

Factbook Education Systems: Senegal

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List of Abbreviations

AFD	Agence Française de Développement
BAC	Baccalaureate
BFEM	Brevet de Fin d'Études Moyennes
BEP	Brevet d'Études Professionnelles
BT	Brevet de Technicien
BTS	Higher Technician Certificate
CAP	Certificat d'Aptitude Professionnelle, or: Certificat d'Aptitude Pédagogique
CAFPC	Certificat d'Aptitude aux Fonctions de Psychologue
CAEM	Certificat d'aptitude à l'enseignement moyen.
CAES	Certificat d'aptitude à l'Enseignement Secondaire
CAESTP	Certificat d'Aptitude à l'Enseignement Secondaire Technique et Professionnel
CAPES	Certificat d'Aptitude au Professorat de l'Enseignement Secondaire.
CAPET	Certificat d'Aptitude au Professorat de l'Enseignement Technique
CAECEMG	Certificat d'Aptitude à l'Enseignement dans les Collèges d'Enseignement Moyen Général
CAEMTP	Certificat d'Aptitude à l'Enseignement Moyen Technique Pratique
CBA	Competency-based Approach
CEAP	Certificat Élémentaire d'Aptitude Pédagogique
CAEESD	Certificat d'Aptitude Aux Enseignements Spéciaux dans les Etablissements du Second Degré.
CAESTP	Certificat d'Aptitude à l'Enseignement Secondaire et Technique Professionnel
CFEE	Certificat of Elementary Completion
CNFMETP	Centre National de Formation des Maitres d'Enseignement Technique Professionnel
DECPC	Direction des Examens, Concours professionnels et Certifications
DUT	University Technology Diploma
EGEF	Etats Généraux de l'Education et de la Formation

ENFEFS	L'Ecole Normale de Formation en Economie Familiale et Sociale
ENSEPT	Ecole Normale Supérieur d'Enseignement Technique-Professionnel
EFI	Ecole de Formation des Instituteurs.
GCI	Global Competitiveness Index
GER	Gross Enrolment Ratio
GII	Global Innovation Index
GDP	Gross Domestic Product
IA	Inspection d'Académie
IDE	Inspections Départementales de l'Education
IEF	Inspection de l'Education et de la Formation
ISCED	International Standard Classification of Education
KOF	Swiss Economic Institute
LMD	License-Master-Doctorate system (LMD)
MEN	Ministère de l'Education Nationale
MFPAA	Ministère de la Formation Professionnelle, de l'Apprentissage et l'Artisanat
OECD	Organisation for Economic Co-operation and Development
PAQUET	Programme d'Amélioration de la Qualité, de L'Equité et de la Transparence du Secteur de l'Education et de la Formation
PES	Plan for an Emerging Senegal
PET	Professional Education and Training
TVET	Technical and Vocational Education and Training
UNESCO	United Nations Educational, Scientific and Cultural Organization
VET	Vocational Education and Training
VPET	Vocational Professional Education and Training
VPETA	Vocational and Professional Education and Training Act
WEF	World Economic Forum
YLILI	Youth Labour Index for low Income Countries
YLMI	Youth Labour Market Index
YLILI	Youth Labour Index for Low Income Countries

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Foreword

The increasing competitiveness of the world economy as well as the high youth unemployment rates after the worldwide economic crises have put pressure on countries to upgrade the skills of their workforces. Consequently, vocational education and training (VET) has received growing attention in recent years, especially amongst policy-makers. For example, the European Commission defined common objectives and an action plan for the development of VET systems in European countries in the Bruges Communiqué on Enhanced European Cooperation in Vocational Education and Training for 2011-2020 (European Commission, 2010). In addition, a growing number of US states and other industrialized, transition, and developing countries (for example Hong Kong, Singapore, Chile, Costa Rica, Benin and Nepal) are interested in either implementing VET systems or making their VET system more labour-market oriented.

The appealing outcome of the VET system is that it improves the transition of young people into the labour market by simultaneously providing work experience, remuneration and formal education degrees at the secondary education level. If the VET system is optimally designed, VET providers are in constant dialogue with the demand-side of the labour market, i.e. the companies. This close relationship guarantees that the learned skills are in demand on the labour market. Besides practical skills, VET systems also foster soft-skills such as emotional intelligence, reliability, accuracy, precision, and responsibility, which are important attributes for success in the labour market. Depending on the design and permeability of the education system, VET may also provide access to tertiary level education (according to the ISCED classification): either general education at the tertiary A level or professional education and training (PET) at the tertiary B level. PET provides occupation-specific qualifications that prepare students for highly technical and managerial positions. VET and PET systems are often referred to together as “vocational and professional education training (VPET)” systems.

Few countries have elaborate and efficient VPET systems. Among these is the Swiss VPET system, which is an example of an education system that successfully matches market supply and demand. The Swiss VPET system efficiently introduces adolescents to the labour market, as shown by Switzerland’s 2007-2017 average youth unemployment rate of 8.1 percent compared to 14.8 percent for the OECD average (OECD, 2017).

Though not many countries have VPET systems that are comparable to Switzerland’s in terms of quality, efficiency and permeability, many have education pathways that involve some kind of practical or school-based vocational education. The purpose of the CES Education System Factbook Series¹ is to provide information about the education systems of countries across the world, with a special focus on vocational and professional education and training.

In the CES Factbook Education Systems: Senegal, we describe Senegal’s vocational system and discuss the characteristics that are crucial to the functioning of the system. Essential components comprise the regulatory framework and the governance of the VPET system, the involved actors, and their competencies and duties. The Factbook also provides information regarding the financing of the system and describes the process of curriculum development and the involved actors.

The Factbook is structured as follows: First, we provide an overview of Senegal’s economy, labour market, and political system. The second part is dedicated to the description of the formal education

¹ From 2013 to 2019, the Factbooks were produced within the framework of the Education Systems research division at the KOF Swiss Economic Institute. From 2020 they will be produced by the Chair of Education Systems (CES) group.

system. The third section explains Senegal's vocational education system. The last section offers a perspective on Senegal's recent education reforms and challenges to be faced in the future.

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The Factbook Education Systems series have to be regarded as work in progress. The authors do not claim completeness of the information which has been collected carefully and in all conscience. Any suggestions for improvement are highly welcome!

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1. Senegal's Economy and Political System

Table 1: Key Statistics and Information on Senegal

Category	Outcome
Population	16.3 million (2019)
Area	196'712 km ²
Location	Western Africa
Capital City	Dakar
Government	Unitary Presidential Republic
Official Language	French
National Currency	CFA-Franc BCEAO (USD/CFA=0.0018, as of 15.09.20)

Source: own table based on Reuters (2020), World Bank (2020) and Encyclopaedia Britannica (2020).

One of the main purposes of an education system is to provide the future workforce with the skills needed in the labour market. The particularities of a country's economy and labour market are important factors determining the current and future demand for skills. Therefore, these will briefly be described in the first part of this Factbook. In addition, this part provides an overview of Senegal's political system with emphasis on the description of the education politics.

1.1 Senegal's Economy

Senegal is classified as a developing country with a poverty rate of 46.7%² in 2011 (World Bank, 2019). In 2019, Senegal had a gross domestic product (GDP) per capita of USD 3'395.³ For comparison, the neighbouring countries Guinea, Guinea-Bissau, The Gambia, Mali and Mauritania had a GDP per capita of USD 2'564, USD 1'989, USD 2'207, USD 2'327 and USD 5'197 in 2019. The average GDP per capita of the OECD member states was USD 44'689 in the same year (World Bank, 2020).

² Using the national poverty line. The poverty rate is 38% using the international poverty line

³ GDP per capita based on purchasing power parity (PPP, constant 2017 international \$)

Between 1990 and 2019, the Senegalese economy grew at an average annual rate of 3.93%. Especially during the second decade of the 21st century, the economy was highly prosperous. Propelled by the Plan for an Emerging Senegal (PES)—which aims to speed up Senegal’s economy—the real average growth rate increased to 6.4% between 2014 and 2019, which made Senegal one of the fastest growing economies in the world (African Development Bank Group, 2020). With a rate of 4.33% and 4.49% respectively, Guinea and Mali experienced a similar economic development in the period between 1990-2019. The economy of Mauritania, Guinea-Bissau and Gambia grew slightly slower at 3.03%, 2.48% and 3.07%. Furthermore, Senegal’s and all its neighbouring countries’ economic growth was higher than the OECD average between 1990 and 2019: On average, the economies of the OECD countries grew at a rate of 2.12% per annum (World Bank, 2020).

Table 2 summarises the value added and employment by sector for Senegal and the member states of the European Union (EU-28) in the year 2019.

Table 2: Value added and employment by sector, 2019

Sector	Senegal: value added (%)	EU-28: value added (%)	Senegal: employment ⁴ (%)	EU-28: employment (%)
Primary sector	16.3	1.6	30.5	4.1
Agriculture, hunting and forestry, fishing	16.3	1.6	30.5	4.1
Secondary sector	26.9	24.4	13.5	21.7
Manufacturing, mining and quarrying, other industrial activities	n/a	18.7	n/a	15.2
Of which: manufacturing	n/a	15.6	n/a	13.6
Construction	n/a	5.7	n/a	6.5
Tertiary sector	56.7	74	56.5	74.2
Wholesale and retail trade, repairs; hotels and restaurants; transport; information and communication	n/a	24.4	n/a	27.8
Financial intermediation; real estate, renting & business activities	n/a	27.5	n/a	16.7
Public administration, defence, education, health, other service activities	n/a	22.1	n/a	29.7

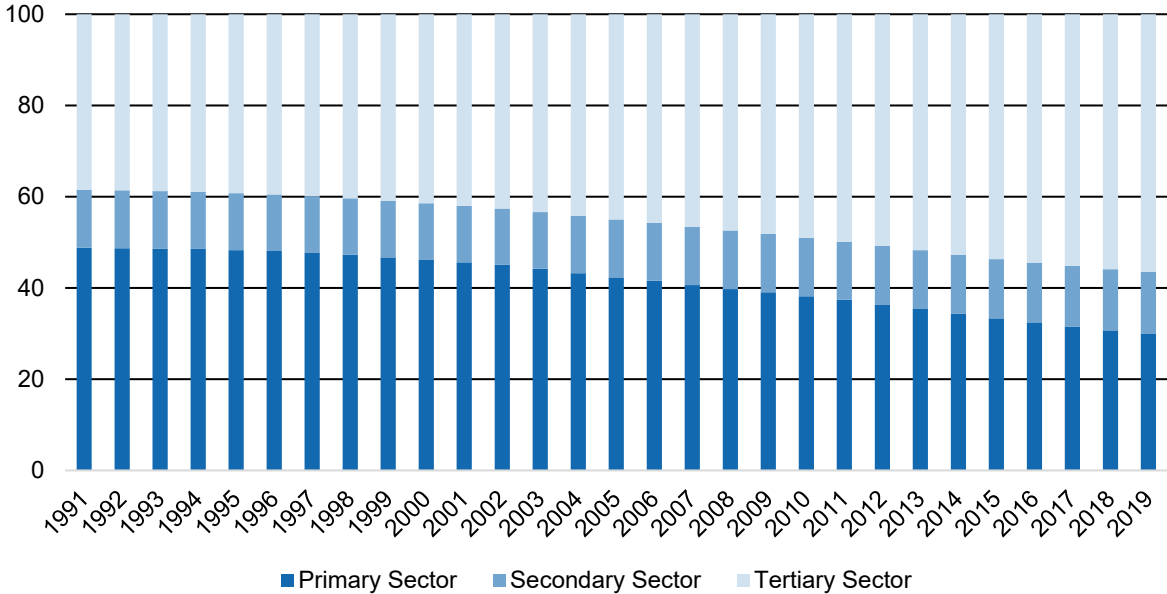
Source: own table based on Eurostat (2020a; 2020b), World Bank (2020b).

In both the EU-28 member states and Senegal, the value added in the tertiary sector makes up the largest fraction in the whole economy. In the EU-28, a share of almost two thirds is generated in the form of services. In comparison, the fraction of services in the Senegalese economy is approximately 20 percentage points lower than in the EU-28. The opposite is the case in the primary sector. With 1.6%, the share of agriculture, hunting and forestry and fishing is very low in the EU-28 member states. Although this sector is also the least important in Senegal, it is still relevant in terms of economic output, since it makes up a fraction of 14.8% of total value added. The industry (secondary) sector equals roughly one quarter in both economies and is consequently the second most important.

⁴ Due to rounding differences, the sum of all sectors is above 100 percent.

In the context of educational systems, a key aspect of the economic structure is the amount of labour employed in the respective sectors. The tertiary sector is not only the sector that generates the most output in Senegal and the EU-28, it is also the sector that employs the largest share of the labour force. Moreover, in both the EU-28 and Senegal, the share of employment in the secondary sector is lower than its fraction of value added. This implies that the labour productivity in both economies is higher in the industry sector compared to the whole economy. However, this difference is rather small in the EU-28 compared to Senegal. As expected, based on the share of value added in the primary sector, the employment in the primary sector is much higher (30%) in Senegal compared to the EU-28 (4.1%). The share of employment occupied in this sector exceeds the percentage of value added in both economies. Hence, we can derive that the value added per worker is lower in the primary sector than the average across all the sectors which indicates lower labour productivity.

Figure 1: Employment by sector (as % of total employment), 1991-2019



Source: own figure based on World Bank (2020b)

Figure 1 depicts the development of the relative employment as a percentage of total employment in the three key economic sectors in Senegal over time. During the 90's, the primary sector employed the most workers and the overall relative employment by sector remained fairly constant. From the beginning of the new century, employment in the primary sector has been shrinking continuously. At the same time, employment in the secondary sector remained constant while employment in the tertiary sector increased at the expense of the primary sector. Considering that Senegal introduced a second Plan for an Emerging Senegal (PES) for the period between 2019-2023 that aims for its digital economy to account for 10% of total GDP, this trend of a growing tertiary sector can be expected to continue (African Development Bank Group, 2020).

According to the WEF Global Competitiveness Index (GCI) rankings 2015-2016 (WEF, 2020), Senegal ranked 110 out of 140 countries, placing it in the rear third. The GCI indicates that the sub-index *innovation and sophistication factors* ranks best (rank 47), while the sub-index *basic requirements* ranks worst (rank 114). Especially the category health and primary education is relatively poorly developed.

Furthermore, the Global Innovation Index (GII) 2019 ranks Senegal 96th out of 129 countries (Global Innovation Index, 2020). This outcome is mainly due to the lack of *market sophistication and business sophistication*.

1.2 The Labour Market

In the first part of this section, we describe the general situation of Senegal's labour market. In the second part, we focus on the youth labour market in particular.

1.2.1 Overview of the Senegalese Labour Market

In Senegal, approximately 97% of all enterprises are located in the informal economy. This fact makes it difficult to rely on official statistics. In addition, the dominance of the informal economy poses challenges regarding health, safety and social protection at work (International Labour Organization, 2018).

The Senegalese government allows workers to form and join independent unions (except for security force members) for striking and bargaining. However, this right has some restrictions. Among others, one restriction is that each registration of a new union needs to be authorized by the Ministry of the Interior. In addition, unions do not have any possibility to lodge an appeal in case of refused registration. Although the authorization of a union is rarely withheld, the anti-union sentiment in the government is strong (U.S. Department of State, 2019). Despite all of this, there were no official cases of antiunion discrimination in 2019.

The Senegalese law prohibits all forms of forced or compulsory labour. However, the enforcement of these laws has not been very effective. Practices of forced labour still occur, for instance in areas such as farm labour, artisanal mining, domestic servitude and prostitution. Moreover, there are some laws that explicitly address child labour in Senegal. The minimum working age is 15 and work that is considered "hazardous", such as operation of machines and subterranean mining, is prohibited for youths under 18 years. However, the law is not always very clear when it comes to accurate definitions of "hazardous" and "light" work (U.S. Department of State, 2019).

The minimum wage in Senegal is 209 CFA Francs⁵ per hour for general workers and 182.95 CFA Francs per hour for workers in the agricultural sector (Journal Officiel de la Republique du Senegal, 1996). The Ministry of Labour is responsible for the enforcement of the minimum wage. Still, violations occur frequently and especially in the informal sector, as the government is lacking proper monitoring means (U.S. Department of State, 2019).

As depicted in Table 3, 47.2% of the population between the ages of 15 and 64 years participated in the labour market in the year 2019. The respective participation rate of youths (aged 15 to 24 years) was 28.1%. There is no data available regarding Senegal's adult labour force participation (ages 25-64). Compared to the OECD average, Senegal had a considerably lower participation for both age groups. Furthermore, the unemployment rate as a ratio of the entire working population was 6.6% in Senegal compared to 5.6% in the OECD.

⁵ 1 USD equals 581 CFA Francs as of 09.07.2020.

Table 3: Labour force participation rate and unemployment rate by age in 2018

Age group	Labour force participation rate (in %)		Unemployment rate (in %)	
	Senegal	OECD average	Senegal	OECD average
Total (15–64 years)	47.2	72.8	6.6	5.6
Youth (15–24 years)	28.1	48.1	8.2	11.7
Adults (25–64 years)	n/a	78.4	n/a	4.7

Source: own table based on OECD (2020) and World Bank (2020b).

Interestingly, the reported Senegalese youth unemployment rate of 8.2% is lower than the OECD average of 11.7%. Although unemployment is usually considered to be the most important indicator for evaluating the functioning of the labour market, unemployment rates, and youth unemployment rates in particular, are often not an appropriate measure for low-income countries (Kudrzycki, Günther, & Lefoll, Youth Labor Market Index for Low Income Countries, 2020). As already mentioned above, large parts of the Senegalese economy take place in the informal sector and the monitoring of the economy with respect to social security standards is rather lacking. Thus, many young people have no choice but to take up low quality jobs that are poorly paid, lacking social protection, or incommensurate with their skill level (Fields, 2011). How such low-income country specific indicators of the youth labour market can be considered will be presented in the next chapter 1.2.2.

Table 4 shows the link between the labour force participation and unemployment rate and the level of education of persons aged between 25 and 64 in 2015. In all the three education level categories, the labour force participation rate of Senegal is lower compared to the OECD average. While the labour force participation rate of the OECD countries rises with education level on average, the rate is lowest for the “upper and secondary level education” in Senegal. In all the three categories, the Senegalese labour force participation rate is lower than the OECD average. The unemployment rate in the OECD increases on average with the level of education. In contrast, this relationship is inverted in the case of Senegal: the higher the education, the higher the unemployment rate.

Table 4: Labour force participation rate and unemployment rate by educational attainment in 2017 (persons aged 25–64)

Education level	Labour force participation rate (in %)		Unemployment rate (in %)	
	Senegal	OECD average	Senegal	OECD average
Less than upper secondary education	43.3	55.7	8.4	12.7
Upper secondary education	34.7	74.1	11.2	7.4
Tertiary education	67.8	83.9	17.8	4.8

Source: own table based on OECD (2020b), International Labor Organisation.

1.2.2 The Youth Labour Market

Building on KOF Swiss Economic Institute's Youth Labour Market Index (Renold, Bolli, Egg, & Pusterla, 2014), which primarily relies on high-income country data, Kudrzycki et al. (2020) proposed a new index for low income countries. This index is the first to combine indicators specifically tailored to the realities of low-income countries and to provide an assessment of individual countries' progress in addressing the needs of young workers.

The index helps make a complex and multidimensional phenomenon more tractable by generating country-specific rankings that allow for comparisons across countries. Closer inspection of the components of the index can yield insights into labour market conditions in individual countries and specific policy recommendations.

To construct the index, 12 youth-specific labour market indicators were selected from three broad categories that best reflect the situation of the youth in the labour market: transition from education to the labour market, working conditions in the labour market, and educational background. The indicators were obtained from three reputable compilers of international data: the ILO, UNESCO and the Demographic and Health Surveys. The index score is calculated as the arithmetic mean of the three dimensions and is scaled to vary from 0 (dysfunctional youth labour market) to 100 (functioning youth labour market).

The transition dimension reflects the quantity of employment for youth and encompasses (1) the share of youth not in employment, education or training (NEET), which captures the share of inactive youth; (2) the relative unemployment ratio, which measures the degree to which unemployment affects young people more than adults and (3) the skills mismatch rate, which shows whether unemployment disproportionately affects those with high and low education levels.

The working condition dimension captures the quality of employment and contains six indicators. The youth working poverty rate measures the proportion of working youth in poverty. The youth underemployment rate measures the share of employed youths who are willing to increase their workload. The informal employment rate captures the share of young people employed without contracts, social security, or both. The vulnerable employment rate measures the share of own account workers and contributing family workers. The share of workers in elementary occupations measures the proportion of young workers in low-skilled basic tasks, which may require great physical effort and can carry a high risk of injury. Finally, the share of workers in agriculture complements the previous indicator because jobs in agriculture are generally low paying and labour intensive.

Finally, the education dimension captures the skill level of youth and comprises (1) the proportion of youth with no secondary education, (2) the proportion of illiterate youth and (3) a measure of schooling quality in the form of harmonised test scores.

Dimensions of the KOF YLILI

Transition

- Share of youth not in education, employment, or training (Youth NEET)
- Relative unemployment ratio
- Skills mismatch

Working conditions

- Working poverty rate
- Underemployment rate
- Informal employment rate
- Vulnerable employment rate
- Share in elementary occupations
- Share in agriculture, fishery, or forestry

Education

- Share with no secondary education
- Illiteracy rate
- Harmonized test scores

Source: Kudrzycki et al. (2020)

1.2.3 The Youth Labour Market Index for Low-Income Countries (YLILI) for Senegal

All the required 12 indicators for the calculation of the YLILI are obtainable for Senegal. The last available year for the indicators ranges between 2011 (underemployment rate) and 2018 (harmonized test scores). Thus, the scores of the individual dimensions are not fully comparable as the year of data obtainment varies. Nonetheless, the YLILI gives a good comprehensive measure of a low-income country's youth labour market.

Senegal's score of 61.21 (out of a 100) approximately equals the average of all the countries for which the YLILI can be computed. This result leads to a rank of 27 out of 48 countries⁶. Senegal gets its highest score for the dimension *transition* (83.32) that is above average. This result suggests that the quantity of employment is relatively high. *Transition* is followed by *education* (51.33) and *working conditions* obtains the lowest score of 48.94. The latter two dimensions both have a score that is below average and accordingly obtained a rather poor rank of 37 (working conditions) and 38 (education) (Kudrzycki, Günther, & Lefoll, Youth Labor Market Index for Low Income Countries, 2020).

To conclude, despite the lower youth unemployment rate of Senegal compared to the OECD average (see Table 2), the conditions and the quality under which employment takes place is rather low. This illustrates the fact that unemployment rates only provide a unidimensional (and for many countries, misleading) picture of the labour market.

1.3 Senegal's Political System

Understanding the basics of a country's political system and getting to know the political goals with respect to its education system are crucial points for the understanding of the education system in a broader sense. In the first part, we explain Senegal's political system in general. The politics and goals regarding the education system will be referred to in the second part.

1.3.1 Overview of Senegal's Political System

Senegal is divided into 14 so-called *régions*, which consist of *départements* which, in turn, are subdivided into *arrondissements*, *communes*, rural communities and villages (or districts). The village corresponds to the basic administrative unit. The *régions* are allocated to one governor who is supported by two deputy governors. The head of the state of Senegal is the president who is elected by universal adult suffrage to a five-year term. The duration of the term of office had been reduced from seven to five years by an accepted referendum in 2016 which took effect in 2019 (Sall & Dionne, 2016). The president holds control over the executive branch and appoints the ministers. The National Assembly (unicameral legislature) is directly elected by popular vote. Senegal's 45 *départements* each form a constituency, from which one to seven deputies are elected by simple majority, depending on the number of inhabitants. Ninety seats are allocated in this process. Eight constituencies were created in 2017 for foreign voters, from which 15 seats are to be filled by a majority vote. The remaining 60 mandates will be allocated from the nationwide candidate lists according to the principles of proportional representation (Inter-Parliamentary Union, 2018).

⁶ For the YLILI ranking, a total of 82 lower-middle and low income countries were analysed. Only 48 of those were ranked, as the remaining 34 countries had too little data.

The Senegalese constitution was approved by voters in 2001 and proclaims a democratic and secular state, fundamental human rights, religious freedoms and individual and collective property rights. Furthermore, the constitution provides a centralized presidential regime with separation of judicative, executive and legislative powers (Encyclopaedia Britannica, 2020). However, the national assembly hardly ever launches new legislation or turns down the legislation proposed by the government. Moreover, the judiciary seems to be strongly under control of the executive authority, although it is constitutionally independent (Thomas & Sissokho, 2005).

Senegal played a crucial role in the modernisation of the political system in West Africa. Today, Senegalese citizens participate in the elections of the president, members of the National Assembly and regional and municipal councillors (Encyclopaedia Britannica, 2020). However, according to the Economist's Democracy Index, Senegal is classified as a hybrid between a full democracy and an authoritarian regime. The Economist evaluates the quality of democracy of almost all the countries in the world. The index ranges from 0 (full authoritarian regime) to 10 (full democracy). Senegal ranked 82th place among 167 countries in 2019. Still, with an index realisation of 5.81, Senegal lies above the Sub-Saharan African average of 4.26 (Economist, 2019).

Table 5 depicts the 6 different Worldwide Governance Indicators provided by World Bank (2019). The six indicators are based on over 30 underlying data sources reporting the perceptions of governance of a large number of survey respondents and expert assessments. The measure *estimate* ranges between -2.5 (weak governance) and 2.5 (strong governance). *Rank* equals the percentile rank of Senegal among all countries: lowest=0, highest=100 (Kaufmann, Kraay, & Mastruzzi, 2010).

Table 5: Worldwide Governance Indicator (WGI) for Senegal, 2018

Worldwide Governance Indicators (WGI)	Estimate	Rank (0-100)
Voice and Accountability	0.24	55.7
Political Stability and Absence of Violence/Terrorism	-0.09	42.9
Government Effectiveness	-0.27	42.3
Regulatory Quality	-0.11	49.5
Rule of Law	-0.21	47.6
Control of Corruption	-0.02	56.7

Source: own table based on World Bank (2019).

As we can see on Table 5, Senegal ranks best in the category *control of corruption*, followed by *voice and accountability*, which is a proxy of the ability of the citizens to participate in and select their government, as well as freedom of expression, freedom of association, and a free media. The other four indicators rank below the median of all assessed countries. Especially *government effectiveness*, which captures dimensions such as the perceptions of the quality of public and civil services and the degree of its independence from political pressures, is rather of low quality in absolute (-0.27) and relative terms (percentile rank of 42.2 %).

1.3.2 Politics and Goals of the Education System

The Senegalese education system shares many similarities with its French counterpart. The responsibility for the ability for every citizen to access education lies with the state. The guaranteed access to education for all children is anchored in constitutional law (Gouvernement du Sénégal, 2017).

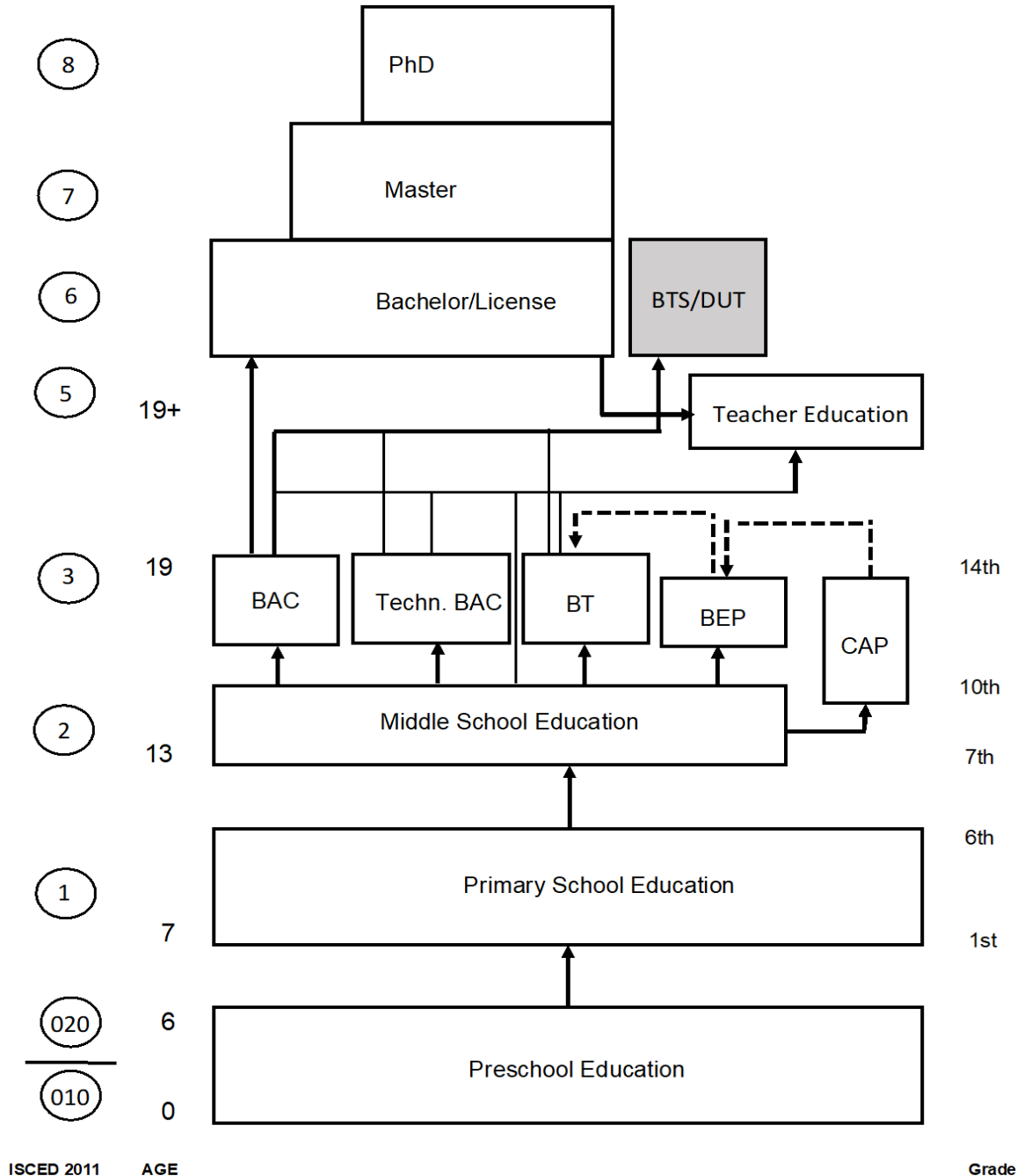
Compared to other sub-Saharan African countries, Senegal's expenditures for education are relatively high (Cissé & Fall, 2016). However, the large number of school drop-outs remains an issue. The gross intake ratio to the last grade of primary education – which measures the relative number of entrants that are expected to reach the final year of primary education – is 57.1%, which is rather low. Furthermore, despite the efforts of the government to improve participation in the educational system since the beginning of the new century, the gross enrolment ratio (GER) in the tertiary education remains low at a rate of 12.8% in 2018 (UNESCO, 2020).

The government of Senegal has defined education and training as one of their key priorities, as human capital development constitutes the second pillar of their development programme Plan for an Emerging Senegal (PES). After the evaluation of the Ten-Year Education and Training Programme in 2012, Senegal implemented a new education policy agenda for 2013-2025: The Programme for the Improvement of Quality, Equity and Transparency in Education and Training (PAQUET-EF). The PAQUET-EF comprises three main goals. First, the improvement of learning outcomes at all levels. Second, the promotion, diversification and integration of the education and training systems at all levels and third, the introduction of a results-based and effective sector governance. After the evaluation of the first phase, an updated plan named PAQUET-EF (2018-2030) was endorsed in 2018 (UNESCO, 2018).

2. Formal System of Education

The formal education system in Senegal consists of five levels: pre-primary, primary, middle school (lower secondary), high school (upper secondary) and higher education. Compulsory education lasts for 10 years between the age of 7 to 16 years (UNESCO, 2020b). Figure 2 shows a more detailed overview of the Senegalese education system with its various paths.

Figure 2: Senegal’s Education System



Source: Own display based on International Bureau of Education (2010), UNESCO (2020b).

Table 6: Net enrolment rate (NER) and gross enrolment ratio (GER), 2017

Educational level	ISCED 2011	Net Enrolment Ratio	Gross Enrolment Ratio
Pre-primary education	020	15.2%	16.5%
Primary education	1	75.4%	85.6%
Secondary education	2 – 3	37.7%	46.1%
Tertiary education	5 – 8	n/a	11.5%

Source: own table based on UNESCO (2020).

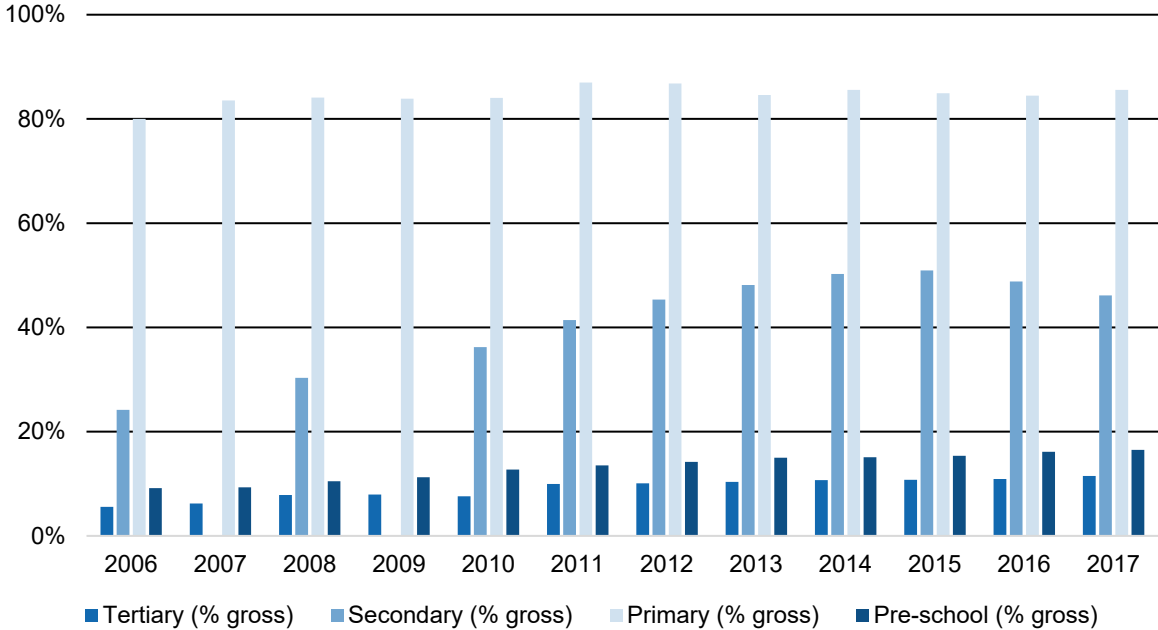
Table 6 shows the gross enrolment ratio (GER)⁷ and net enrolment ratio (NER)⁸ by education level for the year 2017. The NER quantifies the total number of students in the theoretical age group for a given education level enrolled at that level expressed as a percentage of the total population in that age group. The GER quantifies the number of students enrolled at a given education level—irrespective of their age—as a percentage of the official school-age population corresponding to the same level of education. For example, for the primary education level, the NER tells how many students in the typical primary school age are actually enrolled in primary school, while the GER sets the actual number of students in primary education—irrespective of their age—in relation to those who are in the official age to attend primary education⁹. GER and NER are based on official formal registration of the students and do not necessarily reflect effective attendance.

⁷ The UNESCO Institute for Statistics (UIS) (2017) defines the gross enrolment ratio as the “number of students enrolled in a given level of education, regardless of age, expressed as a percentage of the official school-age population corresponding to the same level of education.”

⁸ The UIS (2017) defines the net enrolment ratio as the “Total number of students in the theoretical age group for a given level of education enrolled in that level, expressed as a percentage of the total population in that age group.”

⁹ A gross enrollment ratio of 100 corresponds to a situation where each child in a given country is enrolled in the corresponding education level. A value above 100 could occur due to students who are older than the typical enrolment age for primary education (e.g. have to repeat grade, adult learners). A value below 100 implies that not everyone who is in the typical age for primary education is actually enrolled.

Figure 3: Evolution of the Gross Enrolment Ratio by education level, 2006-2017



Source: Own Table based on World Bank (2020b).

Figure 3 shows the evolution of the GER of the pre-school, primary, secondary and tertiary education level in Senegal between 2006 and 2017. As we can see, the GER at the primary level is by far the highest and increased by 7% between 2006 and 2017. Although the first part of the secondary education (middle school) is mandatory in Senegal, the GER at the overall secondary education level is strikingly low. It is suspected that many children even below the minimum working age of 15 are working instead of going to school. In 2015, it was estimated that 22.3% of children between the age of 5 and 14 are already working (International Labour Organisation, 2017). The GER is lowest at the tertiary education level. However, with a growth of 72% between 2006 and 2017, it increased the most among all the education levels in the period under consideration.

Household wealth is one of the key determinants for access to education, especially at the secondary level. In 2010, the net attendance rate¹⁰ of the poorest quintile of the population was 46% at the primary level, compared to 70% of the wealthiest quintile. Furthermore, only 15% of the poorest students attended secondary school, while the net attendance rate of the richest ones was 58% (World Bank, 2016).

¹⁰ The UNESCO Institute for Statistics (UIS) (2020) defines the net attendance rate as the “total number of students in the theoretical age group for a given level of education attending that level at any time during the reference academic year”

2.1 Administration of Senegal's Formal Education System

At the national level, the education system is run by the Ministry for National Education (MEN) which is assisted by other ministers which are responsible for certain areas and/or levels of education. There is an *Inspection d'académie* (IA) in each of the 14 regions. In addition, there exist 45 Departmental Education Inspections (IDE) in each *région* which are subordinate to the IA. The IA is responsible for all pre-university levels of education, both private and public. The IDE's field of competences lies in the areas of: (i) management of the budget and personnel that is allocated to the preschool and primary education level (ii) the organisation of the exams (iii) the collection and analysis of statistical data (iv) the planning and management of preventive maintenance and rehabilitation operations. On the lowest hierarchical level, the school principal ensures smooth running of the schools under his/her jurisdiction (UNSECO International Bureau of Education, 2010).

2.2 Pre-Primary Education

The Senegalese government aims to ensure care for young children from birth to their entry into the schooling system. Pre-school education consists of childhood care institutions, namely nursery schools, community day-care centres, community schools and the *cases des tout-petits*¹¹ (CTP). CTPs are similar to classic kindergartens in Europe. Children that attend pre-school are usually 3 to 6 years old. Pre-school education is not compulsory. However, at the end of their pre-school education, the children have the opportunity to enter the first year of primary education already at the age of 6 instead of the statutory age of 7. For the very young children between 0 and 3 years, the Ministry of Education focuses on parent training and early childhood development by the provision of the *cases des tout-petits*, other kindergartens and community day-care centres (UNSECO International Bureau of Education, 2010).

The pre-school education in Senegal has two main purposes¹². First, it should anchor children in national languages and cultural values and consolidate their identity. Second, pre-school education aims to promote the development of children's psychomotor, intellectual, and social aptitudes in order to develop their personality and lay the foundations for the subsequent education levels (UNSECO International Bureau of Education, 2010).

In 2007, there were 1'486 early childhood care establishments, while 51.4% of them were in the private sector. The capital city Dakar alone accounted for 57% of nursery schools and 36.9% of day care centres (UNSECO International Bureau of Education, 2010). In 2017, the NER and the GER of pre-school education (3-6 years) were 15.2% and 16.5%, respectively (UNESCO, 2020). The gender breakdown of the gross enrolment rate is slightly skewed to female children: 17.5% female and 15.5% male (World Bank, 2020b).

2.3 Primary and Lower Secondary Education

According to the General Policy Letter for Education and Training Sector, the main objective of the primary education in Senegal is to provide every child with a sound moral, civic, intellectual and practical foundation for a fulfilled life. Children enter the primary school at the age of 7. The duration of the primary school lasts six years which are divided in 3 cycles of 2 years. The curriculum of the primary school

¹¹ Loosely translated into English: toddler's huts

¹² On the basis of article 10 of Act No. 91-22 of 16th February 1991 on the orientation of national education.

mainly emphasizes French grammar and reading, science, math and geography (UNSECO International Bureau of Education, 2010).

Education in Senegal is compulsory and free of charge up to the age of 16. In 2017, the NER and GER in the primary school were 75.4% and 85.6%, respectively (UNESCO, 2020). The GER for girls was 12.5 percentage points higher compared to boys: 91.9% versus 79.4% (World Bank, 2020b).

After the successful completion of primary school, children enter middle school (lower secondary education) at the age of 13. Middle school lasts for another 4 years until the youths reach the age of 16. The successful transition from primary to middle school requires the completion of the Certificate of Elementary Completion (CFEE) and the passing of an admission test. The successful completion of the middle school requires the passing of the *Brevet de Fin d'Études Moyennes* (BFEM) (UNSECO International Bureau of Education, 2010).

The Senegalese education system consists of public schools, private schools, faith-based schools, and community schools. In general, the private schools can be classified into independent private schools and government funded private schools. Independent private schools are operated and funded by non-government providers. Government-funded private schools are owned and operated by private providers but receive financing from the government. Franco-Arab schools are a mix between religious community schools and private Secular schools. Arabic is of paramount importance to the population, 95% of which is Muslim. Franco-Arab schools offer a dual education in both French and Arabic (Global Dialogue, 2020). Community schools are established and operated by a local community and receive funds from the government on a regular basis (World Bank, 2016).

Furthermore, there are three main classifications of independent private schools in Senegal. First, there are private Catholic schools which are considered elite with high admission barriers regarding performance and income. Second, there are private Secular schools that are similar to the Catholic schools, but with less stringent admission requirements (World Bank, 2016). Third, there are Koranic schools called *Daaras*, which are community schools and very different compared to the other types of schools in Senegal. *Daaras* have a deep historical and social significance and are rooted in the spread of Islam in Senegal in the 11th century. *Daaras* represent alternative schooling which sets its emphasis on the teachings of the Koran (World Bank, 2017). However, the official and the Koranic schooling are not necessarily incompatible, since most of the children are sent to Koranic schools on weekends or during vacation (André, 2009).

In 2007, there were 829 private schools at the primary education level, which made up a fraction of 11.1% of the total school network. The share of private schools is especially large in the capital city Dakar, where private schools account for more than half (56.6%) of the whole school network. At the lower secondary level, roughly two thirds of the registered middle schools were public while the other third was made up by private schools in 2007. The percentage of students enrolled in public middle school institutions was 81% at the national level in 2007 (UNSECO International Bureau of Education, 2010). Between 2000 and 2012, the share of private schools of the gross enrolment rate at the primary level increased from approximately 11% to 14%. The share of the private enrolment rate at the overall secondary school level decreased during the same period. However, the share increased at the upper secondary level (World Bank, 2016).

2.4 Upper Secondary Education

After successful completion of the BFEM, Senegalese youths can choose between 3 main paths at the level of upper secondary education. They have the possibility to go to high school (“general” path) that lasts 3 years and is completed with the *baccalauréate* (BAC). Alternatively, they can opt for the long

technical, short technical or vocational path. The short path of the technical education lasts 2 years and is completed with the certificate BEP. The long technical path takes 3 years and ends with the technical *baccalauréate*. The vocational path also takes 3 years and is completed with the technician's certificate (BT).

In 2017, the NER and GER for the secondary education (lower and upper secondary education) were 37.7% and 46.1%, respectively (UNESCO, 2020). As on the other educational levels, the gender breakdown shows that relatively more female students enrol in the secondary education compared to male students: the GER for female students is 48.1% while the GER for male students is 44.2% (World Bank, 2020b). However, the difference is not as large as at the primary education level. There could be two explanations for the lower GER of male pupils on the secondary level. First, there are fewer men in the overall Senegalese population than women: There were 94.67 men per 100 women in 2015 (Knoema, 2020). Second, the share of men that enter the informal TVET system at the secondary level is higher than the share of women (World Bank, 2018).

2.5 Postsecondary and Higher Education

The Ministry of Higher Education, Research, and Innovation is the government authority responsible for the country's higher education (Republique du Senegal, 2019). There are currently five public universities in Senegal (African Universities, 2016). In addition, the number of private Universities has been rising in the last two decades (UNESCO, 2017b).

Usually, students are 20 years old when they enter higher education. Applicants for medicine programmes must be at least 18 years old, and at least 22 years old for dentistry and pharmacy programmes. Senegal's higher education is organized as a License/Bachelor-Master-Doctorate (LMD) system. The Bachelor usually lasts 2-3 years, the Master takes 1 to 2 years, and a Doctorate usually takes 2 years. However, the durations may differ for some subjects. For instance, medical studies consist of six years of study plus a one-year internship. University education is taught in French (UNESCO International Bureau of Education, 2010).

Students must apply directly to an institution and meet its admission requirements. The *baccalauréate* used to be sufficient in order to be admitted to university. Since 1993, however, the transition to higher education has been made such that universities decide on the basis of performance ranking of the applicants. Hence, since only a limited number of places are available at most of the universities, the *baccalauréate* does no longer guarantee admission to universities (UNESCO International Bureau of Education, 2010).

The costs that need to be incurred by students of private and public universities vary. The annual registration fee for public universities is 4'800 CFA (Equals 8.64 USD as of 14.08.2020) francs. The fees at private universities differ across institutions. To enrol in a private university, one can expect a registration fee of approximately 100'000 CFA francs. In addition, there is a tuition fee of approximately 50'000 CFA francs per month at private universities¹³ (Excel Africa, 2011).

The GER of the tertiary education was 11.5% in 2017. The NER is not available. With 14.4%, the GER for male students was 5.7 percentage points higher than for female students (8.7%).

¹³ All the fees refer to the year 2011.

2.6 Continuing Education (Adult Education)

There is only very limited information regarding the continuing education in Senegal. Nevertheless, there have been several programmes that address the illiteracy problem in the country during the last decades that are briefly worth mentioning in this subchapter.

The low literacy rate among adults has always been one of the major problems in Senegal. The adult literacy rate for women was only 20.3% in 2010-2011 (ANSD, 2011). This represents a severe problem, since women are the primary caregivers for children, and numerous studies have shown a relationship between the frequency of parent-child shared reading and literacy outcomes (Hume, Lonigan, & Mcqueen, 2015). The negative effect a deficit in the mothers' ability to support their children in regards to basic education has been recognized early. In 1983, the government of Senegal introduced an extensive programme to reduce the illiteracy rate. Within this action plan, there was the Literacy Project Prioritising Women (LPPW) funded by the World Bank. The LPPW was evaluated in 2002 and together with other projects, the lessons learned were implemented in a newly designed approach: the Adult Education Integrated Programme (AEIP) (Sall B. R., 2005).

2.7 Teacher Education

In Senegal, there are two ways of recruiting new teachers. On one hand, there is an examination process whose pass mark depends on the needs for new teachers in the respective district. On the other hand, applicants can also be recruited via a quota system (*quota sécuritaire*). The admission based on the quota is at the discretion of the Ministry of Education and depends on the requirements of the respective district (University of Sussex, 2020).

In order to become a pre-primary or a primary school teacher, applicants must be holders of the Certificate of Teacher Ability (CAP). The qualifications required to receive the CAP depend on the level of achieved education. For holders of the BFEM, a one-year teacher training course is required that leads to the basic certificate of teacher ability (CEAP) (UNSECO International Bureau of Education, 2010). After obtaining this certificate, applicants become assistant teachers. After 3 years of experience, they can apply for the CAP. Holders of the *baccalauréate* can directly apply for the CAP after a 1-year teacher training (Republique du Senegal, 2020).

The Teacher Training Colleges (EFI) provide the required initial training for students that are willing to apply for teacher positions at the pre-school and primary education level. The training integrates skills, abilities, and attitudes based on the knowledge of childhood in general and Senegalese in particular (UNSECO International Bureau of Education, 2010).

In order to be recruited as a teacher at middle and general upper secondary school level, the applicant must have at least the BAC as an academic qualification. Usually, holders of the BAC or licentiate (equivalent to a Bachelor's degree) are intended to teach at the lower secondary level, although some of them also teach at the upper secondary level. Teachers with academic qualifications of master or higher usually teach at the upper secondary level. The certificate required for teaching at the lower secondary level is the CAECEMG.

There are two different certificates that are required for the general and the technical and vocational path at the upper secondary education level. On the one hand, there is the CAES-CAESTP-CAEM for the general path (UNSECO International Bureau of Education, 2010). On the other hand, there is the

Certificate in Teaching Post-Primary¹⁴ Technical Education (CAEMTP) that has a duration of four years and the Certificate in Teaching Secondary Technical and Vocational Education (CAESTP) with a duration of 6 years (UNESCO-UNEVOC, 2015). In addition, an applicant for a teaching position at the general upper secondary level must hold the *maîtrise*. This is a diploma received after 1-2 years of study following the licentiate (State University, 2020).

Teachers for the Technical and Vocational Education and Training (TVET)¹⁵ at the upper secondary education level are trained at the School for Technical and Vocational Education (ENSEPT) in Dakar which belongs to the Cheikh Anta Diop University. Potential TVET teachers are required to have at least secondary education level education. In addition, the passing of an entry test is required for admission¹⁶ (UNESCO-UNEVOC, 2015).

¹⁴ Refers to the CAP that can be entered one year before the general middle school finishes

¹⁵ A detailed overview of the TVET system is given in chapter 3.

¹⁶ See chapter 3.6 for more detailed information.

3. The System of Vocational and Professional Education and Training

This section of the Factbook describes the vocational education and training (VET) system at the upper secondary level and the professional education and training system (PET) at the tertiary level in more detail. Thereby, the term vocational and professional education and training (VPET) refers to both, the VET and the PET system.

3.1 Technical and Vocational Education and Training (TVET)

As already discussed in chapter 2.3, there are three main paths on the upper secondary education level. At the age of 16/17, and upon completion of middle school by passing the BFEM, the Senegalese youths can choose between the general path, the long or short technical path, and the vocational path. The latter three paths are referred to as the formal Technical and Vocational Education and Training (TVET) system (*la formation professionnelle et technique*) at the upper secondary education level (TVET is an alternative term for VET). TVET in Senegal aims to train qualified workers to meet the demand of the labour market and the economy (UNESCO-UNEVOC, 2015). The long technical and the vocational path both last three years, while the short programme of the technical path can already be completed after two years (UNESCO International Bureau of Education, 2010). Graduates of the general path receive the BAC¹⁷, the long technical path is completed with the technical BAC, the short technical path with the BEP and the vocational path with the BT (UNESCO, 2020b). The TVET programmes at the upper secondary level are provided at technical high schools (*lycées techniques*) and in vocational education and training centres (UNESCO-UNEVOC, 2015).

In addition, there are other programmes classified at the ISCED 3 secondary level (also see. Figure 2), such as the programme for police inspectors and nursing assistants which are accessible with the BFEM. Furthermore, after the third year in middle school and at about the age of 16, there is the possibility to enter an alternative path of vocational education that has a duration of 3 years and ends with the Certificate of Professional Competences (CAP) (UNESCO, 2020b). The CAP prepares students for specific occupations such as electricians and auto mechanics and is usually the minimum level of education required by employers (ROCARE, 2011). As an alternative to a full time job, holders of the CAP have the option to enter the short path of technical education at the age of 19 (UNESCO, 2020b).

The BEP is similar to the CAP programme but covers a broader field of educational content. The BEP is sometimes used as a steppingstone to acquire the technician's certificate (BT). The latter is at the same level of training as the technical BAC but covers more specialised contents (ROCARE, 2011).

¹⁷ Sometimes referred to as the "scientific BAC" (vs. the technical BAC of the long technical path).

The TVET system in Senegal is composed of two parallel structures: The public structure is under the supervision of the Ministry of Technical Education and Vocational Training (METFP). Private institutions have an opening and operating order issued by the METFP. In 2010, there were 70 public and 143 private TVET institutions. Between 2007 and 2010, the percentage of students in the public sector was approximately 44%, compared to 56% in the private sector (METFP, 2010). In addition, more than half of the training supply is concentrated in the region around Dakar, which implies large regional disparities that constitute a disadvantage for young people who live in rural areas (World Bank, 2018). In 2010, 208 institutions (98%) were in urban areas, compared to 5 institutions (2%) in rural areas (ROCARE, 2011). Moreover, the offer of TVET programmes is mainly oriented towards the secondary and tertiary sector (Ministere de L'Economie, des Finances et du Plan, 2018). A fraction of 49.94% (7.02%) of the students enrolled in a public (private) TVET programme follow an occupation in the secondary sector, 48.83% (92.96%) in the tertiary sector and only 1.23% (0.02%) of students opt for a job in the primary sector (ROCARE, 2011).

The formal TVET system exhibits decent employment outcomes. Holders of a TVET degree are 74% more likely to find a job compared to those that only finished basic education. However, only 7.7% of those who completed basic education had access to formal technical or vocational training in 2017 (World Bank, 2018). According to the UNESCO Institute for Statistics (2020), the enrolment of the TVET system relative to the total enrolment on the secondary education level was only 3.9% in 2018.

The formal TVET programmes are school-based and do not contain a practical part where the students actively work at a company. As a consequence, there is a mismatch between the needs of the labour market and the formation of the labour force in the TVET system. Therefore, a large part of technical and vocational education and training takes place in the informal sector, mainly in the form of apprenticeships¹⁸. In Senegal, these informal apprenticeships make up the main route to skills development for younger people, especially for those that are coming from low income households. Based on the latest National Report on TVET statistics, there are approximately 418'000 youths in the informal TVET system compared to 54'318 students in the entire formal TVET system (UNESCO-UNEVOC, 2015).

The share of young people who take part in informal apprenticeships is especially high among those that have only completed primary school. In contrast to the formal education system (see chapter 2), the share of men in the informal vocational education and training system is higher than the share of women (World Bank, 2018).

According to a World Bank (2018) report with the title *Improving Youth Employability Through Informal Apprenticeship Project*, an apprenticeship in the Senegalese informal TVET system describes a working relationship between a master who instructs a less experienced (usually younger) person on-the-job. Since the apprentices are usually underage, the parents of the apprentice and the master enter into a "tacit contract". A typical apprenticeship has a duration of three to six years. Training takes place in "workshops" which are directed by the master. The educational content in those workshops is not based on a prescribed curriculum. Besides approximately three apprentices and a master, there are two additional employees in a typical working unit. Typical trades and occupations where these units operate are masonry, carpentry, mechanics drivers and hairdressing (especially for women). Capital endowment is low in those industries and, consequently, the labour intensity high (World Bank, 2018).

Apprenticeships by nature are demand-driven and thus advantageous for the labour market. According to the World Bank (2018), the likelihood of former apprentices to find work is higher for any given level of education. However, one major problem of the apprenticeships is the low quality of skill development. Due to the limited formation of the masters, the skills learned in the workshops are often lacking formation in high skill development, especially with regards to modern technology. In the context of the

¹⁸ Not to be confused with formalised apprenticeships common in other countries.

Plan for an Emerging Senegal that aims to massively expand its technology sector (see: African Development Bank Group (2020) or chapter 1 of this factbook for further information), this finding implies that the informal TVET system of Senegal is not prepared for this change yet (World Bank, 2018). An additional shortcoming of the informal apprenticeship system is its poorly developed (or even absent) employment arrangement mechanisms. Recruitment is mostly based on family or social networks. According to the World Bank (2018), only 10% of all apprentices have expanded their search-sphere beyond family and friends. Systematic mechanisms to identify and certify competences (acquired in the formal and/or informal education sector) are largely absent but could help to promote competency-based recruitment and increase the youth's interest in acquiring certified knowledge and skills. As already indicated above, there are little to no standards in regards to the the formation of masters, although there are some existing structures such as the Professional Associations of Craftpersons (OPAs) and Chambers of Trade (World Bank, 2018).

3.2 Professional Education and Training (PET; Post-Secondary Level)

The two main types of institutions where TVET programmes at the tertiary level are provided in Senegal are the High School of Technical and Vocational Education and the Higher Polytechnic School (UNESCO-UNEVOC, 2015). TVET at the tertiary level is an alternative term for PET.

Holders of the BAC (general and technical) or the BT can apply for the higher technician certificate (BTS) which usually lasts two to three years (UNESCO-UNEVOC, 2015). The BTS allows holders of a BT or a technical/scientific BAC to obtain a professional diploma. Within that path, students can choose between different tracks. The programmes usually start with initial training. Subsequently, the courses mainly consist of conveying technical knowledge. The content of the courses is made up of theoretical sessions that also consists of generic topics such as math and modern languages (Ecole Supérieure Polytechnique, 2020). However, the main focus lies on courses related to the respective profession which is dependent on the chosen specialization. The training is directly linked to the labour market and thus allows professional integration (ROCARE, 2011).

For BAC holders, an alternative to the BTS is to apply for programmes that are completed with the University Technology Diploma (DUT) which last for two to three years. The offered technical subjects range from biology to electrical engineering (Ecole Supérieure Polytechnique, 2020).

3.3 Regulatory and Institutional Framework of the TVET System

3.3.1 Central Elements of TVET Legislation

The laws and decrees that constitute the central elements of the TVET legislation are listed chronologically below:

The General State of Education and Training (EGEF) (1981) established the National Commission for Education and Training Reform to restructure the TVET system (UNESCO-UNEVOC, 2015).

Decree n° 96-1136 (1996) transfers TVET competencies to the regional and rural communities (UNESCO-UNEVOC, 2015).

Law n° 2004-24 (2004) ratifies the 2003 Economic Community of West African States Protocol on Education and Training. The Protocol established the Economic Community of West African States Fund for Education and Training. Furthermore, the law emphasizes the importance of the TVET system in improving socio-economic conditions (UNESCO-UNEVOC, 2015).

Law n° 2004-37 (2004) has revised the Education Orientation Law from 1971 and 1991 and defines TVET as vocational and educational programmes that are taught at school and higher education institutions in order to receive theoretical knowledge, practical-, technical-, and vocational skills as well as on-the-job skills acquired by working in companies. In addition, the law states that all youths under the age of 16 should be familiarised with TVET programmes (UNESCO-UNEVOC, 2015).

3.3.2 Key Actors

Government

The administration of the (formal) TVET system is in the responsibility of the Ministry of Vocational Education, Apprenticeship and Crafts (MFPAA) in collaboration with the MEN. More specifically, the Directorate for Vocational and Technical Training is responsible for implementing TVET-related government policies. Moreover, the Directorate is in charge of improving and developing the structures related to the TVET system on the national level (UNESCO-UNEVOC, 2015).

The IA is responsible for the general development of the TVET system on national, regional and local levels under the supervision of the MFPAA and MEN. The IA is supported by the Education and Training Inspection authorities (IEF), which is in turn supervised by the IA (UNESCO-UNEVOC, 2015).

Representation and advisory bodies

In addition to the state, several organisations other support the TVET system financially, and as advisory bodies. Most of the reforms are developed in collaboration with the Senegalese state, international organizations, and Senegalese unions. For instance, The Platform of Expertise in Vocational Training for Africa (PEFOP) is financed by the French Development Agency (AFD), and it will support the implementation of TVET policy reforms in sub-Saharan Africa and strengthen public and private actors in charge of their implementation (UNESCO-UNEVOC, 2020).

Education and training providers

The TVET programmes at the upper secondary level are provided at technical high schools (*lycées techniques*) and in vocational education and training centres. TVET programmes at the tertiary level are provided at the High School of Technical and Vocational Education and the Higher Polytechnic School (UNESCO-UNEVOC, 2015).

3.4 Educational Finance of the VPET System

The Senegalese TVET system is financed by the state, the private sector, and international cooperation. Examples for such international cooperation are the AFD, the Luxembourg Agency for Development Cooperation and the Cooperation Wallonie Brussels. Funding from the state is provided by the MFPAA and MEN in alliance with the Ministry of Economy and Finances (MEF) (UNESCO-UNEVOC, 2015). In 2014, out of a total budget of just over CFA 30 billion (USD 54 million; exchange rate as of 28.08.2020), external financing accounted for 12.64% (International Labor Organisation, 2019). In the new sector

policy letter for Education and Training, it is planned to increase the proportion of training and technical education in the total budget for education to 15% in 2020 (MFPAA, 2015).

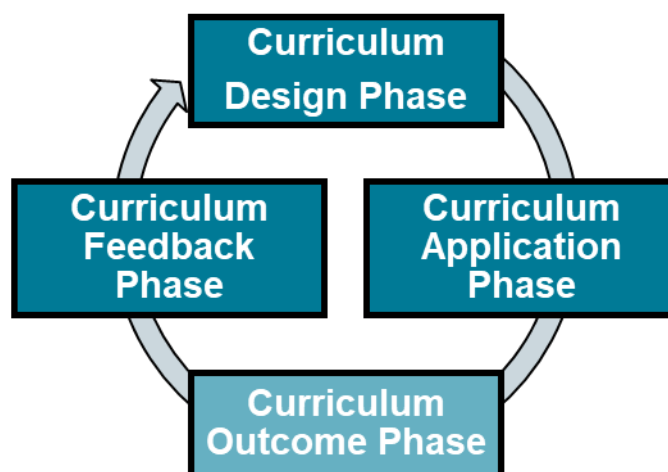
Following the observation that the provision of financial resources for vocational training remains unsatisfactory, it was recognized that it is urgent to give a new impetus to the sector's financing policy. Consequently, the Government of Senegal, with the support of development partners such as the World Bank and the AFD, set up a fund (3FPT) in 2014 in order to optimize available means and mobilize additional resources to meet growing training needs. The fund is responsible for: (i) mobilizing the necessary resources for the TVET system; (ii) financing initial training actions as well as continuing training actions for company personnel, job seekers and people with integration projects; (iii) controlling the use of the funding allocated; (iv) ensuring the effectiveness of the actions implemented; (v) conducting prospective studies on the economic development and employment environment; (vi) support companies and vocational and technical training institutions in the identification and formulation of their training programs (International Labor Organisation, 2019).

The financial resources of the Fund are made up of: (i) resources allocated by the State; (ii) a lump-sum contribution; (iii) funding provided by development partners under conventions and agreements concluded with the Government, (iv) resources generated by the Fund's activities, (v) donations and legacies, and (vi) any other revenue authorized by laws and regulations. The beneficiaries are public and private vocational and technical training institutions, companies, and legally constituted professional organizations and associations. To access funding, beneficiaries who meet the eligibility criteria defined for each category must apply and fill out the required forms and templates. In 2014, the 3FPT funded 166 training projects, 12,628 workers have been qualified and 82 establishments have been financed (International Labor Organisation, 2019). Between 2016 and 2018, the TVET system received CFA 12.3 billion (~USD 22.1 million, exchange rate as of 09.09.2020) from the fund (République du Sénégal, 2020).

3.5 Curriculum Development

The curriculum is a central element for the functioning of a TVET system because it defines the framework and the (quality) standards for the education system. The development of a curriculum can be decomposed into a three-step process with a curriculum design, a curriculum application, and a curriculum feedback phase. This theoretical concept is called the Curriculum Value Chain and is depicted in the picture below (CVC; for more details see Renold et al., 2015; Rageth & Renold, 2019).

Figure 4: Curriculum Value Chain



Source: Renold et al. (2015) and Rageth & Renold (2019).

In the curriculum design phase, the relevant actors decide upon VET curriculum content and qualification standards. Therefore, the discussion in the respective subchapter below focuses on the degree and the amount of stakeholder participation concerning curriculum design in Senegal. The curriculum application phase revolves around the implementation of the curriculum. Because learning environments differ substantially across countries, especially with respect to the prevalence of workplace learning, the curriculum application phase subchapter in this factbook focuses on those learning environments. Specifically, it addresses where learning takes place and whether the curriculum dictates both school and workplace learning or only one of the two. Finally, curriculum outcomes can be collected and analysed in the curriculum feedback phase. This evaluation process is important because it may render a more refined curriculum design than was possible in the first place.

3.5.1 Curriculum Design Phase

In order to ensure that the skills taught in the VPET programmes correspond to the needs of the labour market, experts from companies should be involved in defining the qualification standards and learning contents of the curricula.

As already discussed in chapter 3.3.2, the MFPAA and the MEN are responsible for the administration of the TVET system and thus also for the design of the curriculum. Since 1996, the Senegalese education system has been switching from a content-based to a competency-based approach (CBA). The implementation and generalization of the new curriculum took place in 2010. A team of drafters led by the Permanent Technical Secretariat (STP¹⁹) produced the pedagogical materials for the reform (UNSECO International Bureau of Education, 2010). The CBA was implemented in the TVET system in the context of a national reform introduced by the MFPAA in 2012 (UNESCO-UNEVOC, 2015).

3.5.2 Curriculum Application Phase

The way in which a curriculum is implemented—especially with respect to learning environments—is important to achieve the intended learning outcome.

The formal Senegalese TVET programmes are school-based. However, there have been initiatives and reforms in the last decade that address the mismatch between the labour market needs and the formal TVET system. In the context of the introduction of the CBA in 2012, Senegal has attempted to integrate

¹⁹ French: *Secrétariat Technique Permanent*

non-formal (i.e. apprenticeships) and formal (i.e. theoretical education) skills training in a dual system (for more detailed discussion, see chapter 4.1). Dual training refers to training whereby learning takes place in an integrated manner at two locations: in an enterprise (practical training) and in a technical training institution (theory training) (World Bank, 2018).

3.5.3 Curriculum Feedback Phase

The IA and IEF are responsible for the assurance of the quality of TVET programmes, while the Directorate of Examinations, Vocational Examinations and Certification (DECPC) is in charge of assuring the quality of TVET examinations. Specialized inspectors and secondary education inspectors are responsible for monitoring the quality of learning, teaching and the coordination and harmonization of the chosen educational approaches. Those inspectors are directly supervised by the IA. The Directorate for Vocational and Technical Training (under the supervision of the MFPAA) are responsible for the supervision and monitoring of the administrative, educational and financial management and the quality of public and private vocational training structures which provide training for all the different TVET paths at the secondary and tertiary level (except of DUT) (UNESCO-UNEVOC, 2015).

3.6 Supplying Personnel for the VPET System (Teacher Education)

As already mentioned in chapter 2.7, the ENSEPT (which is part of the Cheikh Anta Diop University) of Dakar is responsible for the formation of TVET teachers. Teachers must at least have secondary level qualifications. In addition, applicants must pass an entry examination to be admitted (UNESCO-UNEVOC, 2015). The ENSEPT gives three qualifications. First, the Certificate in Teaching Post-Primary Technical Education (CAEMTP) that has a duration of four years. Second, The Certificate in Teaching Secondary Technical and Vocational Education (CAESTP) with a duration of 6 years and third, the Certificate of Aptitude for the Functions of Psychologist (CAFPC) which also lasts 6 years. The latter concerns the formation of future advisers for staff that are responsible for educational and vocational guidance (ENSEPT, 2020).

Furthermore, there is the School for Home and Social Economics and Training (ENFEFS) that provides initial and continuing training in the field of home economics and social areas but also conducts research on improving vocational training. The ENFEFS is a public institution and belongs to the MFPAA. In the context of TVET teacher formation, the ENFEFS provides the Certificate in Teaching Home and Social Economics (UNESCO-UNEVOC, 2015).

In rural areas, teachers-to-be are educated at the National Training Center for Technical and Practical Teachers (CNFMETP) of Kaffrine, a town located in central Senegal. The CNFMETP mainly aims to train technical vocational future teachers in the area of rural crafts (UNESCO-UNEVOC, 2015).

4. Major Reforms in the Past and Challenges for the Future

4.1 Major Reforms

As already mentioned in chapter 3.2, one of the key challenges of the TVET system in Senegal is the missing link between the labour market and the TVET system. The National Strategy for Economic and Social Development (2013-2017) stresses this mismatch and proposes the following reforms: First, apprenticeship training must be integrated in TVET programmes. Second, the reform promotes employment-oriented vocational training programmes by decentralization (UNESCO-UNEVOC, 2015).

As already indicated in chapter 3.5, a national reform was introduced in 2012 by the MFPAA and proposed a new competency-based approach (CBA) for TVET programmes with the aim to improve the work skills and competences of the future workers that are relevant for the respective work place (UNESCO-UNEVOC, 2015). In addition, Senegal has attempted to integrate non-formal (i.e. apprenticeships) and formal (i.e. theoretical education) skills training in a dual system (World Bank, 2018). However, according to a report of the International Labour Organisation (2019), the infrastructure of the education providers in the Senegalese TVET system is not suitable for the implementation of such a dual TVET system.

The largest and most important reform that is still going on is The Programme to Improve the Quality, Equity and Transparency of the Education and Training Sector PAQUET-EF (2013-2025) that aims to improve three aspects of the TVET system: access, quality, and governance. These three aspects will briefly be addressed in the following subsections.

Access to TVET system

To bring the supply and demand of training into balance, several strategies have been developed. The first goal is to strengthen traditional approaches by improving the facilities of craft workshops and increasing the capacity of master trainers that are responsible for the implementation and monitoring of training. Second, the use of training centres for the training of teachers are to be increased. Third, the network of the TVET should be expanded in order to enable rural and urban populations to have access to multifunctional centres that provide skills-training and fourth, mobile training centres should be established in order to provide training and education in rural areas (UNESCO-UNEVOC, 2015).

Quality of the TVET system

This aspect mainly refers to the curriculum value chain. The PAQUET-EF aims to introduce methodologies for the curriculum value chain that integrates curriculum developers and trainers who are familiar with competency-based education (CBE). In addition to this, the curricula should be revised on a regular basis according to CBE models. Furthermore, staff qualifications should be increased by training sessions, and the provision of the appropriate infrastructure for the institutions should be improved (UNESCO-UNEVOC, 2015).

Governance of the TVET system

Coordination and management structures should be strengthened. On the one hand, this can be achieved by aligning the legislative framework with the new strategies and implementing necessary measures to enforce the legislative regulations. Another key aspect is the necessity of a better orientation and guidance concerning TVET programmes. The public should be informed about admission requirements, different pathways etc. Moreover, the Senegalese state should develop their partnerships with the various organisations that are currently taking part in the TVET system (UNESCO-UNEVOC, 2015).

4.2 Major Challenges

Most of the major challenges that the Senegalese TVET system is confronted with were already implicitly discussed in the previous chapter. The major challenges listed in the PAQUET-EF provide a good summary:

(i) Improve the links between TVET and the demands of the labour market and areas of potential future economic development (e.g. technology sector); (ii) improve and integrate the traditional apprenticeship system into the formal TVET system; (iii) increase the number of students enrolled in TVET programmes (the goal is that at least 30% of basic education leavers enter the TVET system by 2025); (iv) develop well-built partnerships between public and private companies and professional organisations (v) enhance the access for girls in industrial sectors; (vi) strengthen the qualification of trainers and implement processes that control the quality of technical and vocational training; and (vii) support the transition of graduates from the TVET system into the labour market (UNESCO-UNEVOC, 2015).

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