11.6	21.1	29.5	32.5
	0.0	0.0	0.0	1.8	8.5	35.1	23.5	31.1
	0.0	0.0	0.0	5.2	0.0	13.9	31.4	49.5
Limpopo	0.0	0.0	0.0	3.0	8.1	22.2	50.6	16.2
	0.0	0.0	0.0	3.1	5.5	26.0	47.5	18.0
	0.0	0.0	5.6	0.0	16.0	43.2	19.1	16.0
Mpumalanga	0.0	0.0	0.0	2.9	26.4	31.5	34.8	4.5
	0.0	0.0	0.0	0.0	0.0	14.3	56.3	29.4
	0.0	0.0	0.0	0.0	9.5	5.4	61.7	23.4
Northern Cape	0.0	0.0	0.0	0.0	6.7	15.6	40.1	37.6
	0.0	0.0	4.9	0.0	0.0	24.5	29.0	41.6
	0.0	0.0	0.0	6.3	12.8	18.9	16.9	45.2
North West	0.0	0.0	0.0	0.0	11.2	23.9	30.2	34.7
	0.0	0.0	0.0	0.0	17.3	32.5	39.8	10.3
	0.0	0.0	0.0	16.5	9.6	18.8	27.0	28.0
Western Cape	0.0	0.0	0.0	0.0	2.1	5.4	33.5	59.0
	0.0	0.0	0.0	0.0	4.0	16.5	14.8	64.7
	0.0	0.0	6.7	6.5	23.8	3.0	46.2	13.7
South Africa	0.0	0.0	0.2	3.2	9.8	21.8	37.2	27.8
	0.0	0.0	0.0	1.4	7.2	23.4	32.4	35.4
	1.4	0.0	1.6	4.3	6.2	19.5	34.8	32.2

Table 37. Teachers Mathematics levels

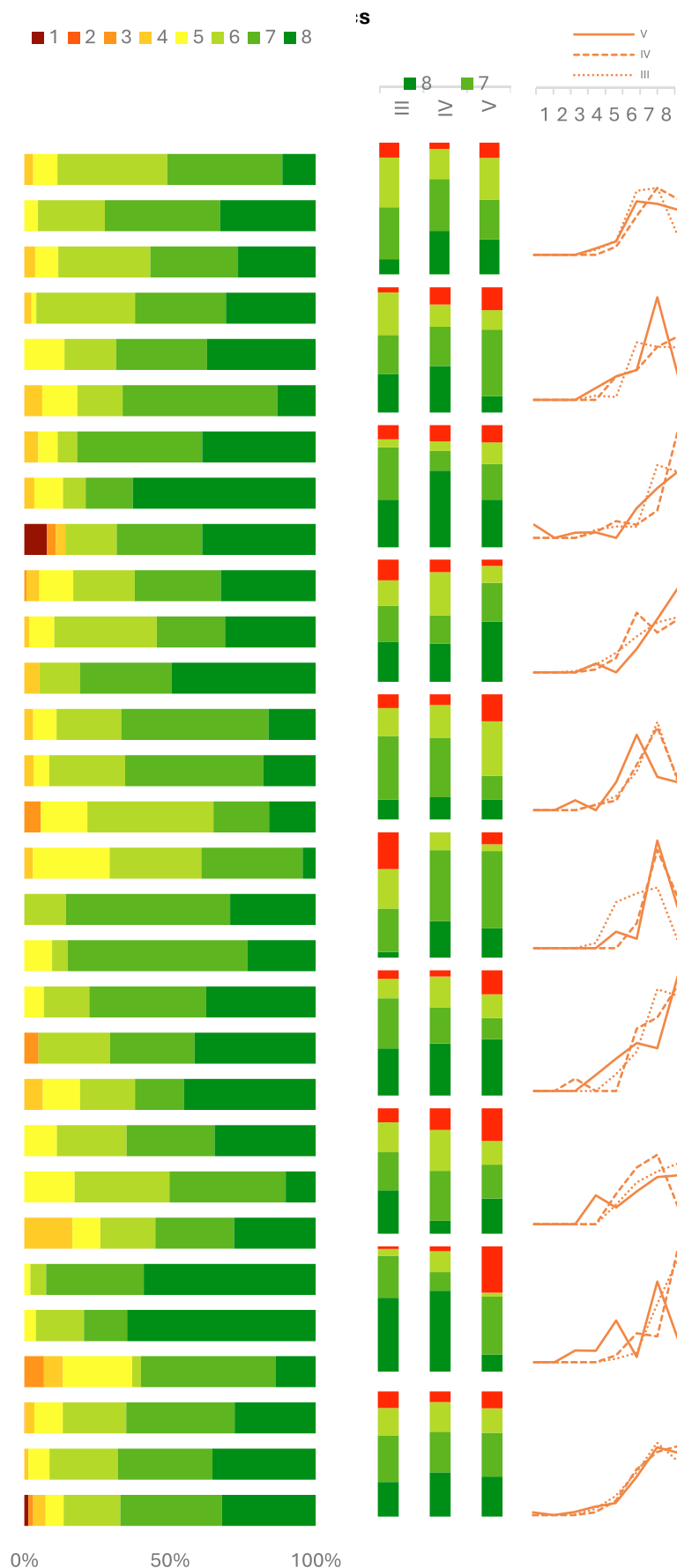


Figure 58: Teachers Mathematics levels

Table 37 and Figure 58 analyse teachers' mathematics proficiency levels from SEACMEQ III, IV, and V. The data reveals steady improvement, particularly in the higher proficiency levels (Levels 7 and 8). Nationally, the percentage of teachers in Level 8 increased from 27.8% in SEACMEQ III to 32.2% in SEACMEQ V, while Level 7 showed relatively stable representation, reflecting growth in advanced mathematics understanding.

Provincially, the Western Cape consistently recorded the highest percentage of teachers at Level 8, peaking at 64.7% in SEACMEQ IV, although this dropped slightly in SEACMEQ V. Similarly, Gauteng demonstrated notable advancement, with 62.8% of teachers at Level 8 in SEACMEQ IV. Other provinces, such as Limpopo and Mpumalanga, showed variability in their Level 8 percentages across the assessments, indicating areas where sustained support is necessary to consolidate gains.

Lower proficiency levels (Levels 1–4) were nearly absent, suggesting that most teachers possess at least basic competency in mathematics. However, intermediate levels (Levels 5 and 6) remain prominent in several provinces, such as KwaZulu-Natal and North West, signaling ongoing opportunities for professional development.

4.12 Reading and Mathematics achievement levels of subgroups

This section examines the Reading and Mathematics achievement levels among key subgroups of Grade 6 learners, focusing on gender, school location (urban or rural), and socioeconomic status (SES). The achievement scores from SEACMEQ III, SEACMEQ IV, and SEACMEQ V assessments are presented for each subgroup, providing a breakdown of average scores in both Reading and Mathematics. By comparing the mean test scores within these subgroups across multiple study cycles, this data offers valuable insights into how learner performance varies by demographic and contextual factors, highlighting any persistent gaps or improvements across gender, geographic location, and SES in foundational literacy and numeracy skills.

In Table 38 the achievement scores of Grade 6 learners in the Reading and Mathematics tests in SEACMEQ III, SEACMEQ IV, and SEACMEQ V have been presented according to their gender, school location, and SES.

Table 38. Learner Reading per sub-groups

Subgroup	Reading
	Mean
	IV V
Boys	528.2
	492.1
Girls	548.7
	518.3
Rural	490.9
	479.9
Urban	585.8
	529.6
Low SES*	511.7
	486.4
High SES*	569.3
	523.0
South Africa	538.3
	505.4

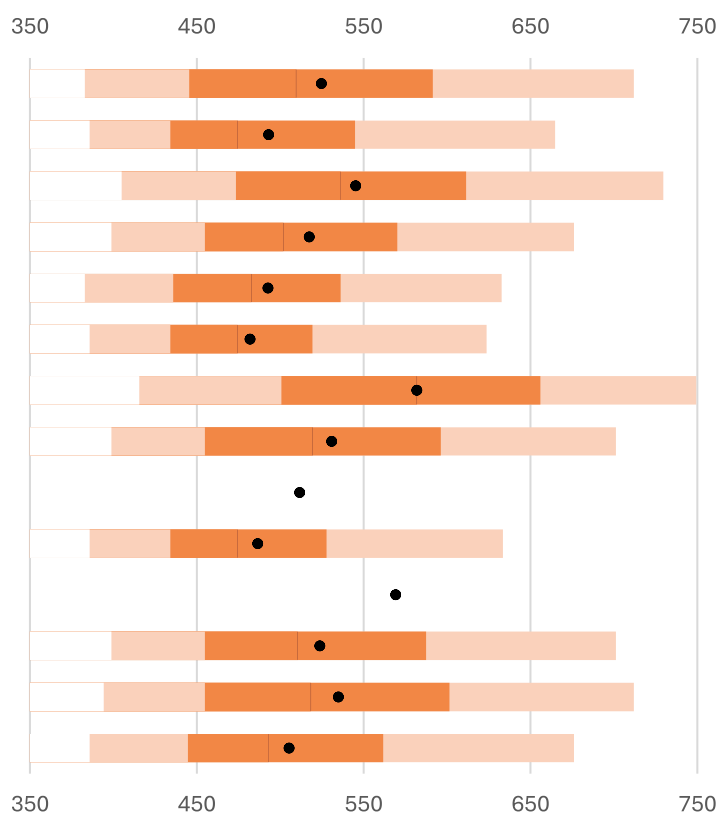


Figure 59: Learners Reading mean per subgroup

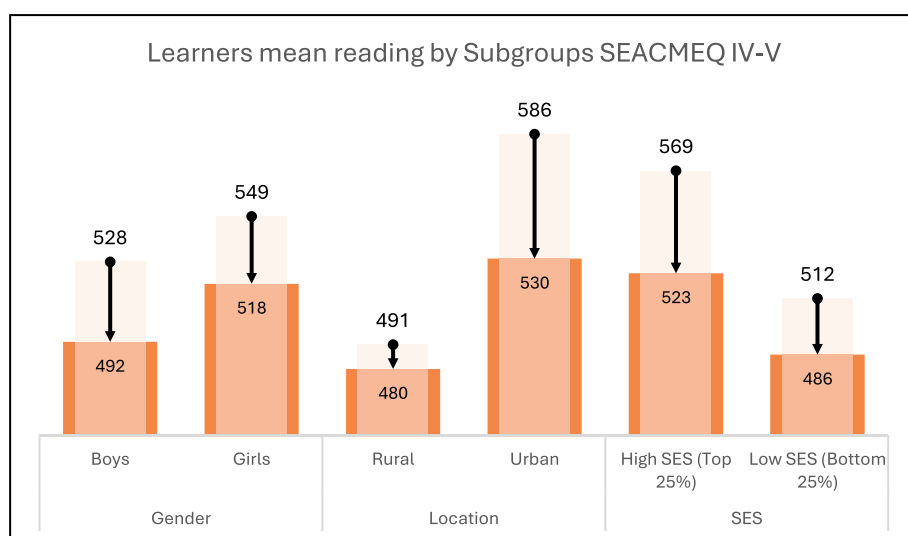


Figure 60: Learners Reading mean shift by subgroup

Table 38 and Figures 59 and 60 provide an analysis of learner reading performance across subgroups in SEACMEQ IV and V. The data shows persistent disparities influenced by gender, location, and socioeconomic status (SES). Girls consistently outperform boys, with a mean score difference of approximately 20 points in both assessments, highlighting gender-based differences in reading achievement. Urban learners exhibit significantly higher mean scores than their rural counterparts, reflecting an urban-rural divide in access to quality education and resources. In SEACMEQ V, urban learners scored 529.6 compared to 479.9 for rural learners, a gap of nearly 50 points.

Socioeconomic status also plays a critical role, with high-SES learners scoring higher than low-SES learners in both assessments. In SEACMEQ V, the mean score for high-SES learners (523.0) exceeded that of low-SES learners (486.4) by over 36 points. These patterns emphasize the impact of socioeconomic and geographical inequalities on reading outcomes. Nationally, South Africa's mean reading scores dropped from 538.3 in SEACMEQ IV to 505.4 in SEACMEQ V, suggesting a need for targeted interventions to address these disparities and reverse the overall decline in reading proficiency.

Table 39. Learner mean Reading by sub groups

Per Subgroup	Reading
	Mean
	V
Rural - Boy - High SES	510.3
Rural - Boy - Low SES	464.1
Rural - Girl - High SES	503.2
Rural - Girl - Low SES	488.9
Urban - Boy - High SES	543.3
Urban - Boy - Low SES	489.1
Urban - Girl - High SES	557.9
Urban - Girl - Low SES	514.6
South Africa	505.4

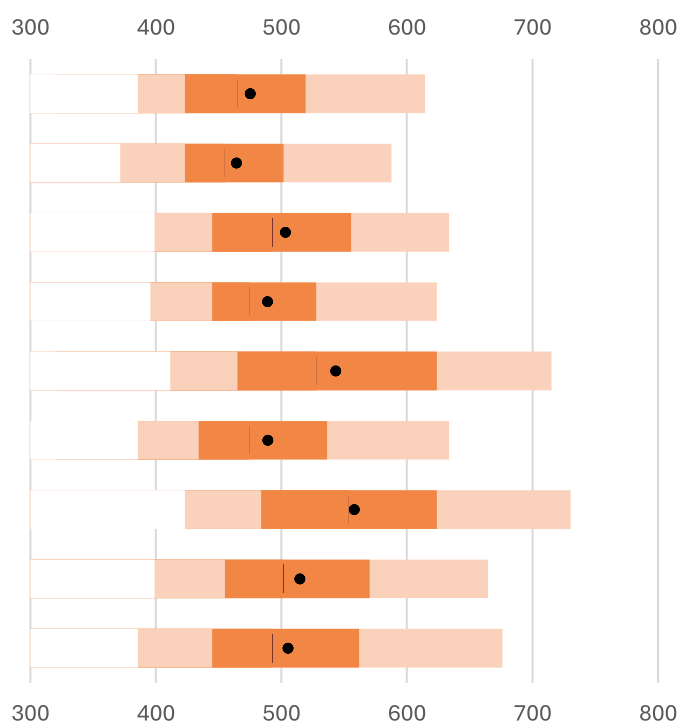


Figure 61: Learners Reading mean by subgroup

Table 39 and Figure 61 presents the mean reading scores by subgroup in SEACMEQ V. The data highlight significant disparities based on gender, location, and socioeconomic status (SES). Across all groups, high-SES learners outperform their low-SES peers, with the largest gaps evident in urban settings. Urban boys from high-SES backgrounds scored 543.3, compared to 489.1 for low-SES urban boys, a difference

of 54.2 points. Similarly, urban girls from high-SES backgrounds scored 557.9, significantly higher than their low-SES counterparts at 514.6.

Gender differences are also notable. Among rural learners, boys from high-SES backgrounds scored slightly higher (510.3) than girls (503.2), but among low-SES rural learners, girls scored higher (488.9) than boys (464.1). This suggests that gender and SES interact differently in rural settings, with girls showing resilience in low-SES contexts.

The national mean score of 505.4 indicates that urban, high-SES learners drive overall higher performance, masking the challenges faced by rural and low-SES learners.

Table 40. Learner mean Mathematics per sub-groups

Subgroup	Math
	Mean
	IV V
Boys	546.2
	523.7
Girls	550.3
	527.1
Rural	513.0
	510.6
Urban	587.3
	541.8
Low SES*	526.8
	512.1
High SES*	580.1
	538.3
South Africa	548.3
	525.5

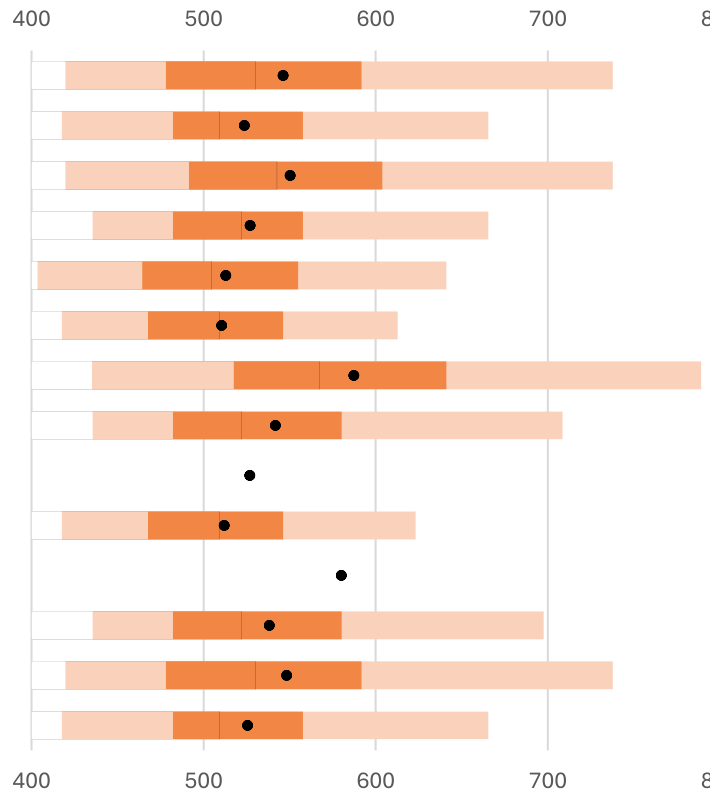


Figure 62: Learners Mathematics mean per subgroup

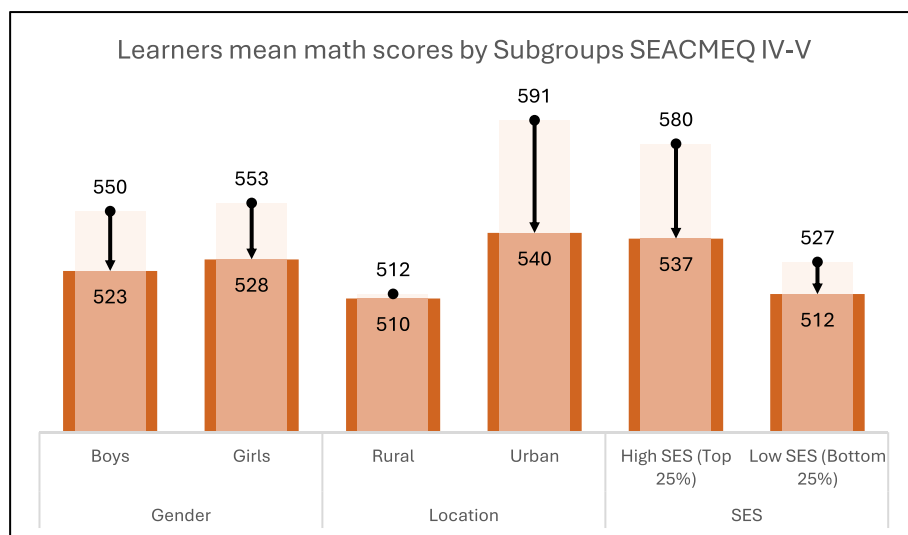


Figure 63: Learners Mathematics mean shift by subgroup

The mean of learner mathematics scores by subgroup in SEACMEQ V presented above in Table 40 and Figures 62 and 63 reflect similar trends to those seen in reading scores, with significant variations based on gender, location, and socioeconomic status (SES). Girls outperform boys overall, with a mean score of 550.3, compared to 546.2 for boys. However, the difference is relatively small compared to other subgroup distinctions. Location plays a more prominent role, with urban learners scoring substantially higher than their rural counterparts. Urban learners achieved a mean score of 587.3, compared to 513.0 for rural learners, indicating a gap of 74.3 points. This urban-rural divide is also evident in gender-specific scores, as urban boys (587.3) outperformed rural boys (523.7), and urban girls (541.8) outperformed rural girls (510.6). Socioeconomic status also plays a crucial role, with high-SES learners achieving a mean score of 580.1, well above the 526.8 mean score for low-SES learners, highlighting the disparity in access to resources and educational opportunities. The national mean of 548.3 reflects the overall trend, with high-SES and urban learners driving the higher scores.

Table 41. Learner mean for Mathematics by sub groups

Per Subgroup	Math
	Mean
	IV
	V
Rural - Boy - High SES	510.3
Rural - Boy - Low SES	505.8
Rural - Girl - High SES	516.0
Rural - Girl - Low SES	511.4
Urban - Boy - High SES	560.4
Urban - Boy - Low SES	516.0
Urban - Girl - High SES	556.4
Urban - Girl - Low SES	518.7
South Africa	525.5

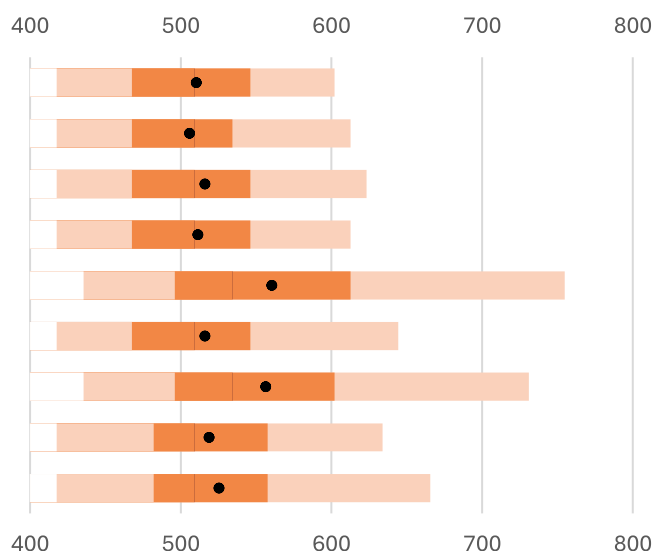


Figure 64: Learners Mathematics mean by subgroup

Table 41 and Figure 64 above present the data on the mean of learner mathematics scores by subgroups in SEACMEQ V which reveal noticeable disparities based on a combination of geographic location, gender, and socioeconomic status (SES). Rural boys, regardless of SES, have the lowest scores, with rural boys from high SES backgrounds achieving a mean score of 510.3, and those from low SES backgrounds scoring slightly lower at 505.8. Rural girls show a slightly higher performance, with high SES rural girls scoring a mean of 516.0, while their low SES counterparts achieve a score of 511.4. In contrast, urban learners, particularly those from high SES backgrounds, perform significantly better. Urban boys from high SES backgrounds score 560.4, and urban girls from high SES backgrounds score 556.4, showcasing the advantages of both gender and location. Even urban boys and girls from low SES backgrounds perform better than their rural peers, with low SES urban boys scoring 516.0 and low SES urban girls scoring 518.7. These results highlight the significant impact of urban versus rural location and high versus

low SES on learner performance in mathematics. The national average score of 525.5 reflects this overall trend, with urban, high-SES learners pulling the average upwards.

4.13 Reading and Mathematics scores by quintile and LOLT at home

This section presents an analysis of learners' reading and mathematics scores across different quintiles, with a particular focus on the frequency of the Language of Learning and Teaching (LoLT) used at home. It examines how the frequency with which learners are exposed to and use the LoLT whether most of the time, sometimes, all of the time, or never correlates with their academic performance in both reading and mathematics. The analysis is structured around quintiles, providing insights into how socioeconomic factors may influence language use at home and, consequently, learners' academic achievement. By exploring the relationship between LoLT frequency and academic performance, this section aims to highlight the significance of language exposure in shaping educational outcomes across diverse learner groups.

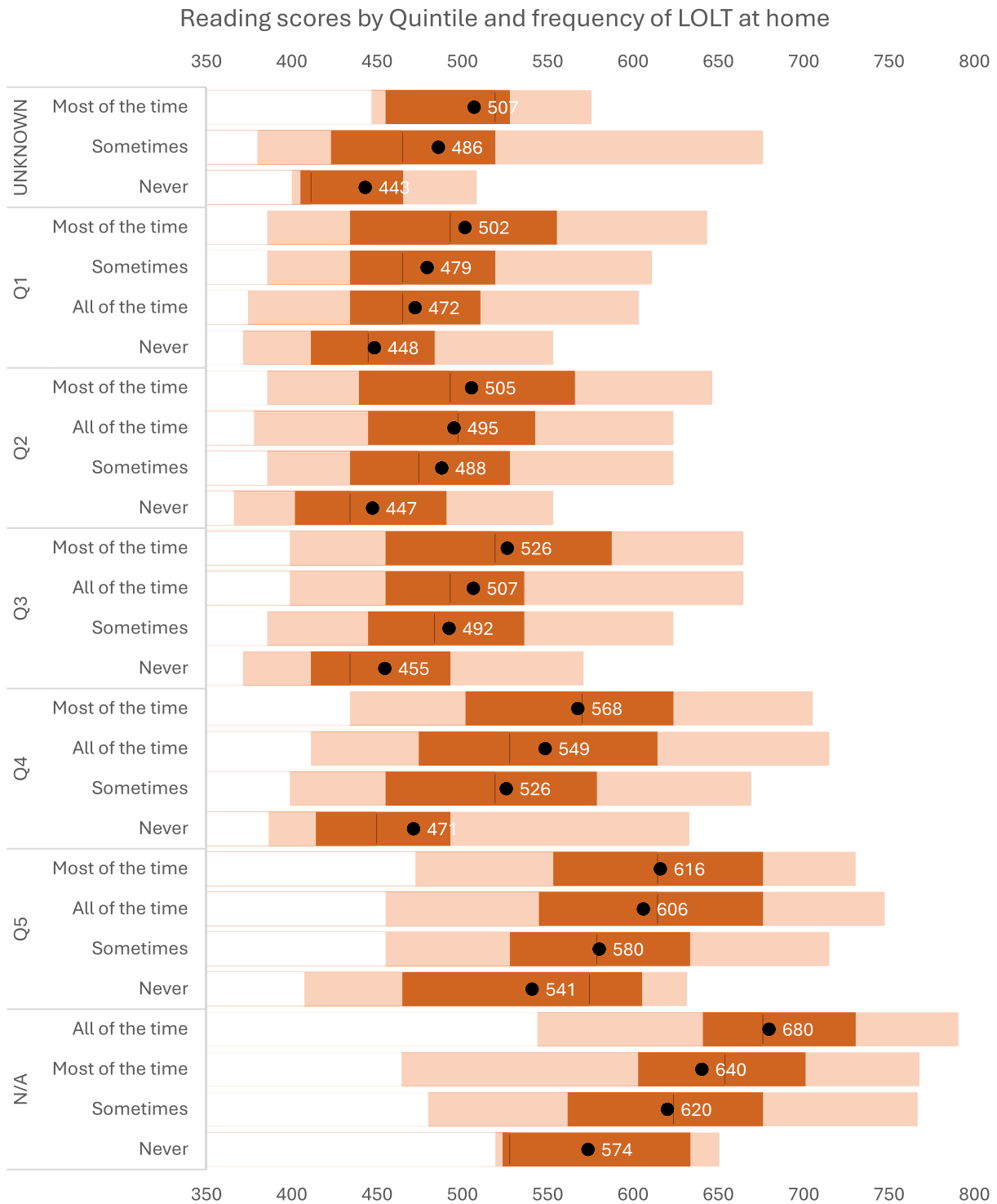


Figure 65: Reading scores by Quintile and frequency of LOLT at home

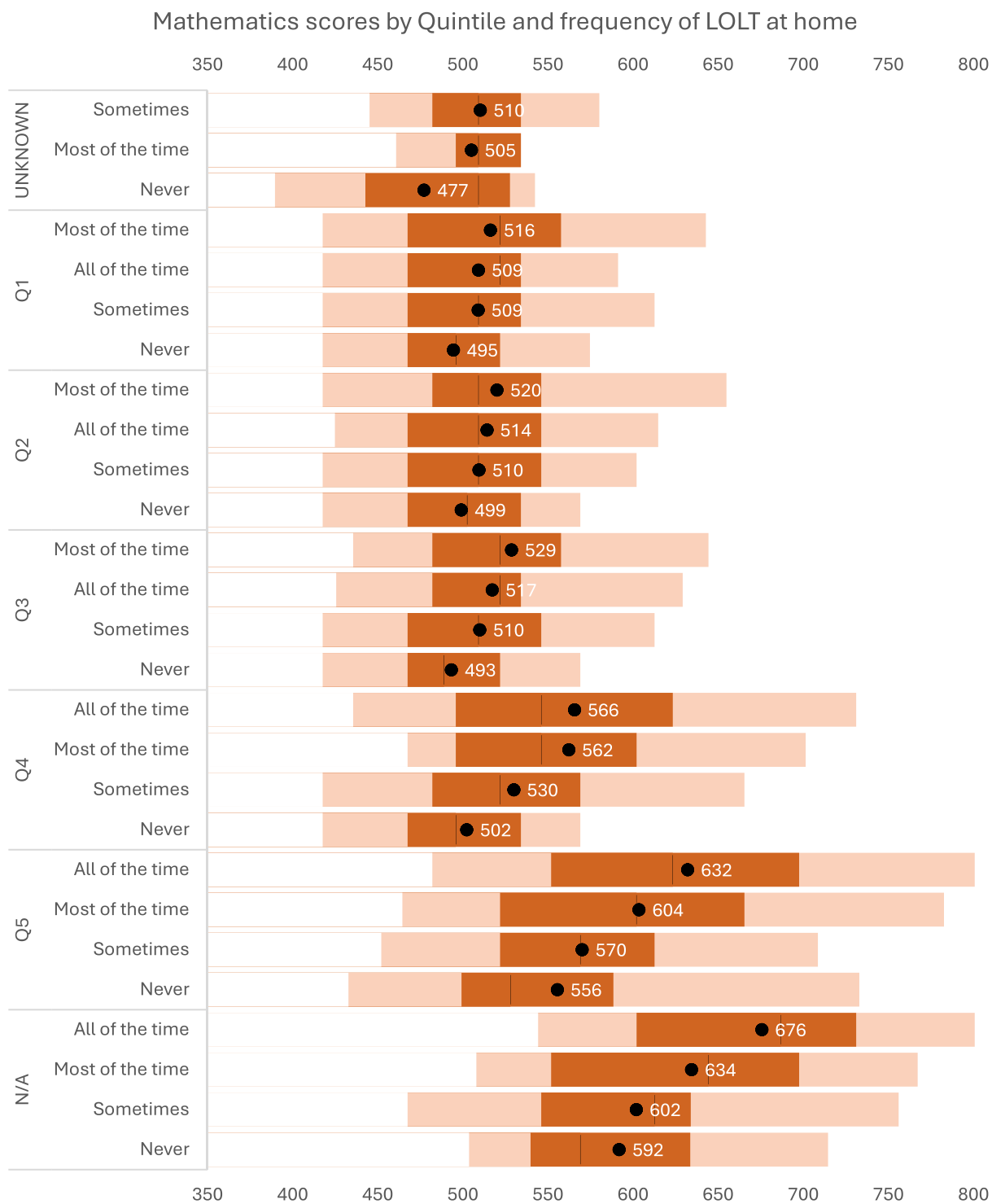


Figure 66: Mathematics scores by Quintile and frequency of LOLT at home

Figure 65 and Figure 66 analyse learner performance in Mathematics and Reading, with a focus on two key factors: the school's location (categorised by quintiles) and the frequency of using the Language of Learning and Teaching (LoLT). The results consistently demonstrate that learners who always speak the LoLT achieve significantly higher performance compared to their peers who never use the LoLT.

This performance gap is further evident across three distinct groups: learners who always speak the LoLT, those who occasionally use it, and those who never do. The analysis highlights a clear trend as the use of the LoLT decreases, so does academic performance. These disparities highlight the impact of language alignment between teaching and learning on learning outcomes. When learners are taught in a language different from their own, it creates barriers to understanding and engagement, ultimately influencing their ability to perform well in Mathematics and Reading. This finding emphasises the importance of language considerations in education policy and teaching strategies.

4.14 Learner reading competence levels by subgroups

This section provides data on the percentage of Grade 6 learners who achieved different levels of reading and mathematics competency across SEACMEQ III, SEACMEQ IV, and SEACMEQ V. The results are organised by subgroups, including gender, school location (urban or rural), and socioeconomic status (SES), allowing for a focused analysis of achievement patterns within these groups. The tables display percentages for each of the eight designated competency levels in reading and mathematics across the three study cycles. By presenting such detailed subgroup data, the analysis helps identify trends and disparities in literacy and numeracy skills among diverse learner demographics.

Table 42 presents the percentage of Grade 6 learners reaching various Reading competence levels in SEACMEQ III, SEACMEQ IV, and SEACMEQ V presented according to their gender, school location, and SES. The columns in the tables represent the eight competency levels for Reading respectively for the three studies.

Subgroups	Reading Levels by %							
	1	2	3	4	5	6	7	8
	III	III	III	III	III	III	III	III
	IV	IV	IV	IV	IV	IV	IV	IV
	V	V	V	V	V	V	V	V
Boys	11.2	19.9	22.1	14.3	9.6	8.5	8.9	5.4
	3.9	7.7	18.0	17.5	20.3	12.3	14.2	6.0
	3.9	13.6	25.7	22.0	15.7	8.9	7.9	2.3
Girls	8.7	14.8	20	15.1	11.7	10.6	11.4	7.7
	1.8	4.3	13.6	18.7	22.0	15.1	16.4	8.2
	2.3	7.9	17.8	22.8	21.6	13.4	11.3	2.9
Rural	15.3	25.8	27.5	16.2	7.7	3.5	2.5	1.5
	4.5	9.1	23.9	23.8	22.3	9.8	5.8	0.8
	4.3	14.0	26.2	24.8	17.9	8.2	4.5	0.2
Urban	4.6	8.8	14.6	13.2	13.6	15.6	17.9	11.7
	1.3	2.9	7.8	12.3	19.9	17.5	24.9	13.4
	2.0	7.6	17.5	20.1	19.5	14.0	14.5	4.8
Low SES	17.4	28.3	32.4	14.4	4.9	1.9	0.6	0.2
	3.6	7.2	19.1	21.7	22.6	13.1	10.5	2.2
	4.0	13.2	26.4	22.4	18.4	8.4	6.6	0.8
High SES	2.5	4.2	7.4	8.7	10.2	17.5	27.9	21.7
	1.8	4.1	11.7	14.4	20.0	14.9	20.8	12.2
	2.3	8.4	17.4	22.5	19.0	13.8	12.4	4.3
South Africa	9.9	17.3	21.1	14.7	10.6	9.6	10.2	6.6
	2.9	6.0	15.8	18.1	21.1	13.7	15.3	7.1
	3.1	10.7	21.7	22.4	18.7	11.2	9.6	2.6

Table 42. Learners Reading levels

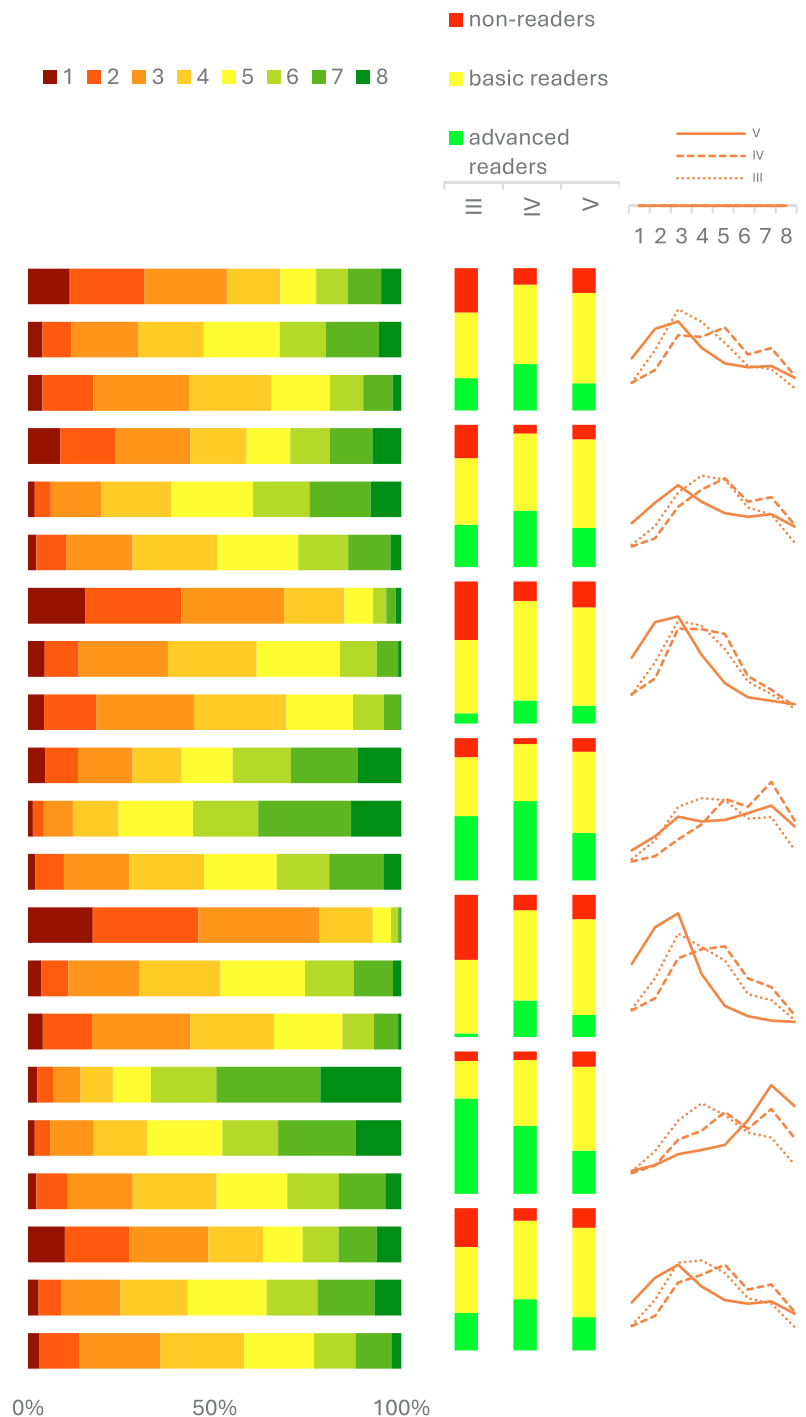


Figure 67: Reading Levels by subgroups

Nationally, the trends align with these patterns, with most learners falling in Levels 2-4, but the overall percentage of learners in Level 1 (9.9%) and higher levels (6.6% in Level 8) underscores the challenge of improving reading proficiency across all subgroups, particularly in rural and low SES communities.



4.15 Learners reaching various mathematics competence levels by subgroups

This section reports the percentages of Grade 6 learners achieving different levels of mathematics competency as assessed in SEACMEQ III, SEACMEQ IV, and SEACMEQ V, categorised by gender, school location (urban or rural), and socioeconomic status (SES). The tables are organised into columns representing the eight defined competency levels in mathematics for each of the three study cycles, offering a detailed view of learner performance within these demographic subgroups. This structure provides valuable insights into the progression or variation in mathematical skills among diverse groups, enabling an analysis of trends in proficiency levels across different backgrounds and study periods.

Subgroups	Mathematics Levels by %							
	1	2	3	4	5	6	7	8
	III	III	III	III	III	III	III	III
	IV	IV	IV	IV	IV	IV	IV	IV
	V	V	V	V	V	V	V	V
Boys	6.4	36	27.6	14.7	6.7	6	2	0.5
	1.0	14.4	36.0	19.4	14.2	7.7	4.5	2.7
	3.9	7.7	18.0	17.5	20.3	12.3	14.2	6.0
Girls	4.6	33.3	30.3	16.1	7.5	5.8	1.7	0.7
	0.6	13.8	34.3	21.0	15.4	7.7	4.7	2.5
	1.8	4.3	13.6	18.7	22.0	15.1	16.4	8.2
Rural	8.1	47.1	30.7	10.1	2.3	0.9	0.9	0
	1.2	20.8	43.7	19.7	10.1	3.7	0.7	0.0
	4.5	9.1	23.9	23.8	22.3	9.8	5.8	0.8
Urban	2.9	22.2	27.3	20.7	11.9	11	2.9	1.2
	0.4	7.4	26.5	20.8	19.5	11.6	8.5	5.3
	1.3	2.9	7.8	12.3	19.9	17.5	24.9	13.4
Low SES	10.1	50	29.3	8.4	1.3	0.5	0.4	0
	1.2	16.9	40.3	21.5	12.8	5.2	1.9	0.3
	3.6	7.2	19.1	21.7	22.6	13.1	10.5	2.2
High SES	1.1	13.1	18.4	22.6	18.1	18.9	5.6	2.2
	0.4	10.2	29.1	19.6	17.5	10.5	7.6	5.1
	1.8	4.1	11.7	14.4	20.0	14.9	20.8	12.2
South Africa	5.5	34.7	29	15.4	7.1	5.9	1.9	0.6
	0.8	14.1	35.1	20.3	14.8	7.7	4.6	2.6
	2.9	6.0	15.8	18.1	21.1	13.7	15.3	7.1

Table 43. Learners Mathematics levels

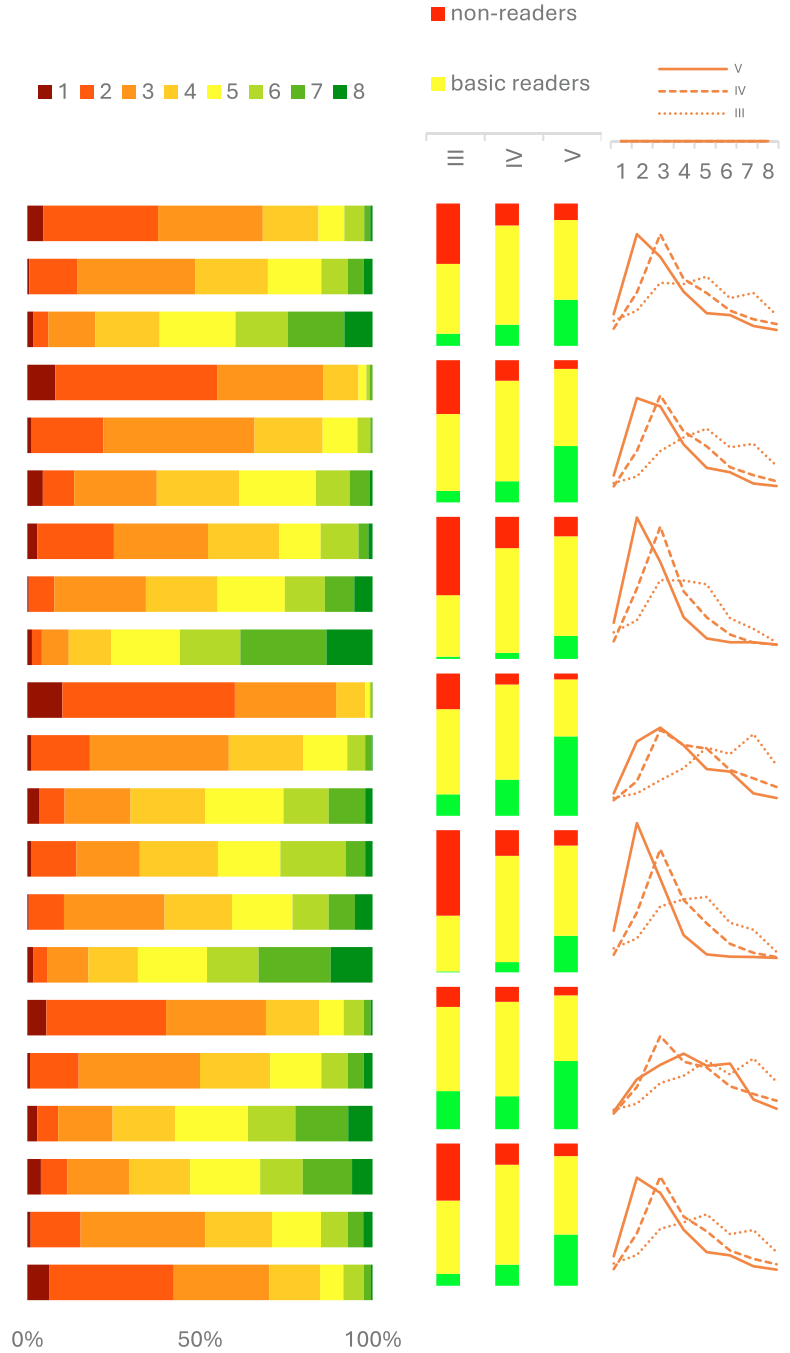


Figure 68: Mathematics Levels by subgroups

Table 43 and Figure 68 present a detailed breakdown of learners' mathematics levels by subgroup, highlighting key differences based on gender, location, and socioeconomic status (SES). Boys generally show higher proportions in higher performance levels (Levels 5-7) compared to girls, with 36% of boys in Level 2 and 27.6% in Level 3, whereas 33.3% of girls are in Level 2 and 30.3% in Level 3. Urban learners outperform their rural counterparts, with fewer Learners in the lowest levels (Level 1) and higher representation in Levels 7-8. Specifically, 2.9% of urban learners are in Level 1 compared to 8.1% in rural areas. Rural Learners also tend to be concentrated in lower performance categories, particularly in Level 1 and Level 2. Regarding SES, learners from low SES backgrounds display a high concentration in the lower levels (Levels 1-3), with 10.1% in Level 1 and 50% in Level 2, while high SES learners show more balance across the levels, with a greater representation in Level 5 (18.9%) and Level 6 (18.1%).

CHAPTER 5: HEALTH KNOWLEDGE ACHIEVEMENT AND TRENDS

5.1 Introduction

This chapter examines the knowledge levels of Grade 6 learners and their teachers in South Africa on HIV, AIDS, and other health knowledge, as well as their attitudes toward these diseases. The SEACMEQ V study assessed knowledge in various areas, such as general HIV and AIDS awareness, provincial differences, and sub-group comparisons, to understand how learners and teachers perform in health-related knowledge and attitudes across time specifically in SEACMEQ III, IV, and V.

In addition to measuring knowledge, the study also explores factors impacting learners' understanding, such as access to life-skills textbooks, attitudes toward HIV-related stigma, and comfort in discussing HIV and AIDS with teachers. Teacher knowledge levels are examined concerning gender, subject expertise, and training experiences, offering valuable insights into the broader educational system's preparedness to deliver health education. By analysing trends in performance on the HIV and AIDS Knowledge Test (HAKT) and evaluating mean scores, this chapter presents a comprehensive overview of the current state of HIV/AIDS education, with recommendations for targeted improvements in curriculum and teacher training.

5.2 HIV and AIDS Knowledge Levels

Overall performance of learners and their teachers

This SEACMEQ V section provides an overview of learners' and teachers' performance in HIV and AIDS knowledge levels. Evaluating these knowledge levels is essential to understanding the effectiveness of health education in schools, identifying gaps in awareness, and guiding targeted interventions to enhance both learner and teacher competencies in critical health areas. In Table 44 HIV and AIDS knowledge for Grade 6 learners and teachers is presented.

Table 44. Learner and health teacher mean HAKT for SEACMEQ III, IV, V

Province	SEACMEQ		
	III	IV	V
	Mean	Mean	Mean
Grade 6 learners	503	471	453
Grade 6 Health teachers	799	773	748

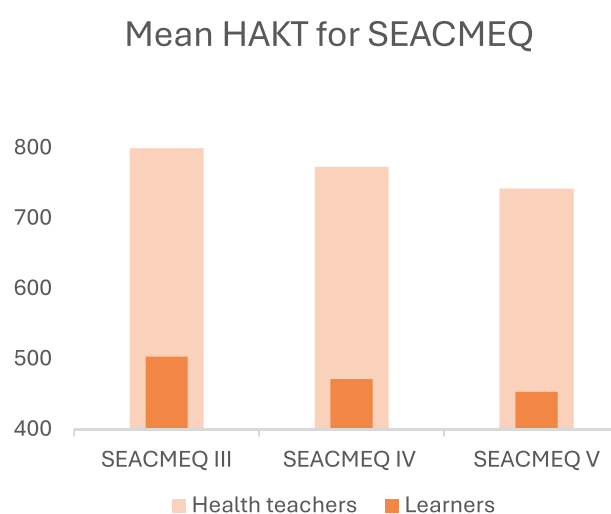


Figure 69: Learner and health teacher mean HAKT for SEACMEQ III, IV, V

Table 44 and Figure 69 data reveal a declining trend in the mean Health and AIDS Knowledge Test (HAKT) scores for both Grade 6 learners and their health teachers across the SEACMEQ III, IV, and V assessments. Grade 6 learners' mean scores drop from 503 in SEACMEQ III to 471 in SEACMEQ IV, and further to 453 in SEACMEQ V, indicating a consistent decrease in their knowledge levels over time. Similarly, health teachers' mean scores decreased from 799 in SEACMEQ III to 773 in SEACMEQ IV and 748 in SEACMEQ V. Despite this decline, teachers consistently score significantly higher than learners, suggesting that while teachers maintain a stronger foundational knowledge, their ability to transfer this knowledge effectively may be diminishing, contributing to learners' reduced performance.

The Tables and Figures below provide data on HAKT mean for teachers in SEACMEQ V

Table 45. Teacher mean HAKT for SEACMEQ V

SEACMEQ V			
Province	Teacher HAKT	Desired level	Minimum level
	Mean	%	%
Eastern Cape	747	68,7	90,1
Free State	753	65,3	95,9
Gauteng	748	70,0	100,0
Kwazulu-Natal	767	79,1	98,6
Limpopo	739	74,0	95,0
Mpumalanga	760	77,9	89,8
Northern Cape	740	77,6	94,7
North West	811	95,2	100,0
Western Cape	718	71,7	100,0
South Africa	750	74,9	96,5

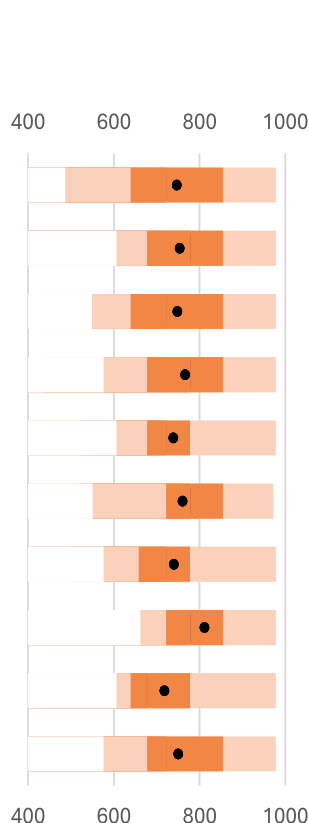


Figure 70: Mean teacher HAKT and distribution by province in SEACMEQ V

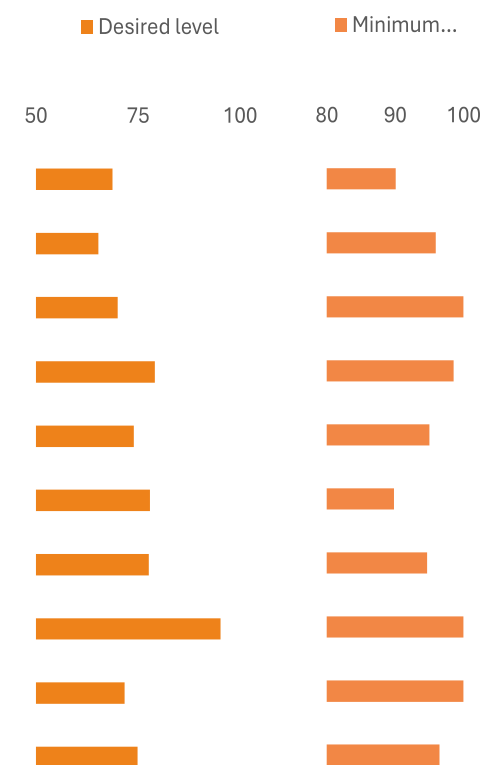


Figure 71: Teachers reaching desired level

Figure 72: Teachers reaching minimum level

Table 45 and Figures 70 to 72 reflect variations in teacher HIV and AIDS Knowledge Test (HAKT) mean scores and proficiency levels across South African provinces during SEACMEQ V. Nationally, the mean score is 750, with 74.9% of teachers meeting the desired level and 96.5% achieving the minimum level of knowledge. The North West stands out with the highest mean score (811) and 95.2% of teachers

reaching the desired level, while all meet the minimum level, indicating strong HIV-related knowledge. Conversely, the Western Cape records the lowest mean score (718), though all teachers meet the minimum level, and 71.7% achieve the desired level.

KwaZulu-Natal (767) and Mpumalanga (760) show strong performance, with high proportions of teachers meeting both desired (79.1% and 77.9%, respectively) and minimum levels (98.6% and 89.8%). Eastern Cape and Limpopo, while scoring lower (747 and 739, respectively), still have most teachers reaching the minimum level but fewer achieving the desired standard (68.7% and 74.0%).

5.3 HIV and AIDS knowledge levels by province

This section details the provincial HIV and AIDS knowledge levels among learners, as indicated by the mean HAKT scores for SEACMEQ V. These scores reveal regional differences in health education effectiveness, highlighting areas where additional resources or targeted interventions may be needed to enhance HIV and AIDS awareness. Addressing these disparities supports the goal of building a more informed, health-conscious learner population across the country. The HIV and AIDS knowledge levels of learners by province are presented in Table 46 below.

Table 46. Learner mean HAKT for SEACMEQ V

Province	SEACMEQ V		
	Learner HAKT	Desired level	Minimum level
	Mean	%	%
Eastern Cape	415	0,3	5,0
Free State	444	1,4	15,8
Gauteng	473	5,9	21,9
Kwazulu-Natal	453	1,7	17,4
Limpopo	457	5,4	14,4
Mpumalanga	441	2,4	13,3
Northern Cape	448	5,9	15,5
North West	480	9,3	25,0
Western Cape	459	6,3	16,9
South Africa	453	3,9	16,1

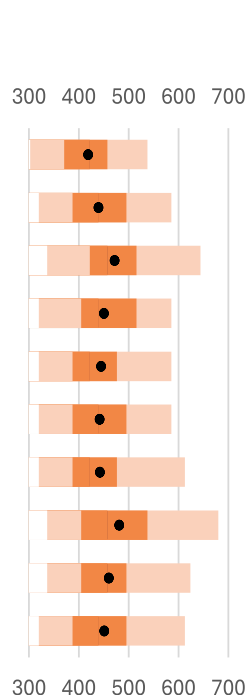


Figure 73: Learner mean HAKT

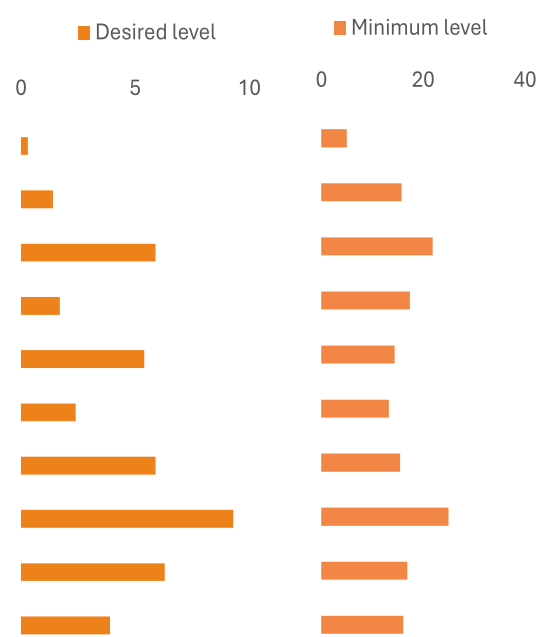


Figure 74: Learners reaching the desired level

Figure 75: Learners reaching the minimum level

Table 46 and Figures 73 to 75 on learner mean HAKT scores reveal significant provincial disparities in Grade 6 learners' health knowledge levels across South Africa. The national mean score is 453, with provinces like Gauteng (473) and North West (480) performing above average, while the Eastern Cape (415) lags significantly behind. Despite these differences, the percentage of learners achieving the desired knowledge level remains alarmingly low nationwide, with only 3.9% of learners meeting this benchmark. North West leads with 9.3%, while the Eastern Cape trails with just 0.3%. Similarly, the percentage of learners achieving the minimum knowledge level is higher but still concerning, averaging 16.1% nationally. Gauteng (21.9%) and North West (25.0%) perform relatively better, whereas provinces like Eastern Cape (5.0%) and Mpumalanga (13.3%) fall short.

5.4 HIV and AIDS knowledge levels by sub-groups

This section examines HIV and AIDS knowledge levels and achievement scores of Grade 6 learners on the HAKT, categorised by sub-groups. Analysing performance by sub-groups helps identify specific learner demographics that may benefit from additional support, allowing for more tailored and effective health education strategies.

Table 47. Learner mean HAKT per sub-groups

Subgroup	SEACMEQ V		
	Learner HAKT	Desired level	Minimum level
	Mean	%	%
Boys	445	3,1	14,2
Girls	460	4,6	18,0
Rural	440	2,9	11,9
Urban	464	4,8	20,1
High SES	463	4,7	18,7
Low SES	441	3,0	13,4
South Africa	453	3,9	16,1

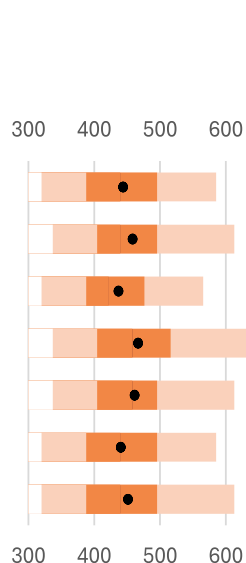


Figure 76: Learner mean HAKT

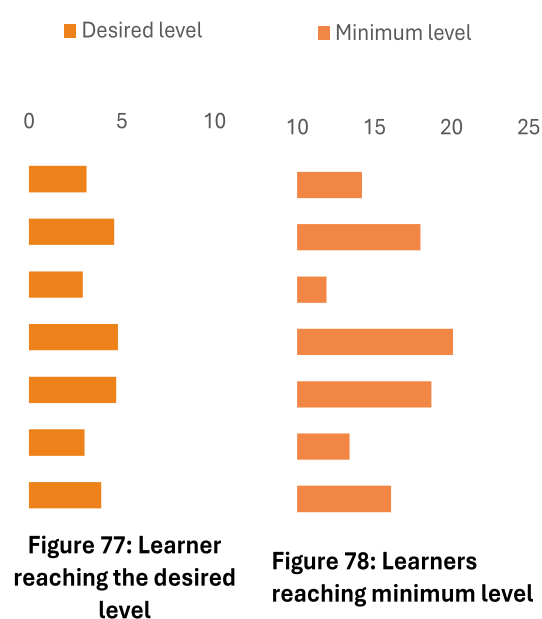


Figure 77: Learner reaching the desired level



Figure 78: Learners reaching minimum level

Table 47 and Figures 76 to 78 on the SEACMEQ V analysis of learner mean HAKT scores by sub-groups highlight disparities in health knowledge among Grade 6 learners across gender, location, and socioeconomic status (SES). Girls outperform boys, with a mean score of 460 compared to 445, and a higher percentage achieving both desired (4.6% vs. 3.1%) and minimum (18.0% vs. 14.2%) knowledge levels. Urban learners (mean: 464) show significantly better performance than their rural counterparts (mean: 440), with nearly double the percentage reaching the minimum knowledge level (20.1% vs. 11.9%). Learners from higher SES backgrounds (mean: 463) also perform better than those from low SES backgrounds (mean: 441), with higher percentages achieving both the desired (4.7% vs. 3.0%) and minimum (18.7% vs. 13.4%) levels.

Table 48. Learner mean HAKT by sub groups

Per Subgroup	Learner HAKT
	Mean
Rural - Boy - High SES	434
Rural - Boy - Low SES	423
Rural - Girl - High SES	452
Rural - Girl - Low SES	441
Urban - Boy - High SES	472
Urban - Boy - Low SES	448
Urban - Girl - High SES	480
Urban - Girl - Low SES	458
South Africa	453

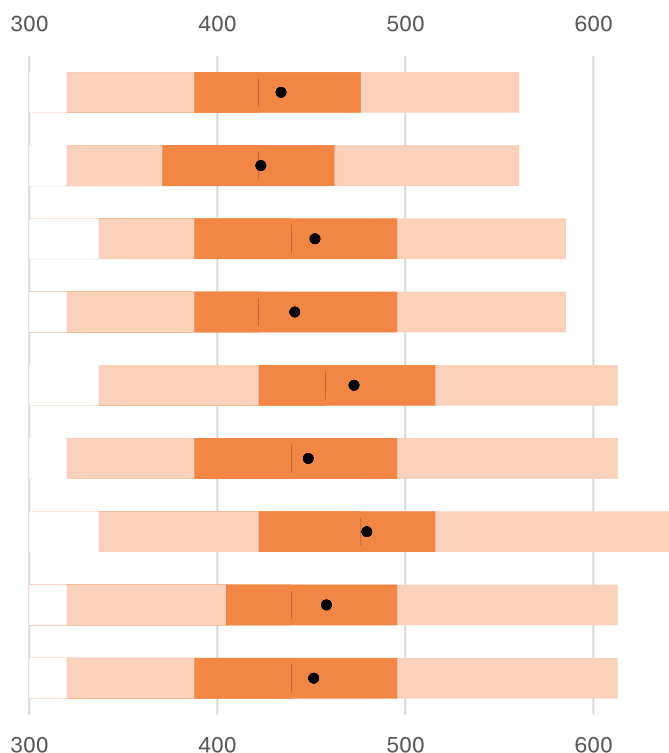


Figure 79: Learner mean HAKT

Table 48 and Figure 79 reveal the compounded effects of gender, location, and socioeconomic status (SES) on health knowledge. Urban learners consistently outperform their rural counterparts, with boys and girls in urban areas scoring higher than those in rural settings across both SES categories. Urban girls from high SES backgrounds achieve the highest mean score (480), while rural boys from low SES backgrounds perform the worst (423). The data also show that girls generally outperform boys within each SES and location category, with the most pronounced gap between urban girls and boys from high SES backgrounds (480 vs. 472) and rural girls and boys from low SES backgrounds (441 vs. 423). SES plays a critical role, as high SES learners outperform low SES peers regardless of gender or location.

5.5 Performance on the HAKT of learners by province and gender

The SEACMEQ V study assessed the HIV/AIDS knowledge levels of learners across provinces. This section presents the findings, offering insights into provinces and variations based on gender in HIV/AIDS knowledge among learners

Table 49. Learner mean HAKT by province and gender

Province	Learner HAKT
	Mean
Eastern Cape - Boy	412
Eastern Cape - Girl	426
Free State - Boy	439
Free State - Girl	440
Gauteng - Boy	467
Gauteng - Girl	477
KwaZulu Natal - Boy	440
KwaZulu Natal - Girl	462
Limpopo - Boy	436
Limpopo - Girl	453
Mpumalanga - Boy	434
Mpumalanga - Girl	449
North West - Boy	466
North West - Girl	495
Northern Cape - Boy	440
Northern Cape - Girl	445
Western Cape - Boy	458
Western Cape - Girl	462
South Africa	453

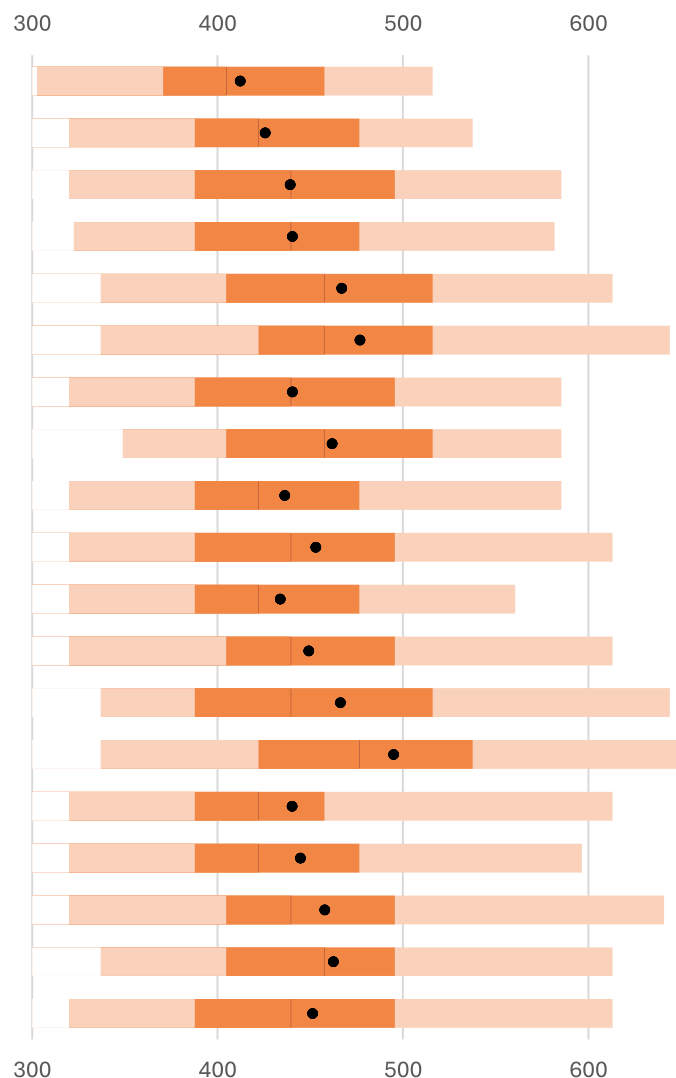


Figure 80: Learner mean HAKT

Table 49 and Figure 80 reveal significant variations in health knowledge across regions and between boys and girls. In nearly all provinces, girls consistently outperform boys, with the largest gender gap observed in North West (495 for girls versus 466 for boys) and KwaZulu-Natal (462 for girls versus 440 for boys). Gauteng and the Western Cape demonstrate relatively high mean scores for both genders, with girls in Gauteng achieving the second-highest provincial score (477) after North West girls. In contrast, the

Eastern Cape has the lowest scores for both boys (412) and girls (426), highlighting a provincial disparity that underscores challenges in health education delivery in that region. Nationally, the average score is 453, with girls outperforming boys overall.

5.6 Availability of Textbooks

This section examines the availability of life skills textbooks among learners across provinces, highlighting access disparities. The analysis categorises learners' access into five groups: no textbook, access through a teacher only, personal access, shared with one other learner, and shared with two or more learners.

Table 50. Access to lifeskills textbooks

Province	Percentage learners by access to lifeskills textbook				
	No textbook	Only teacher	By myself	Two or more other	One other
Eastern Cape	6.1	24.7	26.3	21.8	21.2
Free State	5.9	26.0	52.7	8.4	7.0
Gauteng	3.8	4.3	79.9	4.4	7.6
Kwazulu-Natal	4.9	5.8	55.1	10.9	23.3
Limpopo	3.9	13.7	65.9	7.3	9.2
Mpumalanga	2.0	16.0	39.8	2.5	39.8
Northern Cape	4.0	13.2	61.5	6.8	14.4
North West	3.2	5.2	73.1	5.6	12.8
Western Cape	5.2	6.3	74.4	5.4	8.8
South Africa	4.4	11.9	59.1	8.5	16.2

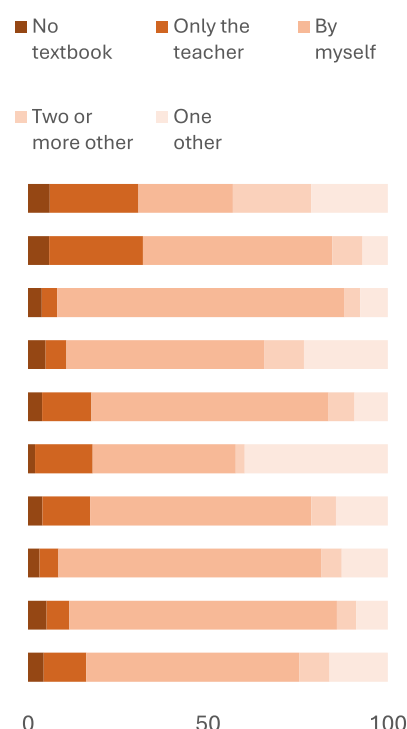


Figure 81: Access to life skills textbooks

Table 50 and Figure 81 reveal significant provincial disparities in how learners obtain these essential resources. Nationally, 59.1% of learners report having individual access to a textbook, but this figure varies widely by province. Gauteng (79.9%), North West (73.1%), and Western Cape (74.4%) lead in individual textbook access, suggesting better resource distribution. In contrast, the Eastern Cape exhibits the lowest individual access (26.3%), with a high percentage of learners (24.7%) relying solely on the teacher's textbook, indicating potential barriers to independent learning. The Free State also shows low individual access (52.7%) and a high reliance on the teacher (26.0%). Provinces like Mpumalanga show an unusual distribution, with equal shares (39.8%) of learners sharing with one other person or having individual access.

5.7 Attitudes about HIV and AIDS relating to stigma and discrimination

This section explores learners' attitudes toward friends infected with HIV, revealing varying levels of acceptance, uncertainty, and stigma across different provinces in South Africa. The findings shed light on the social perceptions of HIV among learners, offering critical insights into the progress and challenges in fostering inclusive and supportive attitudes.

Table 51 and Figure 82 present the data on learners' attitudes toward a friend infected with HIV highlighting varying levels of acceptance, uncertainty, and stigma across South Africa. Nationally, 47.6% of learners report they would treat a friend infected with HIV positively, while 41.6% are unsure, and 10.8% would shun or reject such a friend. Gauteng shows the most positive attitudes, with 53.8% of learners expressing acceptance and the lowest rate of rejection (6.8%). In contrast, Limpopo exhibits the highest rejection rate (18.7%) and the lowest acceptance rate (38.6%), suggesting a need for intensified HIV awareness and stigma reduction programs in the province.

Table 51. Learners' attitude toward a friend infected with HIV

Province	Percentage on how to treat friends infected with HIV		
	Shun/reject Him/her	Not sure	Treat him/her positive
Eastern Cape	14.0	40.9	45.1
Free State	11.0	44.4	44.6
Gauteng	6.8	39.4	53.8
Kwazulu-Natal	10.6	41.3	48.1
Limpopo	18.7	42.8	38.6
Mpumalanga	7.4	43.5	49.2
Northern Cape	8.8	50.5	40.6
North West	7.9	40.0	52.1
Western Cape	8.3	42.7	49.0
South Africa	10.8	41.6	47.6

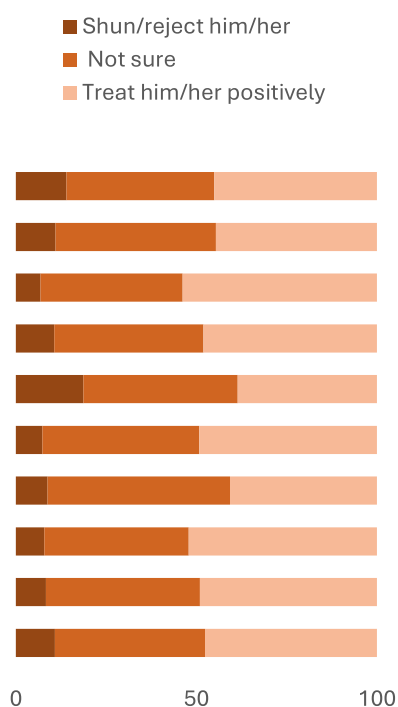


Figure 82: Learners' attitude toward a friend infected with HIV

Table 52. Learners' opinion on HIV infected learners being allowed in school

Province	Percentage on whether learners with HIV being allowed in school		
	No	Not sure	Yes
Eastern Cape	44.6	30.6	24.8
Free State	34.9	32.0	33.1
Gauteng	28.2	32.6	39.2
Kwazulu-Natal	30.2	37.7	32.1
Limpopo	36.4	36.0	27.6
Mpumalanga	26.0	33.4	40.6
Northern Cape	42.1	38.6	19.3
North West	31.5	29.8	38.8
Western Cape	36.4	29.8	33.8
South Africa	33.4	33.6	32.9

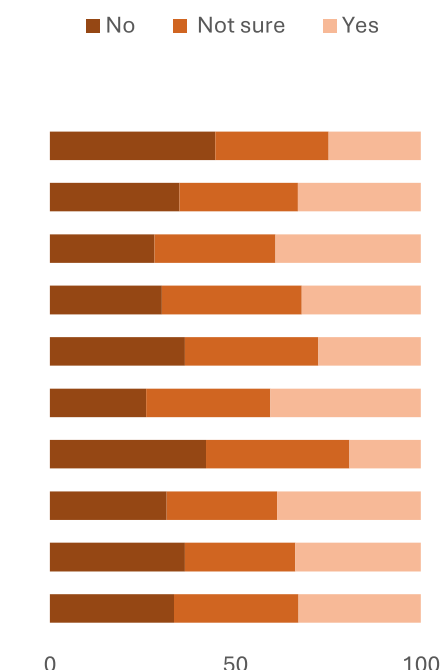


Figure 83: Learners' opinion on HIV-infected learners being allowed in school

The data in Table 52 and Figure 83 reveal mixed opinions among learners across South African provinces regarding the acceptance of HIV-infected learners in schools. Nationally, the responses are almost evenly split, with 33.4% opposing, 33.6% unsure, and 32.9% supporting the idea. Provincial analysis indicates significant variability. Gauteng (39.2%) and Mpumalanga (40.6%) exhibit the highest levels of acceptance, contrasting sharply with the Northern Cape (19.3%), where opposition (42.1%) and uncertainty (38.6%) dominate. Notably, uncertainty is prevalent in provinces like KwaZulu-Natal (37.7%) and Limpopo (36.0%), reflecting a lack of definitive stance among learners. The Eastern Cape displays one of the highest levels of opposition (44.6%), suggesting entrenched stigma or misconceptions about HIV.

Table 53. Learners' opinion on HIV infected teachers being allowed to teach

Province	Percentage on whether teachers with HIV being allowed in school		
	No	Not sure	Yes
Eastern Cape	43.4	30.5	26.1
Free State	40.4	29.2	30.4
Gauteng	31.9	34.6	33.4
Kwazulu-Natal	31.6	37.7	30.7
Limpopo	40.1	33.1	26.8
Mpumalanga	26.4	32.6	41.0
Northern Cape	48.8	34.5	16.7
North West	35.5	32.9	31.6
Western Cape	38.9	31.3	29.9
South Africa	35.7	33.6	30.6

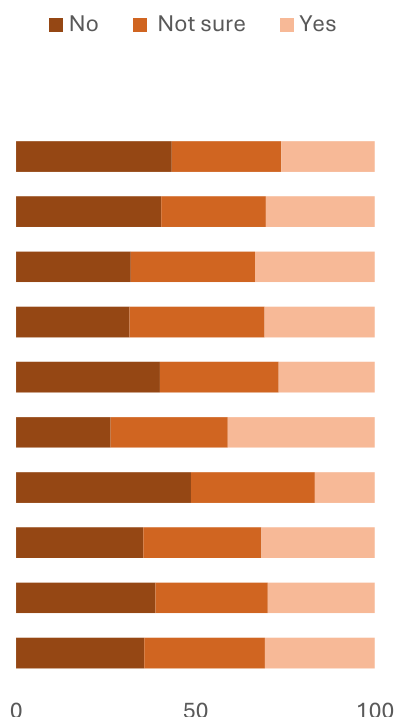


Figure 84: Learners' opinion on HIV infected teacher being allowed to teach

Table 53 and Figure 84 on data on learners' opinions regarding HIV-infected teachers being allowed to teach reveal significant regional disparities and prevalent uncertainty. Nationally, 35.7% of learners oppose the idea, 33.6% are unsure, and 30.6% support it. Mpumalanga exhibits the highest level of acceptance (41.0%), indicating a more inclusive perspective compared to the Northern Cape, where only 16.7% support the notion, and opposition is strikingly high at 48.8%. The Eastern Cape (43.4%) and Limpopo (40.1%) also show considerable resistance, while uncertainty peaks in KwaZulu-Natal (37.7%) and Northern Cape (34.5%), reflecting ambiguity in attitudes. Gauteng and Mpumalanga demonstrate comparatively higher acceptance rates, suggesting a more progressive outlook.

5.8 Attitudes about HIV and AIDS relating to risks.

This section presents teachers' attitudes toward HIV and AIDS, specifically their perceptions of risk levels associated with the disease. Understanding these perceptions is crucial, as educators play a pivotal role in shaping knowledge and behaviours related to HIV prevention within school communities. The data is presented by province, categorising teachers' ratings of HIV risk into three levels: No/Low Risk, Moderate Risk, and High/Very High Risk.

Table 54. Teacher's rating towards HIV risks

Province	Percentage on teachers rating the risk of HIV		
	No/ Low Risk	Moderate Risk	High/ Very High Risk
Eastern Cape	59.8	14.5	25.7
Free State	68.5	8.9	22.6
Gauteng	74.8	15.4	9.8
Kwazulu-Natal	62.8	10.5	26.8
Limpopo	72.5	23.2	4.4
Mpumalanga	71.3	19.0	9.7
Northern Cape	81.5	13.3	5.2
North West	61.4	14.3	24.3
Western Cape	74.2	18.7	7.1
South Africa	68.2	15.2	16.6

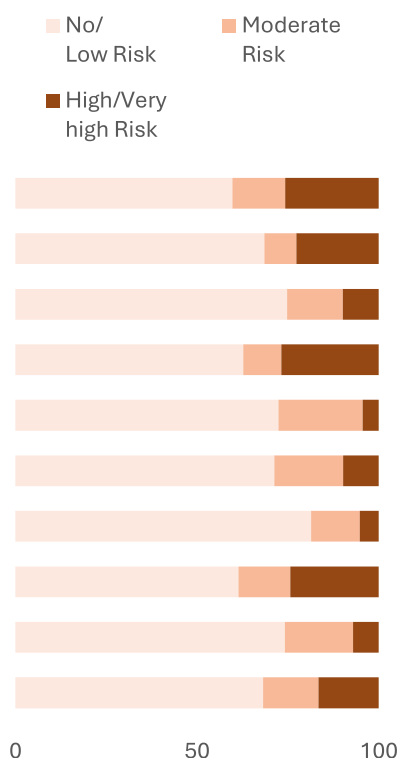


Figure 85: Teacher's rating of HIV risks

Table 54 and Figure 85 on teachers' ratings of HIV risk reveal varying perceptions across provinces, with most teachers perceiving HIV risk as low or moderate. Nationally, 68.2% rate the risk as low or no risk, 15.2% as moderate, and 16.6% as high or very high. The Northern Cape (81.5%) leads in perceiving HIV as low/no risk, with minimal teachers considering it high/very high (5.2%). Similarly, Gauteng (74.8%) and Mpumalanga (71.3%) report high low/no risk perceptions, with few viewing it as a severe threat. In contrast, KwaZulu-Natal (26.8%) and the Eastern Cape (25.7%) show the highest concern for high/very high risk, indicating stronger apprehension. Notably, Limpopo demonstrates a distinct pattern, with a higher proportion (23.2%) rating the risk as moderate and only 4.4% considering it high.

Table 55. School head rating towards HIV risks

Province	Percentage on school heads rating the risk of HIV		
	No/ Low Risk	Moderate Risk	High/ Very High Risk
Eastern Cape	82.8	9.6	7.7
Free State	84.4	11.1	4.5
Gauteng	78.2	16.2	5.5
Kwazulu-Natal	68.4	15.6	16.0
Limpopo	60.2	28.6	11.2
Mpumalanga	87.4	7.7	4.9
Northern Cape	83.9	16.1	0.0
North West	71.2	18.3	10.4
Western Cape	87.5	12.5	0.0
South Africa	75.8	15.6	8.5

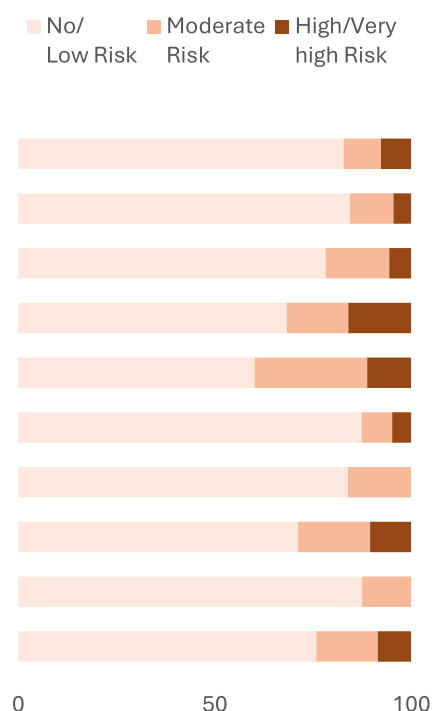
**Figure 86: Teacher's rating of HIV risks**

Table 55 and Figure 86 on school heads' ratings of HIV risk reveal a predominant perception of HIV as a low or no risk across South Africa, with notable provincial differences. Nationally, 75.8% of school heads rate HIV as low/no risk, 15.6% as moderate, and 8.5% as high/very high. Provinces like the Western Cape (87.5%) and Mpumalanga (87.4%) exhibit the highest low/no risk perceptions, with no respondents in these provinces rating the risk as very high. Similarly, the Free State (84.4%) and Northern Cape (83.9%) reflect strong low-risk ratings, with negligible concern for high-risk. In contrast, KwaZulu-Natal demonstrates the highest proportion perceiving high/very high risk (16.0%), followed by Limpopo (11.2%) and North West (10.4%), highlighting greater apprehension in these regions. The moderate risk perception is most pronounced in Limpopo (28.6%), suggesting some awareness of potential risks.

5.9 Comfort levels in discussing with the teacher

This section examines learners' comfort levels in discussing HIV and AIDS with their teachers and how this relates to their mean scores on the HIV and AIDS Knowledge Test (HAKT). The analysis highlights the correlation between learners' perceived comfort and their understanding of HIV and AIDS, shedding light on the importance of open communication in education. Data is categorised into four subgroups based on comfort levels: Very Comfortable, Somewhat Comfortable, Somewhat Uncomfortable, and Very Uncomfortable.

Table 56. Learner mean HAKT by comfort in discussing HIV and AIDS

Subgroup	SEACMEQ V	
	Valid answers	Learner HAKT
	%	Mean
Very comfortable	27.5	451
Somewhat comfortable	21.1	458
Somewhat uncomfortable	21.3	447
Very uncomfortable	30.1	449
South Africa	100	453

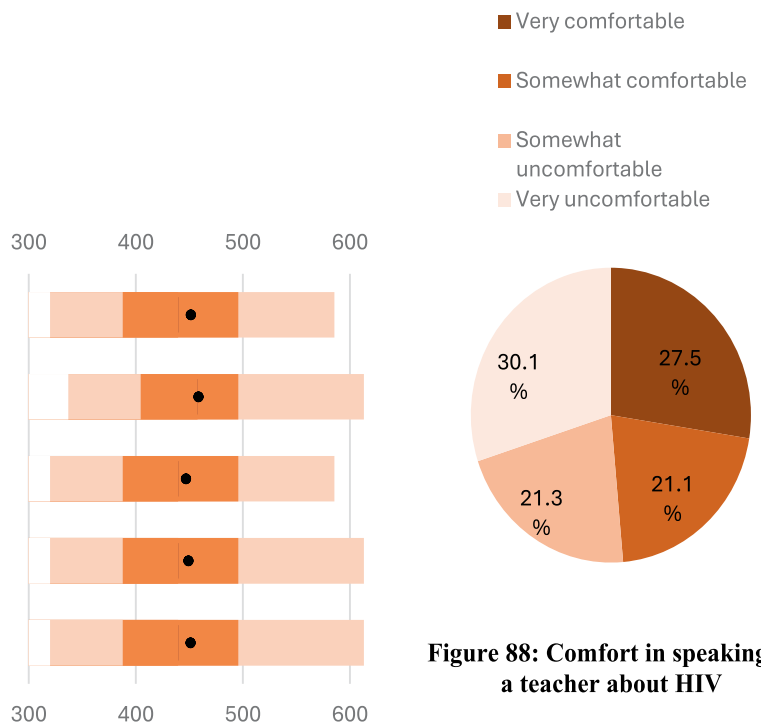


Figure 88: Comfort in speaking to a teacher about HIV

Figure 87: Learner mean HAKT score by comfort to speak to a teacher

Table 56 and Figures 87 and 88 provide the analysis of learner mean HIV and AIDS Knowledge Test (HAKT) scores by their comfort level in discussing HIV and AIDS. The results reveal nuanced differences in knowledge. Learners who are "somewhat comfortable" discussing the topic exhibit the highest mean HAKT score (458), followed closely by those who are "very uncomfortable" (449) and "very comfortable" (451). Interestingly, learners who are "somewhat uncomfortable" score the lowest mean (447), suggesting that discomfort may not necessarily equate to lower knowledge. These variations highlight that while comfort levels in discussing sensitive topics like HIV and AIDS can influence engagement, they do not uniformly correlate with knowledge levels, as all groups demonstrate relatively similar means, with South Africa's overall learner mean at 453. This indicates a need for educational approaches that engage all comfort levels to enhance knowledge equitably.

5.10 Teacher knowledge levels by gender and subject

The data in this section provides insights into how teachers' expertise varies within the domains of Reading, Mathematics, and Health, highlighting potential gaps in subject-specific awareness.

Table 57. Teacher mean HAKT for SEACMEQ V

SEACMEQ V		
Subject	Gender	Teacher HAKT
		Mean
Reading	Female	746
	Male	741
	Both Genders	744
Math	Female	766
	Male	738
	Both Genders	757
Health	Female	750
	Male	742
	Both Genders	745
	South Africa	750

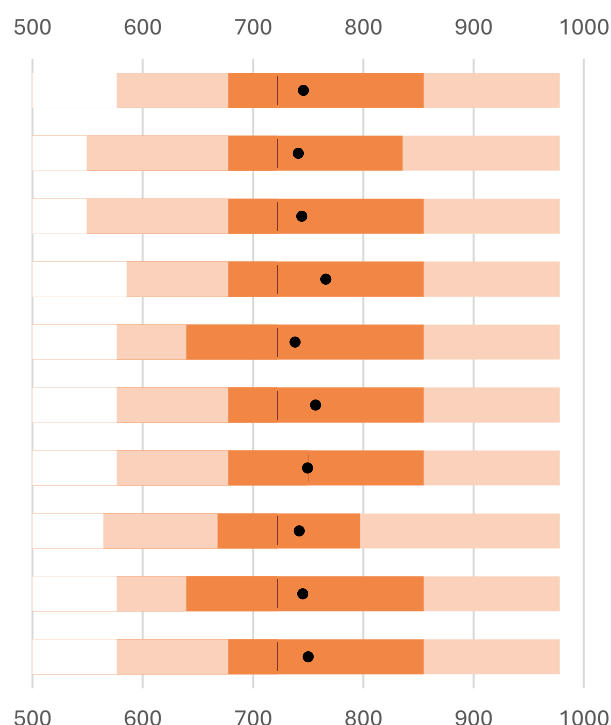


Figure 89: Teachers mean HAKT

Table 57 and Figure 89 highlights the average scores of teachers in the SEACMEQ V. The results are broken down by HIV/AIDS Knowledge Test (HAKT), subject, and gender. In Reading, female teachers performed marginally better, scoring 746 compared to 741 for male teachers, resulting in a combined average of 744. A similar pattern is seen in Health, where female teachers achieved a higher mean score of 750, surpassing the 742 scored by males, with an overall average of 745. The largest gender difference appears in Mathematics, where female teachers scored significantly higher at 766, compared to 738 for males, leading to a combined mean of 757.

5.11 Data on Teacher In-Service Training

This section presents data on the average number of days teachers participated in in-service training, as recorded in the SEACMEQ V study. The analysis is broken down by province, providing insights into professional development opportunities and their distribution across different provinces.

Table 58. Teacher average days in-service training for SEACMEQ V

Province	SEACMEQ V
	Average days
Eastern Cape	4.23
Free State	8.59
Gauteng	4.39
Kwazulu-Natal	5.94
Limpopo	4.16
Mpumalanga	6.19
Northern Cape	5.40
North West	4.05
Western Cape	7.84
South Africa	5.69

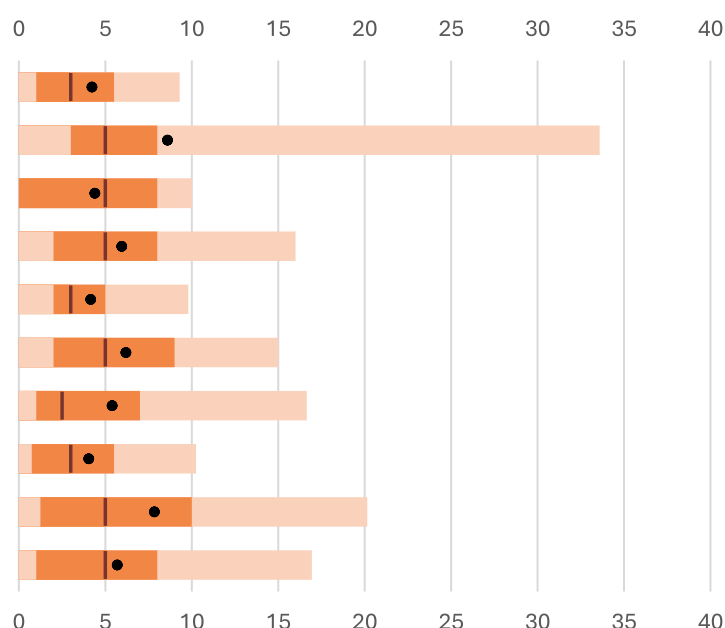


Figure 90: Teacher average days in-service training

Table 58 and Figure 90 on teachers' average days of in-service training during SEACMEQ V reveal significant provincial disparities, with a national average of 5.69 days. The Free State records the highest average (8.59 days), suggesting a strong focus on professional development, followed by the Western Cape (7.84 days) and Mpumalanga (6.19 days). These provinces may prioritize ongoing training to enhance teaching quality and address emerging educational challenges. In contrast, North West (4.05 days), Limpopo (4.16 days), and Eastern Cape (4.23 days) report the lowest averages, indicating limited training opportunities in these regions.

Gauteng (4.39 days) and KwaZulu-Natal (5.94 days) show averages near the national level, suggesting moderate access to professional development. The Northern Cape (5.40 days) aligns closely with the national mean.

Table 59. Learner mean other Health for SEACMEQ V

Province	SEACMEQ V
	Learner Other Health
	Mean
Eastern Cape	472
Free State	496
Gauteng	516
Kwazulu-Natal	491
Limpopo	504
Mpumalanga	480
Northern Cape	498
North West	515
Western Cape	507
South Africa	498

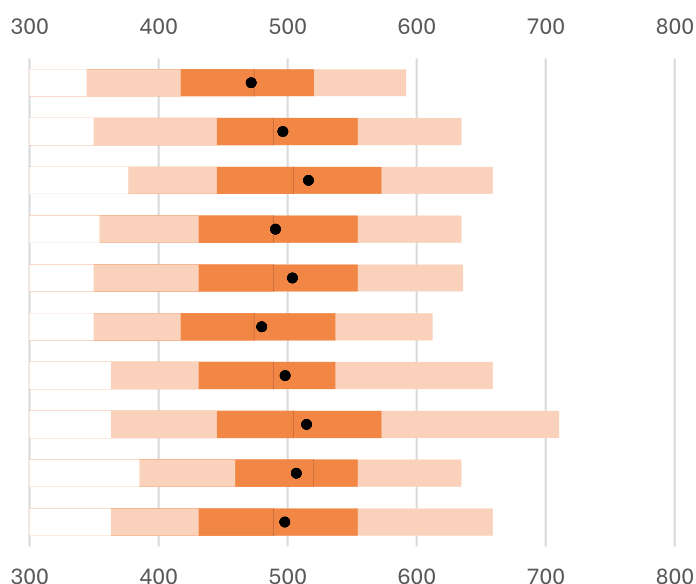


Figure 91: Mean learner other Health score and distribution by province

Table 59 and Figure 91 on learner mean scores for "Other Health" during SEACMEQ V highlight provincial disparities, with a national mean of 498. Gauteng (516) and North West (515) lead with the highest scores, suggesting better overall health knowledge and awareness among learners in these provinces. The Western Cape (507) and Limpopo (504) also score above the national average, reflecting relatively strong performance.

In contrast, the Eastern Cape (472) and Mpumalanga (480) have the lowest scores, indicating potential gaps in health education or access to health-related resources. KwaZulu-Natal (491) falls slightly below the national mean, while the Free State (496) and Northern Cape (498) align closely with the overall average.

These variations suggest a need for targeted health education interventions, particularly in underperforming provinces like the Eastern Cape and Mpumalanga, to improve learners' understanding of broader health issues and ensure more equitable health knowledge across regions.

Table 60. Teacher means other Health for SEACMEQ V

Province	SEACMEQ V	
	Teacher Other Health	
	Mean	
Eastern Cape	742	
Free State	750	
Gauteng	742	
Kwazulu-Natal	771	
Limpopo	767	
Mpumalanga	747	
Northern Cape	755	
North West	750	
Western Cape	773	
South Africa	756	

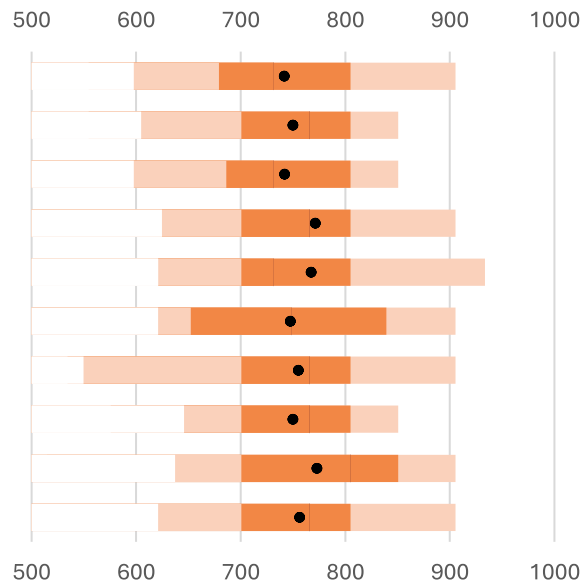


Figure 92: Mean teacher other Health and distribution by province

Table 60 and Figure 92 on teacher mean scores for "Other Health" during SEACMEQ V show a national average of 756, with notable regional differences. The Western Cape (773) and KwaZulu-Natal (771) lead with the highest scores, reflecting strong health knowledge among teachers in these provinces. Limpopo (767) also performs well, slightly above the national mean, indicating a solid understanding of health-related topics.

Conversely, the Eastern Cape and Gauteng share the lowest mean score (742), suggesting room for improvement in teacher health knowledge. Mpumalanga (747) and the Free State and North West (both 750) score slightly below or at the national average, while the Northern Cape (755) aligns closely with it.

Chapter 6: Key Insights into SEACMEQ V Regional Results

The SEACMEQ V project, involving 16 member countries, faced significant challenges due to the global COVID-19 pandemic. As a result, some countries withdrew from the study. Participating countries included Botswana, Kenya, Malawi, Mauritius, Namibia, Seychelles, South Africa, Tanzania (Zanzibar), and Uganda. It should be noted that due to the pandemic, participating countries conducted the study in different time points. The SCC classified participation of countries into group 1 for administration in 2021; group 2 for administration in 2022 and group 3 for administration in 2023. This section highlights each country's overall performance in reading, mathematics, and health. Mozambique conducted the study under unique circumstances, limiting direct comparison with other countries but allowing the results to guide their educational policy decisions. Angola, Eswatini, Lesotho, Tanzania (Mainland), Zambia, and Zimbabwe did not participate.

The table below provides the sample size for each participating country.

Table 61. Participating countries' sample

Country	Schools	Pupils
Botswana	209	5242
Kenya	245	5782
Malawi	245	5082
Mauritius	135	3681
Namibia	172	4263
Seychelles	25	1420
South Africa	298	6229
Uganda	245	5467
Zanzibar	120	3065
SEACMEQ V	1694	40 231
SACMEQ IV	2507	62 218

6.1 Performance of learners in Reading by countries

This section provides an overview of the mean reading scores for Grade 6 learners across different countries, offering a detailed look at overall performance in SEACMEQ V. The data highlights variations in reading achievement, helping to identify trends, challenges, and areas for improvement in literacy across the participating countries.

Table 62. Pupil mean reading scores by country

Country	Country Weighted Mean Scores - Reading				Group
	SACMEQ IV	SEACMEQ V	Difference	Status	
Botswana	567	542	-25	▼	1
Kenya	577	565	-12	▼	1
Malawi	458	491	34	▲	1
Seychelles	609	557	-52	▼	1
South Africa	538	505	-33	▼	1
Mauritius	588	590	2	■	2
Namibia	538	494	-44	▼	2
Zanzibar	526	437	-89	▼	2
Uganda	512	534	22	▲	3
SEACMEQ	532	530	-2	■	

Key:	
■	No significant change
▲	Increased by more than 10 score points
▼	Decreased by more than 10 score points

The weighted reading scores, detailed in Table 62 above, reveal mixed trends: while Botswana, Kenya, Seychelles, South Africa, Namibia, and Zanzibar experienced significant declines of more than 10 points compared to SEACMEQ IV, Malawi, and Uganda showed notable improvements, with increases exceeding 10 points. These positive outcomes for Malawi and Uganda suggest effective educational strategies or interventions that have bolstered reading proficiency. However, the declines observed in other countries highlight the need for a deeper investigation into systemic challenges and targeted efforts to support literacy development, ensuring equitable progress across the region.

Table 63. Proportions of learners achieving acceptable reading skills

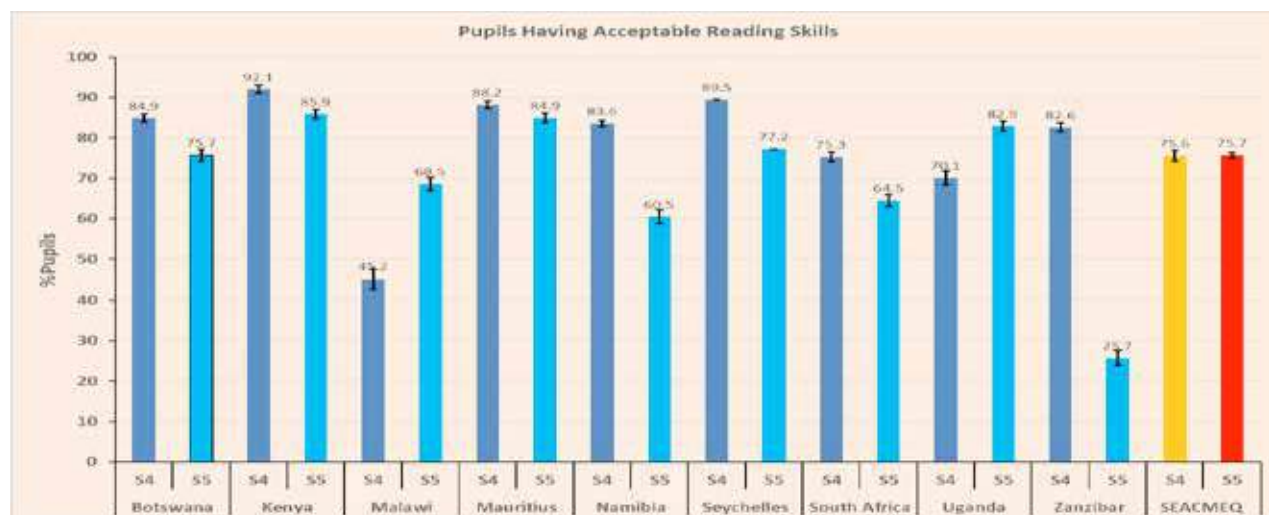


Table 63 highlights improvements in the proportion of learners achieving acceptable reading skills in Malawi and Uganda, while all other countries experienced declines. These findings suggest that targeted interventions in Malawi and Uganda have yielded positive outcomes, whereas other countries may be facing systemic challenges that hinder reading proficiency. Successful strategies from Malawi and Uganda should be studied and adapted for implementation in countries experiencing decline.

6.2 Performance of learners in Mathematics by countries

This section provides an overview of the mean mathematics scores for Grade 6 learners across different countries, offering insights into overall performance in SEACMEQ V. The data highlights the variations in mathematics achievement, reflecting both improvements and challenges faced by the participating countries.

Table 64. Learner mathematics scores by country

Country Mean Scores - Mathematics					
Country	SACMEQ IV	SEACMEQ V	Difference	Status	Group
Botswana	563	561	-2		1
Kenya	608	629	22		1
Malawi	479	505	25		1
Seychelles	599	574	-25		1
South Africa	552	525	-26		1
Mauritius	644	682	38		2
Namibia	522	487	-35		2
Zanzibar	499	480	-19		2
Uganda	523	564	41		3
SEACMEQ	542	567	25		

Key:	
	No significant change
	Increased by more than 10 score points
	Decreased by more than 10 score points

The SEACMEQ V weighted average score for Grade 6 mathematics saw a notable improvement of 25 points compared to SEACMEQ IV, indicating overall progress in mathematics achievement across participating countries. Table 6.4 above presents the mean mathematics scores by country, revealing that Kenya, Malawi, Mauritius, and Uganda all showed significant gains, with increases of more than 10 points compared to their SEACMEQ IV results. This suggests that these countries may have implemented successful educational strategies or interventions that contributed to higher learner performance. In contrast, Seychelles, South Africa, Namibia, and Zanzibar experienced declines of more than 10 points, highlighting potential challenges in maintaining or improving mathematics skills in these countries. Botswana's performance remained stable, with no significant change from the previous cycle. These trends underline the need for targeted interventions in countries facing declines while providing valuable lessons from those with notable improvements that could be replicated across the region.

6.3 Performance of HIV/AIDS and other health knowledge by countries

This section focuses on the HIV/AIDS knowledge levels of learners across participating countries, providing insights into the distribution of scores by country. It examines how learners perform in relation to HIV/AIDS knowledge, highlighting the proportion of learners at various knowledge levels in each country. Additionally, the section explores learners' scores on other health topics, offering a comparative overview of health education outcomes across the region. This analysis aims to identify trends, disparities, and areas where targeted interventions may be necessary to improve health e

Table 65. Learner HIV scores by country

Country	Country Mean Scores - HIV/AIDS				
	SACMEQ IV	SEACMEQ V	Difference	Status	Group
Botswana	507	494	-13	▼	1
Kenya	526	515	-12	▼	1
Malawi	441	464	23	▲	1
Seychelles	490	430	-60	▼	1
South Africa	471	453	-18	▼	1
Mauritius	413	482	69	▲	2
Namibia	517	435	-82	▼	2
Zanzibar	484	411	-73	▼	2
Uganda	473	486	13	▲	3
SEACMEQ	483	482	-2	■	

Key:	
■	No significant change
▲	Increased by more than 10 score points
▼	Decreased by more than 10 score points

Table 65 above shows that the SEACMEQ V weighted average score for Grade 6 learners in HIV/AIDS knowledge remained consistent with the SEACMEQ IV results. Notably, only Grade 6 learners in Kenya surpassed the SEACMEQ mean score of 500 in HIV/AIDS knowledge. In terms of progress, Malawi, Mauritius, and Uganda showed improvements, with scores increasing by more than 10 points. On the other hand, Botswana, Seychelles, South Africa, Namibia, Kenya, and Zanzibar experienced declines of more than 10 points, indicating challenges in maintaining or improving HIV/AIDS knowledge across these countries.

Table 66. Distribution of learners across the HIV/AIDS Knowledge levels by country

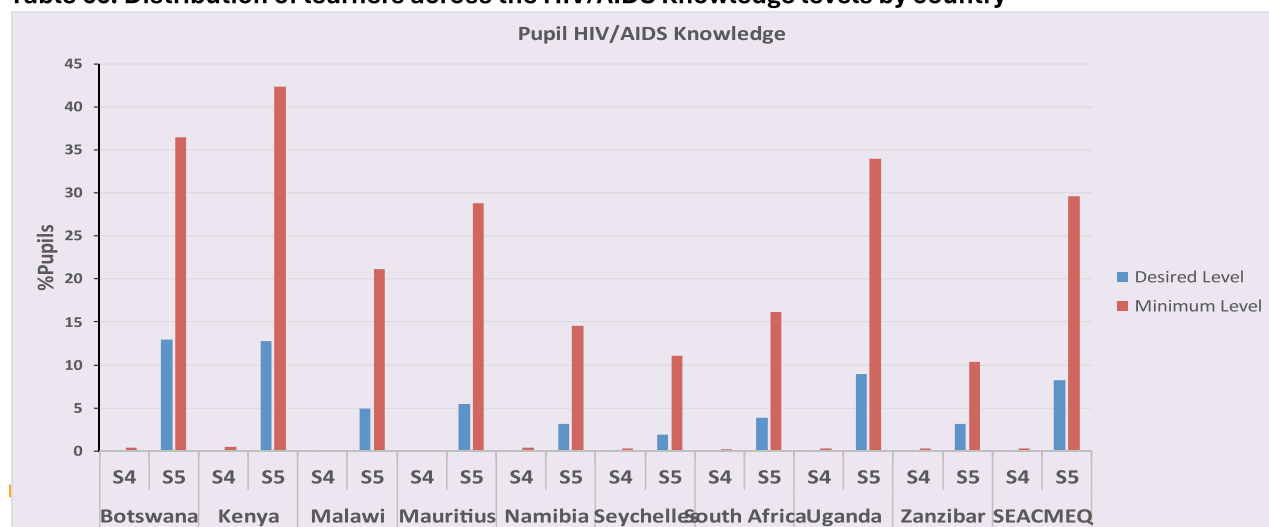


Table 66 presents the distribution of learners' HIV/AIDS knowledge by country revealing that in many participating countries, a significant number of learners fail to reach the expected levels of HIV/AIDS knowledge for the region. This suggests that current educational strategies may not be effectively addressing HIV/AIDS awareness, leaving a gap in essential knowledge among learners.

This finding highlights the need for a revaluation of HIV/AIDS education programs to ensure they are comprehensive and impactful. Policymakers and educators should focus on improving the delivery of HIV/AIDS knowledge, potentially integrating more engaging and interactive teaching methods, and ensuring that all learners have access to accurate, relevant information. Strengthening these educational

initiatives could play a critical role in combating misinformation and promoting healthier behaviours across the region.

Table 67. Learner scores on other health topics by country

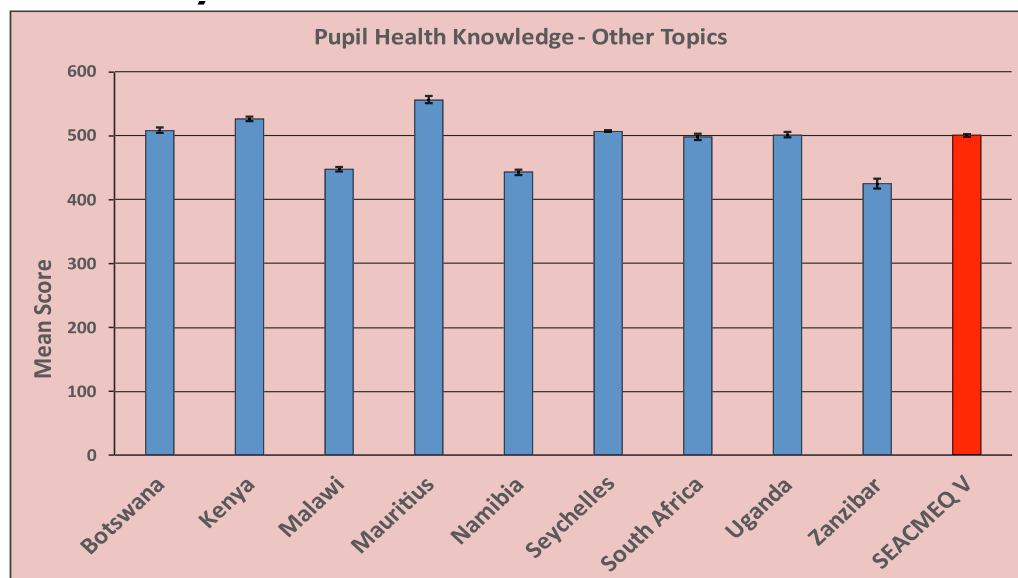


Table 67 indicates that in health-related knowledge, Grade 6 learners in Mauritius, Kenya, South Africa, Botswana, Seychelles, and Uganda achieved the SEACMEQ mean score of 500. However, learners in Malawi, Namibia, and Zanzibar scored below the SEACMEQ mean of 500 in other health topics, indicating disparities in health education outcomes across the participating countries. This variation highlights the need for targeted interventions to address gaps in health knowledge, particularly in the countries with lower scores.

6.4 SEACMEQ V General Findings

The COVID-19 era appears to have had a greater negative impact on Grade 6 reading achievement than on mathematics achievement across all SEACMEQ V countries. Alarming, Namibia and Zanzibar experienced significant declines in the percentage of learners achieving mathematics skill levels 4 to 8, while Seychelles and South Africa saw notable decreases at levels 5 to 8. Gender parity was maintained in Grade 6 enrolment across all participating countries. The average age of Grade 6 learners in five countries (Kenya, Malawi, Namibia, Uganda, and Zanzibar) exceeded the SEACMEQ V average, while it was below average in Botswana, Mauritius, Seychelles, and South Africa.

Mauritius was the only country to achieve a significantly higher proportion of learners at level 8 of reading skills compared to SEACMEQ IV, while Malawi showed substantial gains in learners reaching reading levels 4 to 7. The SEACMEQ V weighted average score in mathematics improved significantly by 25 points over SEACMEQ IV, with Kenya, Malawi, Mauritius, and Uganda recording higher individual averages. However, Seychelles, South Africa, Namibia, and Zanzibar saw declines, and Botswana's average remained unchanged.

In HIV/AIDS knowledge, only Grade 6 learners in Kenya surpassed the SEACMEQ mean of 500, while the SEACMEQ V weighted average score for HIV/AIDS knowledge remained statistically unchanged from SEACMEQ IV. These results highlight both areas of progress and concern, emphasising the need for

targeted interventions to address disparities and improve outcomes in reading, mathematics, and HIV/AIDS education.

Chapter 7: Key Findings, Recommendations, and Conclusion

This chapter summarises the key findings of the SEACMEQ V study in South Africa, drawing attention to the progress made, ongoing challenges, and critical areas requiring focused intervention. Based on these findings, the chapter offers policy and practice recommendations aimed at enhancing the quality and equity of education in South Africa. Finally, it outlines a roadmap for moving forward, encompassing next steps and considerations for future research and action.

Overall, the SEACMEQ V study underlines the DBE's continuing policy priorities, that is, to focus on building an equitable, inclusive, and high-quality education system that addresses challenges from early childhood education through higher grades, aimed to enhance literacy and numeracy, especially in under-resourced and low-income communities. While the department has been addressing disparities in educational resources, particularly in rural areas, the study's findings suggest that current efforts need to be ramped up. Importantly, the SEACMEQ V study was adversely hampered by the global COVID-19 pandemic which coincided with the start of the main data collection activities. As a result, disruptions, such as school lockdowns, during the research process affected the study's completion timelines. Moreover, the reality of future pandemics suggests a greater focus on the expansion of digitalized learning platforms and the adoption of blended learning approaches will be needed.

Key Findings

The SEACMEQ V study provides a comprehensive overview of the state of basic education in South Africa, revealing both positive developments and persistent challenges. Key findings include:

- **Fluctuating Achievement Trends:** While reading and mathematics scores generally improved between SEACMEQ II and SEACMEQ IV, SEACMEQ V indicates a decline in both areas. This highlights the need for sustained efforts to maintain and build upon previous gains in learning outcomes. For example, while, nationally, there was a significant percentage decrease of Non-Numerate learners, reflecting progress in foundational numeracy skills, there was also a decline in the proportion of Advanced Numerate learners, indicating challenges in cultivating higher-order numeracy competencies.
- **Persistent Provincial Disparities:** Significant variations in learner achievement persist across South Africa's nine provinces. The Western Cape consistently demonstrates higher performance, while the Eastern Cape and Limpopo, often lag. These disparities are evident not only in learner scores but also in access to resources, teacher qualifications, and overall learning environments. However, despite Western Cape and Gauteng performing better than other provinces, in both there were significant drops in their Reading and Mathematics scores highly contributing to the overall drop in the national mean scores in these content areas.
- **Gender Gaps:** Gender gaps in reading and mathematics achievement persist, with girls generally outperforming boys in reading. This recurring pattern across multiple SEACMEQ cycles underscores the need for gender-responsive educational strategies to address these disparities.

Interestingly, among rural learners, boys from high-SES backgrounds scored slightly higher than girls for reading, but among low-SES rural learners, girls scored higher than boys, suggesting that gender and SES interact differently in rural settings, with girls showing resilience in low-SES contexts. Similarly, learners' mathematics results highlight the significant impact of urban versus rural location and high versus low SES on learner performance. The national average score of 525.5 reflects this overall trend, with urban, high-SES learners pulling the average upwards.

- **Impact of Socioeconomic Status and Location:** Learners' socioeconomic status (SES) and school location significantly influence their learning outcomes. Learners, both boys and girls, from higher SES backgrounds and those attending urban schools consistently achieve better results than their lower SES and rural counterparts, highlighting the impact of socioeconomic inequalities and geographical disparities on educational opportunities. This suggests, firstly, that a sustained programme intervention addressing South Africa's rural school challenges, be prioritised; and secondly, given that learners living more than 5 kilometers from school achieve the highest mean score (563.2), significantly outperforming those living closer to school, suggests that learners traveling greater distances have unique characteristics, such as greater motivation or access to higher-quality schools. Alternatively, it may reflect disparities in resource distribution or school quality based on location. Such findings suggest a need for further investigation into factors influencing this trend and targeted strategies to support learners closer to school to enhance their math achievement.
- **Challenges in HIV/AIDS Knowledge:** Despite teachers generally possessing higher levels of HIV/AIDS knowledge than learners, a declining trend in knowledge levels is observed for both groups across SEACMEQ studies. The declining trend applies across provinces in this latest study. This underscores the need for consistent and updated HIV/AIDS education and awareness programs to ensure learners and educators remain well-informed. Specifically, this study reveals that while teachers maintain a stronger foundational knowledge, their ability to transfer this knowledge effectively may be diminishing, contributing to learners' reduced performance; as such, this finding, potentially, has both pedagogical and professional development implications. Further, the scores by sub-groups highlight similar disparities in health knowledge among Grade 6 learners across gender, location, and socioeconomic status (SES) with urban learners consistently outperforming their rural counterparts and boys and girls in urban areas scoring higher than those in rural settings across both SES categories. Significantly, SES plays a critical role in the acquisition of HIV/AIDS knowledge, as high SES learners outperform low SES peers regardless of gender or location. Moreover, in nearly all provinces, girls consistently outperform boys, and given the broader health challenges relating to reproductive health, sexual practices and associated GBV and femicide patterns in South Africa, the impact of low knowledge levels among learners, especially boys, demands closer scrutiny and intervention. A related concern is learners' opposition and uncertainty to the acceptance of HIV-infected learners in schools, leading to stigmatization and isolation of infected learners. Similar learner attitudes are prevalent regarding HIV-infected teachers being allowed to teach. Finally, provincial variations suggest a need for targeted health education interventions, particularly in underperforming provinces like the Eastern Cape and Mpumalanga, to improve learners' understanding of broader health issues and ensure more equitable health knowledge across regions.
- **Teacher Proficiency and Professional Development:** While teachers generally perform well in reading and mathematics, there is a need for continuous professional development to enhance

pedagogical skills and keep teachers abreast of evolving educational practices. Teachers' reading achievement increases, for example, indicate enhanced teacher competencies in reading instruction, reflecting possible improvements in professional development and teaching strategies, though disparities among provinces remain, emphasising the need for sustained efforts to bridge gaps. Likewise, there have been significant advances in teachers' mathematics proficiency levels, however, intermediate levels of proficiency remain prominent in several provinces, such as KwaZulu-Natal and North West, signaling ongoing opportunities for professional development. Additionally, teacher training days vary significantly across provinces, highlighting inconsistencies in professional development opportunities.

- **Uneven Distribution of Resources:** Access to essential learning materials, such as textbooks and libraries, varies considerably across provinces. Similarly, disparities exist in school infrastructure, including access to electricity, computers, and well-equipped classrooms. These imbalances in resource allocation likely contribute to the observed disparities in learner outcomes.

Policy and Practice Recommendations

To address these challenges and build upon positive developments, the following policy and practice recommendations are proposed:

- **Strengthen Foundational Literacy and Numeracy:** Implement targeted interventions to address the recent decline in reading and mathematics scores. Focus on strengthening foundational literacy and numeracy skills in early grades, particularly in underperforming provinces, through research-based pedagogical approaches and individualized support for struggling learners. Nationally, learners' reading achievement underscores the challenge of improving both reading and mathematics proficiency, particularly in rural and low SES communities, taking into account the gender dynamics of learner performance. The results further demonstrate that learners who always speak the Language of Learning and Teaching (LoLT) achieve significantly higher performance compared to their peers who never use the LoLT. This is most notable in the Western Cape. This performance gap is further evident across three distinct groups: learners who always speak the LoLT, those who occasionally use it, and those who never do. The analysis highlights a clear trend as the use of the LoLT decreases, so does academic performance. These disparities highlight the impact of language alignment between teaching and learning on learning outcomes. When learners are taught in a language different from their own, it creates barriers to understanding and engagement, ultimately influencing their ability to perform well in Mathematics and Reading. This finding emphasises the importance of language considerations in education policy and teaching strategies, and must be seen in the context of education decolonisation debates and the imperative of developing South Africa's indigenous languages linked to Mother-Tongue based Reading Literacy in foundational learning and Mother-Tongue based Bilingual Education (MTBBE) in higher grades.
- **Prioritize Equity and Address Provincial Disparities:** Allocate resources strategically to reduce disparities in educational opportunities and outcomes across provinces. This includes equitable distribution of learning materials, infrastructure development in under-resourced areas, and targeted support programs for disadvantaged learners and schools. For example, while the

findings suggest strong national provision of essential electricity and equipment like photocopiers and computers, disparities in television access highlight room for improvement, particularly in the North West and Eastern Cape. Additionally, lack of television access may speak to learners and teachers making greater use of other forms of visual technology or remote learning platforms, such as cell phones and tablets, as underscored in recent research on teaching and learning experiences during COVID-19 which point to the importance and turn towards blended learning in schools.

- **Promote Gender-Responsive Pedagogy:** Integrate gender-responsive teaching practices to address gender gaps in learning outcomes. This includes creating inclusive learning environments, employing diverse teaching strategies that cater to different learning styles, and challenging gender stereotypes in curriculum and classroom interactions.
- **Address the Impact of Socioeconomic Factors:** Develop comprehensive support programs to mitigate the impact of socioeconomic disadvantage on learning. This could include early childhood education initiatives, after-school programs, nutritional support, and partnerships with community organizations to address the holistic needs of learners from low-SES backgrounds.
- **Enhance HIV/AIDS Education and Awareness:** Strengthen and update HIV/AIDS education programs for learners and teachers, incorporating the latest information on prevention, treatment, and care. Implement initiatives to combat stigma and discrimination, fostering inclusive and supportive learning environments for all learners. Specific attention should be given to addressing learner (and teacher) attitudes towards infected learners and teachers.
- **Invest in Continuous Teacher Professional Development:** Prioritize continuous professional development for teachers, focusing on enhancing content knowledge, pedagogical skills, and inclusive teaching practices linked to an Assessment for Learning approach. Ensure equitable access to professional development opportunities across provinces, particularly in under-resourced areas.
- **Ensure Equitable Access to Resources:** Address disparities in the distribution of learning materials, ensuring that all learners have access to textbooks, libraries (especially in rural provinces), and other essential resources. Invest in infrastructure development to provide equitable access to well-equipped classrooms, technology, and supportive learning environments in all schools. Additionally, disparities in resource allocation, for example, access to teacher reading and mathematics bookshelves are notable, highlighting a critical need for equitable distribution of resources, particularly in Limpopo and Mpumalanga, to ensure better learning environments. The lower availability of reading and mathematics books nationally underlines the turn towards digitalized learning and teaching platforms, and might have relevance for learners' reading competency, with associated implications for teachers' language teaching competency.

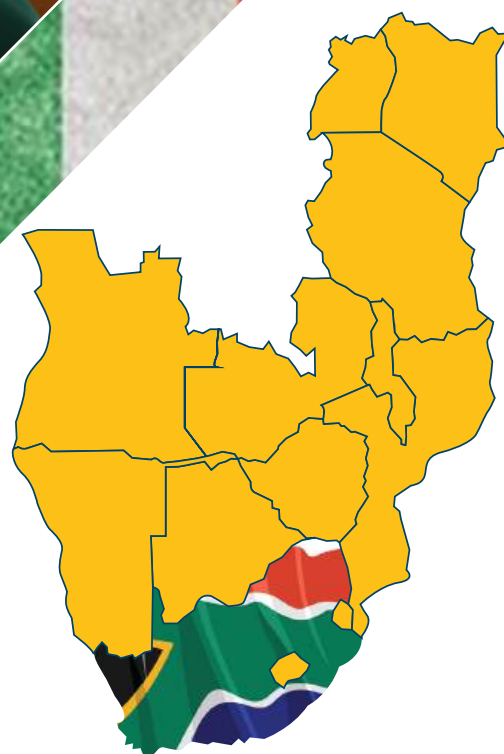
Next Steps for the Way Forward

Moving forward, the following steps are suggested to build upon the findings of SEACMEQ V and implement the proposed recommendations:

- **Develop Action Plans:** The Department of Basic Education (DBE) should develop comprehensive action plans based on the study's findings and recommendations. These plans should outline specific objectives, strategies, timelines, and responsible parties to guide implementation efforts at national and provincial levels.
- **Collaborative Implementation:** Deepen collaboration among stakeholders, including the DBE, provincial education departments, schools, teachers, parents, and community organizations, to ensure effective implementation of recommendations. This could involve establishing working groups, sharing best practices, and providing ongoing support and monitoring. Existing partnerships between the DBE and teacher unions, as well as with the National Education Collaboration Trust (NECT), should be further leveraged for optimal impact. As an initial first step, the findings of this report should be shared using a broad stakeholder platform, such as the NECT, to solicit inputs in the development of relevant programmes.
- **Capacity Building:** Invest in capacity building initiatives to strengthen the skills and knowledge of teachers, school leaders, and education officials in areas identified as needing improvement, such as foundational literacy and numeracy instruction, gender-responsive pedagogy, and inclusive education practices. The expertise and experience of the post-school sector, including universities, should be engaged.
- **Monitoring and Evaluation:** Establish robust monitoring and evaluation mechanisms linked the Department's National Assessment Framework (NAF) to track progress, measure the impact of interventions, and identify areas requiring adjustments. This could involve collecting data on learner achievement, teacher practices, resource allocation, and school environments, and using this information to inform continuous improvement efforts. The NGO sector, in particular, has much to offer in these endeavours.
- **Future Research:** Conduct further research to deepen understanding of the factors influencing learner outcomes, particularly in areas where data from SEACMEQ V raises questions or highlights gaps. This could include the writing of policy briefs investigating the specific challenges faced by learners in underperforming provinces, examining the effectiveness of different pedagogical approaches, and exploring the impact of social and cultural factors on learning, attitudes and behaviour patterns. The study has highlighted how learners' socioeconomic status (SES) and school location, combined with gender, can significantly influence their learning outcomes, suggesting the need to undertake more focused research on these dynamics at the national, provincial and district levels. For example, disparities in resource distribution or school quality based on location suggest a need for further investigation into factors influencing this trend and targeted strategies to support learners closer to school to enhance their math achievement.

By taking these next steps, South Africa can leverage the valuable insights from the SEACMEQ V study to guide policy and practice, ultimately striving to create a more equitable, high-quality, and inclusive education system for all learners. In so doing, it will be important to take cognisance of contemporary local and global challenges, such as the Fourth Industrial Revolution, pandemics, the continuing scourge of femicide and xenophobia, as well as education decolonisation efforts in South Africa and globally that seek to make education more inclusive and relevant for learners, teachers and the sector as a whole.

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