# 1 Introduction and context

Amidst geopolitical challenges and economic disruptions, Armenia has demonstrated remarkable resilience and growth. This introductory chapter looks at recent economic performance, with a specific focus on the growing ICT sector. It highlights the pivotal role of SMEs in the economy and provides insights on Armenia's progress in the implementation of SME policies.

# Introduction and structure of the report

This report aims to provide a comprehensive analysis of Armenia's digital transformation efforts and their implications for SMEs, offering insights into the challenges, opportunities, and policy recommendations to foster SME digitalisation. Chapter 1 provides a detailed overview of Armenia's current economic landscape, emphasising the role of SMEs and the implementation of SME policies since 2020. Chapter 2 delves into the core elements of the framework conditions for Armenia's digital transformation. This chapter outlines relevant policy initiatives and highlights the involvement of both public and private sector stakeholders committed to advancing SME digitalisation. Chapter 3 examines existing data on the current state of SME digitalisation and presents the results of an in-depth sectoral study. The analysis provides insights into the digital maturity level of SMEs across various industries, revealing the specific challenges and hurdles encountered within and across sectors. Building upon this analysis, Chapter 4 presents targeted and actionable recommendations aimed at overcoming barriers and fostering a conducive environment for SMEs to embrace digital technologies and reap the benefits offered by digitalisation.

#### **Economic context**

Armenia has faced several economic disruptions in recent years, notably the COVID-19 pandemic and, more recently, the conflict with Azerbaijan (World Bank, 2023[1]). Despite these challenges, the economy has experienced steady growth since 2020, registering 12.6% real GDP growth in 2022 and 9.4% in 2023, on preliminary estimates (World Bank, 2024[2]). This growth acceleration was fuelled by an influx of migrants, businesses, and capital following Russia's full-scale invasion of Ukraine. In 2022, Armenia was the fastest-growing country in Eastern Europe and Central Asia (World Bank, 2023[1]). Growth has been driven chiefly by the IT, trade, and transport sectors (International Monetary Fund, 2023[3]). The International Monetary Fund (IMF) expects growth of around 4.5% in 2024 (International Monetary Fund, 2024[4]).

In 2022, industry and agriculture accounted for 18.5% and 10.4% of GDP respectively, with the latter's significance in the economy steadily declining over the past decade (OECD/EBRD,  $2023_{[5]}$ ). Meanwhile, the information and communications technology (ICT) sector has experienced rapid annual growth, expanding by over 20% and generating 4.5% of Armenia's GDP in 2023 (Central Bank of Armenia,  $2023_{[6]}$ ). Much of the influx of Russian human and financial capital in 2022 was into IT. The real estate market also experienced a boost, leading to increased rental rates and driving growth in construction and services (Central Bank of Armenia,  $2023_{[6]}$ ).

Exports surged by 75% in 2022, reflecting shifts in regional supply chains and trade patterns amidst the ongoing war in Ukraine (Central Bank of Armenia, 2023<sub>[6]</sub>). According to the World Bank, in 2023, exports and imports grew by 55% and 40%, respectively. (World Bank, 2023<sub>[1]</sub>). The robust trade growth, particularly of goods, during the first half of 2023 can be attributed chiefly to the rerouting of exports to Russia (World Bank, 2023<sub>[1]</sub>).

Inflation surged in 2022 following Russia's invasion of Ukraine, but it came down in 2023 and prices in the second half were largely stable, thanks to the implementation of a proactive monetary policy, an appreciation of the exchange rate, and declining prices in the food and transport sectors (World Bank, 2023<sub>[1]</sub>; International Monetary Fund, 2023<sub>[3]</sub>). Inflation decreased from 8.6% in 2022 to 3.1% during January-August 2023, and consumer price inflation was just 0.1% y-o-y in October 2023 (World Bank, 2023<sub>[1]</sub>). Fiscal management has been prudent, with the government recording small deficits in 2022 and 2023. The draft 2024 budget aims to maintain macroeconomic stability, moderate debt levels, and support priority social and capital expenditures.

Strong macroeconomic performance has helped Armenia respond to the socio-economic challenges posed by the the arrival of over 100,000 persons forcibly displaced from Nagorno Karabakh in late 2023, including by providing cash support to address essential needs, offering temporary shelters, and extending financial aid to cover accommodation and utility expenses (International Trade Administration, 2023<sub>[7]</sub>). The upper middle income poverty rate in the country is reckoned to have declined from 51.7% in 2022 to 36.6% in 2023<sup>1</sup>, due to the robust economic growth observed in 2022-23 (World Bank, 2023<sub>[8]</sub>) However, these projections do not account for the potential effects related to the current geopolitical circumstances.

#### ICT sector

As highlighted above, the ICT sector has grown tremendously in recent years, and it has demonstrated enormous potential for growth, as evidenced by the active engagement of over 3,000 firms employing 20,000 workers and generating an annual revenue exceeding USD 1 billion (International Trade Administration, 2023<sub>[7]</sub>).

Armenia's ICT landscape encompasses several established business areas, including software development, web design, IT services, and app development, as well as emerging domains such as data science, artificial intelligence, quantum computing, and electronic design automation. The government is actively fostering the sector's growth, in accordance with the main objectives of the Digitalisation Strategy of Armenia for the period 2021-2025 (DSA). At the same time, it is collaborating with international donors to enhance the sector's competitiveness through different initiatives (see Chapter 2). The government is committed to supporting the development of the country's high-tech landscape, introducing various initiatives including technology centres, innovation districts, free economic zones, and tax privileges aimed at incentivising startups (International Trade Administration, 2023[7]).

Backed by government support, a skilled talent pool, and favourable operating costs, Armenia is working to position itself as an attractive destination for tech-related investments. Since 2022, the sector has been further boosted by the relocation of Russian IT specialist and enterprises. According to government officials, around 2000 high-tech companies moved to Armenia in 2022, most of which were of Russian origin. Nevertheless, businesses report that they face challenges in scaling operations and addressing talent shortages. Moreover, the proportion of enterprises in the ICT sector is relatively small (around 7%); around half of the SMEs in Armenia are engaged in low value-added activities, such as wholesale and retail trade (International Trade Administration, 2023<sub>[7]</sub>).

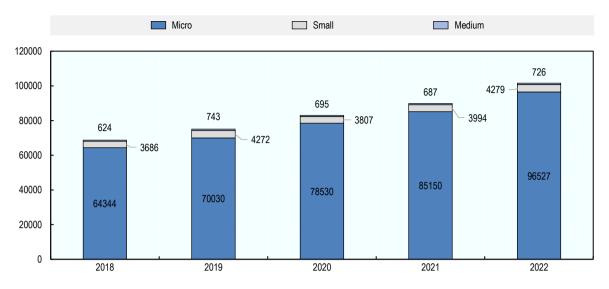
Finally, the sector's heavy reliance on exports, makes it sensitive to fluctuations in the foreign currency market (OECD/EBRD, 2023<sub>[5]</sub>). In addition, foreign ownership plays a significant role, with approximately a third of ICT firms in the country being foreign-owned, primarily by entities in the United States (International Trade Administration, 2023<sub>[7]</sub>).

#### **SME** sector

Armenia's definition of micro, small, and medium-sized enterprises, which has remained consistent since 2011, aligns with all criteria set by the EU, namely employment (≤ 250 employees), turnover (AMD 1 500 million, equivalent to EUR ~3 557 million), and balance sheet (≤ AMD 1 000 million, equivalent to EUR ~2 371 million) (OECD/EBRD, 2023<sub>[5]</sub>).

Between 2018 and 2022, the number of small and medium-sized enterprises (SMEs) almost doubled, increasing from 68,654 to 101,532 (Figure 1.1).

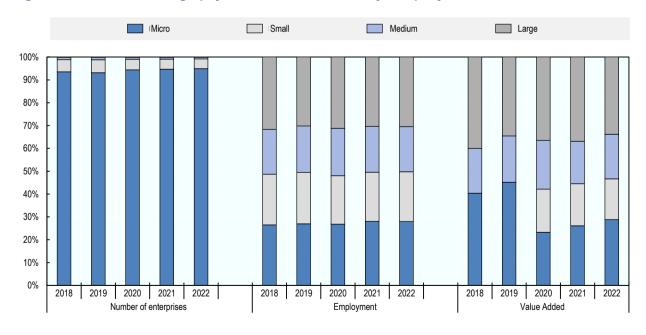
Figure 1.1. Number of Armenian SMEs by enterprise size, 2018-2022



Sources: (ARMSTAT, 2019[9]), (ARMSTAT, 2020[10]), (ARMSTAT, 2021[11]), (ARMSTAT, 2022[12]), (ARMSTAT, 2023[13])

In 2022, SMEs comprised nearly 99.9% of all enterprises, with micro-enterprises accounting for up to 95.1% of SMEs and 94.9% of all firms. In addition, it is worth noting that 54% of microenterprises do not employ any employees. SMEs also collectively accounted for 69.5% of total employment, generated up to 66.2% of gross value added, and accounted for 71.1% of turnover (Figure 1.2).

Figure 1.2. Business demography indicators in Armenia, by company size, 2018-2022



Sources: (ARMSTAT, 2019<sub>[9]</sub>), (ARMSTAT, 2020<sub>[10]</sub>), (ARMSTAT, 2021<sub>[11]</sub>), (ARMSTAT, 2022<sub>[12]</sub>), (ARMSTAT, 2023<sub>[13]</sub>).

The bulk of Armenian SMEs are concentrated in low value-added activities, with 51.9% operating in wholesale and retail trade (Figure 1.3). Although the shares of SMEs across most sectors have seen

minimal changes between 2018 and 2022, the wholesale and retail sector witnessed a decrease of 12.3 percentage points, while the ICT and transport and storage sectors increased by 4.3 and 3.6 percentage points respectively, reaching 7.4% and 6.2% of SMEs in all sectors respectively. Nevertheless, the wholesale and retail sector in Armenia attracts a greater number of SMEs compared to other EaP countries, comprising approximately one-third of SMEs operating within this sector. Overall, the sectoral distribution of SMEs in the EaP countries results to be more concentrated in selected industries when compared to SMEs in the Visegrád Group, which prioritise professional, scientific and technical activities, alongside construction activities, thereby showcasing a more diversified presence across sectors.

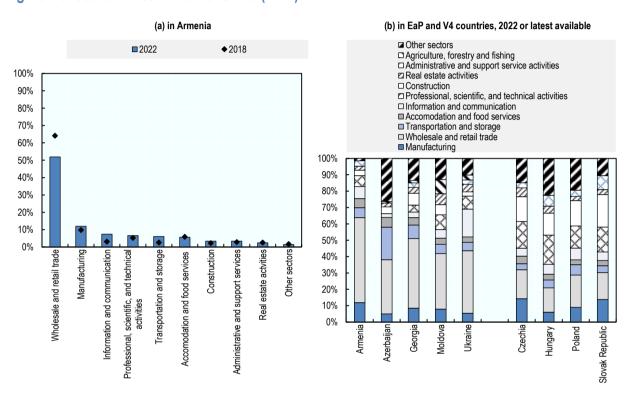


Figure 1.3. Sectoral distribution of SMEs (2022)

Note: **Panel a:** The wholesale and retail trade sector also includes the repair of motor vehicles and motorcycles. Other sectors include mining and quarrying; electricity, gas, steam, and air conditioning supply; water supply, sewerage, waste management, and remediation activities; and the repair of computers and personal and household goods. **Panel b:** 2022 data for Visegrád and EaP countries. Other activities include the "other sectors" cited in the left chart, as well as agriculture, forestry, and fisheries for Armenia and V4 countries, as the breakdown for that category is not available.

Source: (ARMSTAT, 2019<sub>[9]</sub>), (ARMSTAT, 2023<sub>[13]</sub>), OECD calculation based on data from National Bureau of Statistics of Eastern Partner Countries; Eurostat for V4 countries.

SMEs in Armenia are mostly concentrated in Yerevan. In 2022, SMEs in the capital accounted for 52.7% of the total, produced 73% of SME turnover, and accounted for around 65% of SME employment (ARMSTAT, 2023<sub>[13]</sub>). The other SMEs are dispersed across the regions, with notable concentrations observed in areas closer to the capital, such as Kotayk, Ararat, and Armavir.

### Armenia's progress in the implementation of SME policies

The SME Policy Index is as a benchmarking tool used to evaluate progress in the implementation of SME policies. Originally established in 2006 by the OECD in collaboration with the European Commission, the

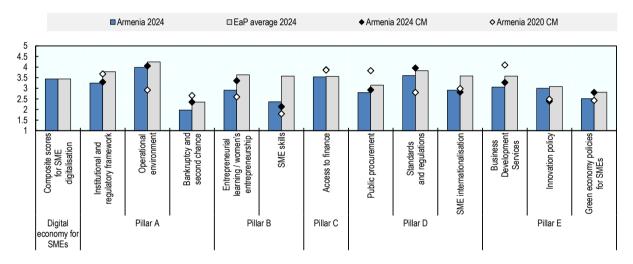
European Bank for Reconstruction and Development (EBRD), and the European Training Foundation (ETF), this index has been periodically applied to the Eastern Partnership (EaP) since 2012.

The Index is organised around five thematic pillars, subdivided into 12 aspects aligned with the 10 principles outlined in the EU's *Small Business Act for Europe* (SBA). It also incorporates priorities from the EU's SME Strategy for a Sustainable and Digital Europe and the OECD Recommendation on SME and Entrepreneurship Policy. In its 2024 edition, the SME Policy Index expanded its focus beyond the traditional 12 dimensions to include an evaluation of digital economy framework conditions and policies related to SME digitalisation.

Armenia has made modest progress since the previous assessment in 2020. The country performed around the EaP average in four dimensions, including operational environment (3.99)<sup>2</sup>, access to finance (3.54), standards and technical regulations (3.60), and innovation policy for SMEs (3.00). However, its scores lag behind the EaP average in the remaining eight dimensions, notably, in areas such as bankruptcy and second chance, SME skills, and green economy. Armenia reached a composite score of 3.44 for its SME digitalisation policies, underpinned by a robust policy framework for digitalisation.

Figure 1.4. SBA Assessment score for Armenia (2023)

Country scores by dimension, 2024 and 2020 vs 2024 CM



Note: CM stands for comparable methodology. As the 2024 Small Business Act (SBA) assessment questionnaire underwent a major revision, both 2024 scores and 2020 scores have also been recalculated using a comparable methodology that allows an indication of the direction and magnitude of the policy changes.

Source: (OECD/EBRD, 2023[5]).

# References

ARMSTAT (2023), Small and Medium Entrepreneurship in the Republic of Armenia,

https://armstat.am/file/article/sme\_bul\_2023\_en.pdf.

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#### **Notes**

[1]

World Bank (2023), The World Bank in Armenia,

https://www.worldbank.org/en/country/armenia/overview.

<sup>&</sup>lt;sup>1</sup> Measurement based on the upper middle-income country poverty line of USD 6.85/day (2017 PPP).

<sup>&</sup>lt;sup>2</sup> Scores between 1 and 5 are used to assess the level of policy reform for each sub-dimension and dimension, with 1 being the weakest level and 5 being the strongest.



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