

UNECE

Regulatory and Procedural Barriers to Trade in Armenia

Needs Assessment



UNITED NATIONS

UNITED NATIONS ECONOMIC COMMISSION FOR EUROPE

Regulatory and Procedural Barriers to Trade in Armenia: Needs Assessment



United Nations
New York and Geneva, 2019

Note

The findings, interpretations, and conclusions expressed herein are those of the author(s) and do not necessarily reflect the views of the United Nations or its officials or member States.

This publication is issued in English and Russian only.

Requests to reproduce excerpts or to photocopy should be addressed to the Copyright Clearance Center at: copyright.com

All other queries on rights and licences, including subsidiary rights, should be addressed to:

United Nations Publications

300 East 402nd St

New York, NY 10017

United States of America.

Email: publications@un.org

Website: <https://shop.un.org/rights-permissions>

ECE/TRADE/452

UNITED NATIONS PUBLICATION

<i>Sales No.:</i> E.19.II.E.28 ISBN: 978-92-1-117208-9 e-ISBN: 978-92-1-004287-1
--

Copyright © 2019 United Nations
All rights reserved worldwide
United Nations publication issued by the Economic Commission for Europe

Foreword

Located in the Southern Caucasus, Armenia is a small upper-middle income landlocked country that is striving to achieve structural transformation towards increased specialization in high-value added activities. Trade development ranks high on the Government's agenda as a vehicle for enabling enterprises, particularly micro, small and medium enterprises, to achieve the much needed economies of scale and scope.

This strategic orientation finds its strongest expression in the Government's renewed regional integration efforts, which saw the country join the Eurasian Economic Union (EAEU) in 2015 and the Comprehensive and Enhanced Partnership Agreement (CEPA) with the European Union in 2017.

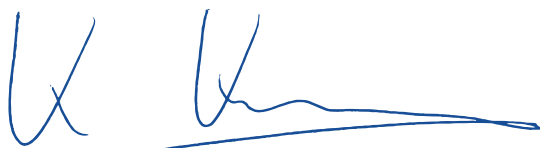
Reaping the expected benefits requires addressing regulatory and procedural barriers throughout the international supply chains. This study identifies these barriers and makes action-oriented recommendations on how to overcome them.

The study integrates the outcome of the stakeholder meeting organized on 13 May 2019 by the Ministry of Economy (previously the Ministry of Economic Development and Investments) in Yerevan, Armenia to discuss the initial results and recommendations. The recommendations are geared to support the country's efforts to:

- Complete the transition towards a paperless trading system
- Achieve successful implementation of its commitments under the World Trade Organization (WTO) Agreement on Trade Facilitation Agreement
- Develop the national quality assurance system, particularly by ensuring international recognition of conformity assessment results issued by Armenian bodies
- Further develop the national system of metrology
- Develop the manufacturing enterprises' technological capability, understood as the accumulated knowledge and skills to identify, appraise, utilise and improve on existing technologies and production techniques or develop new ones to modernize production processes and venture into new innovative production activities.

By generating supply chain efficiencies and supporting enterprise development, the recommendations will help drive progress on multiple Sustainable Development Goals (SDGs): Goal 7 on affordable and clean energy, Goal 16 on peace, justice and strong institutions, and Goal 17 on partnerships. The recommendations will also contribute to SDGs 8 (decent work and economic growth) and 9 (industry, innovation and infrastructure).

UNECE will be assisting the Government's implementation of the recommendations in collaboration with development partners and working closely with the United Nations Resident Coordinator's Office in Armenia. The findings and recommendations emerging from the study will also be reflected in the UN Development Cooperation Framework, which seeks to support the country in addressing key SDG priorities and gaps.



Avag Avanesyan

Deputy Minister
Ministry of Economy of Armenia



Olga Algayerova

Under-Secretary-General of the United Nations
Executive Secretary of the
United Nations Economic Commission for Europe

Preface

Since 2010, the UNECE has been undertaking demand-driven national studies of regulatory and procedural barriers to trade, with a view to: helping countries achieve greater regional and global economic integration; informing donors as to where assistance might be required; and, supporting policy discussions within the Steering Committee on Trade Capacity and Standards (previously, the Committee on Trade) and its subsidiary bodies on where additional work is required.

This study summarizes the key findings of the eighth study, which focuses on Armenia. It was prepared by the UNECE secretariat in close consultation with public and private sector stakeholders. The study integrates the outcome of the stakeholder meeting, which was organized on 13 May 2019 by the Ministry of Economy in Yerevan, Armenia to discuss the initial results and recommendations.

Acknowledgments

This study was prepared by Ms. Hana Daoudi from UNECE Market Access Section under the supervision of Mr. Mika Vepsäläinen. The UNECE would like to acknowledge the contribution of the following consultants: UNECE regional consultant Mr. Veaceslav Sterbet for carrying out the business process analysis of dried fruits and vegetables; Ms. Cristina Ionica for conducting face-to-face interviews with female owned enterprises; Ms. Hasmik Hovhanesian who conducted face-to-face interviews with agencies responsible for standardization, quality assurance, accreditation and metrology and prepared detailed transcripts that were used by the secretariat for drafting the study.

The UNECE would also like to acknowledge the contribution of the following organisations: the Business Support Office-Armenia, particularly Mr. Gevorg Poghosyan for undertaking face-to-face interviews with traders representing male-owned enterprises in Armenia; the Overseas Development Institute, particularly Mr. Maximilano Mendez-Para and Ms. Linda Calabrese who prepared a background report on the country's regional trade dynamics; and the international polling institution, SATISCAN Sàrl that designed the electronic database for compiling the results of the face-to-face interviews with traders; provided on the job training to the national team of experts who conducted the interviews; and, ensured the data validation and reconciliation of the results.

The UNECE would like to express its gratitude to the following partners for their assistance in identifying and approaching female owned/headed enterprises: the Armenian Young Women Association; Women's Mentoring Programme;¹ the Fashion and Design Chamber of Armenia; Support to SME Development in Armenia Programme;² and, the Small and Medium Entrepreneurship Development National Centre of Armenia.

The UNECE would like to express its appreciation to Mr. Avag Avanesyan, Deputy Minister of Economy for chairing the national stakeholder meeting on 13 May 2019 that was organized by the Ministry of Economy at the Ministry's headquarters in Yerevan, Armenia. The secretariat is also grateful to the national stakeholders for their engagement throughout the assessment process and for the valuable comments received during the stakeholder meeting.

Last but not least, the UNECE would like to thank Mr. Artur Maysuryan and Mr. Tigran Harutyunyan from Ministry of Economy for their support and assistance in engaging relevant public stakeholders throughout the assessment and in organizing the stakeholder meeting for validating the findings of the study. A special thanks also goes to Mr. Tigran Davtyan Permanent Representative of Armenia to the World Trade Organization for his valuable advice throughout the assessment.

1 This programme is supported by the American Embassy in partnership with the Political Science and International Affairs Program at AUA and the Women and Youth Development and Support non-governmental organization

2 This programme was co-funded by the European Union and the German Federal Ministry for Economic Cooperation and Development (BMZ). It is implemented by GIZ "Private Sector Development in South Caucasus Program".

Contents

Foreword	iii
Preface	iv
Acknowledgments	v
Abbreviations	xii
Chapter One Introduction	1
1.1 Country background	1
1.1.1 Economic structure	2
1.1.2 The trade sector	5
1.1.3 Challenges and emerging opportunities	7
1.2 Methodology	9
1.2.1 Analytical parameters	9
1.2.2 Concepts and terminologies	11
1.3 Scope of the study	12
Traders	12
Ministries and State agencies	13
Market support institutions and logistics service providers	13
1.4 Outline of the study	13
Chapter Two Traders' Profile	15
2.1 Introduction	15
2.2 Salient features	15
2.2.1 Male owned enterprises	16
2.2.2 Female-owned enterprise	18
2.3 Transport modes of choice	20
2.4 Concluding remarks	21
Chapter Three Trade Facilitation Conditions	23
3.1 Introduction	23
3.2 Transparency	24
3.3 Documentary requirements and the use of electronic documents	27
3.4 At the border control	34
3.5 Transit trade	37
Chapter Four Regulatory and Standardization Policies	39
4.1 Introduction	39
4.2 Technical regulations	39
4.3 Standardization	41
4.4 Conformity assessment	42
4.5 Metrology	44

Chapter Five	Regional Integration Dynamics	47
5.1	Introduction	47
5.2	Trade patterns	47
5.3	Welfare effects of regional cooperation arrangements with the EU	49
5.4	Welfare effects of regional cooperation arrangements with the EAEU	52
Chapter Six	Implications for Export Diversification: The Case of Male-Owned Enterprises	55
6.1	Introduction	55
6.2	The interplay between regulatory and procedural barriers and export diversification	56
6.3	Enterprises' growth dynamics	58
	Standards	58
	Technological change	59
	E-commerce	59
	Access to finance	60
	Enterprise support services	60
	Cooperation and networking	61
	Customs brokers and freight forwarders	62
	Other factors	62
Chapter Seven	Implications for Export Diversification: The Case of Female-Owned Enterprises	63
7.1	Introduction	63
7.2	The interplay between regulatory and procedural barriers and export diversification	64
7.3	Enterprises' growth dynamics	65
	Size	65
	Standards	65
	Access to finance	66
	Cooperation and networking	67
	Enterprise support service	68
	E-commerce	69
	Other factors	69
Chapter Eight	Conclusion and Recommendation	71
Annexes		81
	Annex 1. Armenia's Trade Patterns	82
	Annex 2. Surveyed Enterprises Manufacturing and Trade Activities	94
	Annex 3. Armenia's System of National Standards	105
	Annex 4. Trade Creation and Trade Diversion Dynamics Reported by Traders	108
Appendix		109

Tables

Table 1.1	Armenia's main export markets (%)	6
Table 2.1	Transport modes and routes used for shipment to target markets	21
Table 3.1	Armenia's participation in UNECE Transport Agreements and Conventions.	24
Table 3.2	Documentary requirements for exports by level of difficulty.	29
Table 3.3	Documentary requirements for imports by level of difficulty.	32
Table 4.1	Adopted methods for defining essential requirements in technical regulations.	40
Table 4.2	Armenia's Technical Committees for Standardization (as at January 2019)	41
Table 4.3	ARMNAB's areas of competence and staff.	43
Table 4.4	NIM membership in regional and international organizations	45
Table 5.1	Armenia's top 20 exports RCA	50
Table 5.2	NTMs reported by EU: top 30 affected products (2016).	51
Table 5.3	Finger-Kreinin index export similarity index (2017).	52
Table 5.4	Armenia's top 20 exports to the EAEU: RCA.	53
Table 8.1	Recommendations for the Government's consideration	74
Table A1.1	Armenia's top 20 exports to the world	82
Table A1.2	Armenia's top 20 imports from the world	82
Table A1.3	Armenia's top 20 exports by main partners 2017 (USD million)	83
Table A1.4	Armenia's top 20 imports by main partners 2017 (USD million)	84
Table A1.5	Armenia's top 20 exports to the EU	84
Table A1.6	EU's imports from Armenia by trade regime (Euro thousands)	85
Table A1.7	Armenia's exports to the EU by trade regime (average 2015-17 in EUR thousands)	86
Table A1.8	EU's top 20 exports to Armenia (USD thousand)	90
Table A1.9	Armenia's top 20 exports to the EAEU.	90
Table A1.10	Simple average MFN tariffs applied by Armenia and the Russian Federation	91
Table A2.1	List of products manufactured by male-owned enterprises	94
Table A2.2	Male-owned enterprises' exports by product and destination.	96
Table A2.3	Male-owned enterprises' imports by product and source	98
Table A2.4	List of products manufactured by female-owned enterprises	102
Table A2.5	Female-owned enterprises' exports by product and destination	104

Table A2.6	Female-owned enterprises' imports by product and source	104
Table A2.7	Implementation of regional and international standards (male-owned enterprises)	104
Table A3.1	SARM's participation in ISO and CEN's standard setting activities	105
Table A3.2	Armenia's adoption of European harmonized standards (ENs)	106
Table A3.3	Market surveillance Inspection body activity fields	107
Table A4.1	Export markets won/lost by industry (2016-2017)	108
Table A4.2	Supply sources won/lost by industry (2016-2017)	108
Table A1.1	Use case and activity diagram notations	112
Table A3.1	Core business processes and stakeholders involved in exporting dried fruits and vegetables	116
Table A4.1	Documentary requirements for exporting dried fruits and vegetables from Armenia	138
Table A5.1	Duration and dependencies between businesses processes	140
Table A6.1	Proposed recommendations.	140

Figures

Figure 1.1	Armenia's GDP (nominal, in Armenian Dram million)	2
Figure 1.2	Armenia GDP by sector	3
Figure 1.3	Armenia's employment by sector (% shares)	3
Figure 1.4	Armenia's industrial sector by activity (% in total industrial output)	4
Figure 1.5	Evolution of Armenia's exports and imports (USD million)	5
Figure 1.6	Armenia's trade balance (USD million)	5
Figure 1.7	Armenia's supply sources	6
Figure 1.8	Figure 1.8 Foreign Direct Investment flows into Armenia (net, in USD million)	8
Figure 1.9	UNECE international supply chain Buy-Ship-Pay reference model.	10
Figure 1.10	Product life cycle and regulatory system processes	11
Figure 2.1	Surveyed enterprises by size (% shares)	15
Figure 2.2	Enterprises surveyed by location (% shares)	15
Figure 2.3	Male-owned enterprises by size	16
Figure 2.4	Male-owned enterprises by sector (% share) Male-owned enterprises by location	16

Figure 2.5	Male-owned enterprises by sector (% share)	17
Figure 2.6	Male-owned enterprises top 10 export markets (% of respondents)	17
Figure 2.7	Male-owned enterprises top 10 import sources (% of respondents)	17
Figure 2.8	Female-owned enterprises by size	18
Figure 2.9	Female owned enterprises by locaiton	19
Figure 2.10	Female owned enterprises top 10 supply sources (% of respondents)	19
Figure 2.11	Female-owned enterprises top 10 export markets (% of respondents)	20
Figure 3.1	Male-owned enterprises information sources (% of responses)	25
Figure 3.2	Female-owned enterprises information sources (% of responses)	26
Figure 4.1	Armenia's registry of standards	42
Figure 4.2	SARM's sources of funds.	42
Figure 4.3	National accredited CABs (as of end December 2018)	44
Figure 5.1	Armenia's export concentration index by main trade partner (2017)	48
Figure 5.2	Armenia's export concentration index by main trade partner (2017)	48
Figure 5.3	Figure 5.3EU's imports from Armenia	49
Figure 5.4	Breakdown of NTMs applied by the EU (2016)	51
Figure 6.1	Trade costs (% share in male-owned enterprises' monthly expenditures)	56
Figure 6.2	Male owned enterprises with expansion plans by sector	57
Figure 6.3	Benefits of implementing standards reported by male-owned enterprises	58
Figure 6.4	Access to finance impediments reported by male-owned enterprises	60
Figure 6.5	Male-owned enterprises' evaluation of support services received	61
Figure 7.1	Trade costs (% share in female-owned enterprises' monthly expenditures)	64
Figure 7.2	Female-owned enterprises' use of time	65
Figure 7.3	Benefits of standards reported by female-owned enterprises.	66
Figure 7.4	Access to finance impediments reported by female-owned enterprises.	67
Figure 7.5	Female-owned enterprises' memberships in associations	67
Figure 7.6	Female-owned enterprises' evaluation of support services received.	68
Figure 8.1	Business environment challenges (% of total respondents, 91 traders)	73
Figure A2.1	Dried fruits and vegetables exports (USD thousand)	115
Figure A2.2	Dried fruits exports by markets, 2017.	115

Figure A3.1	Exporting dried fruits and vegetables from Armenia: Use case diagram	117
Figure A3.2	Negotiate and conclude sales contract use case diagram	117
Figure A3.3	Negotiate and conclude the sales contract activity diagram	119
Figure A3.4	Ship use case diagram	121
Figure A3.5	Obtain phytosanitary certificate use case diagram	122
Figure A3.6	Obtain phytosanitary certificate activity diagram	123
Figure A3.7	Obtain certificate of origin use case diagram	126
Figure A3.8	Obtain certificate of origin activity diagram	127
Figure A3.9	Arrange transportation use case diagram	129
Figure A3.10	Arrange transportation activity diagram	129
Figure A3.11	Pass customs use case diagram	131
Figure A3.12	Pass customs activity diagram	132
Figure A3.13	Claim payment use case diagram	135
Figure A3.14	Claim payment activity diagram	136
Figure A5.1	Time-procedure chart for exporting dried fruits and vegetables from Armenia	139

Boxes

Box 1.1	Supporting productivity growth at the enterprise level: Special toolkits	7
Box 2.1	Manufactured goods by female-owned enterprises	22
Box 3.1	Procedures for issuing phytosanitary certificates	29
Box 3.2	Import permits and customs clearance: the case of computers	36

Abbreviations

AA	Association Agreement
AEO	Authorized Economic Operator
AMD	Armenian Drams
ARMNAB	Armenia National Accreditation Body
ARMSTAT	National Statistical Service of Republic of Armenia
BCP	Border crossing point
BIPM	International Bureau of Weights and Measures
BPA	Business process analysis
CAB	Conformity assessment body
CEN	Comité Européen de Normalisation (European Committee for Standardization)
CENELEC	Committee for Electrotechnical Standardization
CEPA	Comprehensive and Enhanced Partnership Agreement
CET	Common external tariff
CIS	Commonwealth of Independent States
CoO	Certificate of origin
COOMET	Cooperation of National Metrological Institutions
CITIES	Convention for international Trade in Endangered Species
EA	European Cooperation for Accreditation
EAEU	Eurasian Economic Union
EN	European Harmonised Standards
EU	European Union
ETSI	European Telecommunications Standards Institute
FDI	Foreign direct investments
FSIB	Food Safety Inspection Body
GDP	Gross domestic product
GPS	Global Positioning System
GRPS	General Package Radio Services
GSP	Generalised System of Preferences
HACCP	Hazard Analysis and Critical Control Point
HS	Harmonized System
IAEA	International Atomic Energy Agency
ICT	Information and communication technology
IEC	International Electro-technical Commission

ILAC	International Laboratory Accreditation Cooperation
ISO	International Organization for Standardization
JTC	Joint Technical Committee
MFN	Most Favoured Nation
MRA	Mutual Recognition Arrangement
MSME	Micro, small and medium enterprises
NIM	National Institute of Metrology
NTM	Non-Tariff Measures
OIML	International Organization of Legal Metrology
PTB	Physics and Technology Bundesanstalt
RCA	Revealed Comparative Advantage
RIA	Regulatory impact assessment
SARM	Armenia National Institute of Standards
SDG	Sustainable Development Goals
SITC	Standard International Trade Classification
SMEs	Small- and medium-sized enterprises
SPS	Sanitary and Phytosanitary
SQAM	Standardization, quality assurance, accreditation and metrology
SSDL	Secondary dosimetry laboratory
STCMetre	Scientific and technical Commission on Metrology of the Euro Asian Council for Standardization, metrology and Certification
TBT	Technical Barriers to Trade
TC	Technical Committee
TIR	Transports Internationaux Routiers
TRACECA	Transport Corridor Europe Caucasus Asia
UCC	Union Customs Code of the EU
UK	United Kingdom of Great Britain and Northern Ireland
UN/TRAINS	UN Trade Analysis Information System
UML	Unified Modelling Language
UN/CEFACT	United Nations Centre for Trade Facilitation and Electronic Business
UNECE	United Nations Economic Commission for Europe
USA	United States of America
USD	United States Dollar
VAT	Value-added tax
WCO	World Customs Organisation
WTO	World Trade Organization

Chapter One

Introduction

1.1 Country background

Located in the Southern Caucasus, Armenia is a small³ upper-middle income landlocked country with real gross domestic product (GDP) per capita reaching USD 3,3936.8 in 2017.⁴ The country, which shares borders with Georgia in the north, Azerbaijan in the east, Turkey in the west and Iran in the south, is endowed with rich mineral resources, including gold, silver and scarce metals.

A World Trade Organization (WTO) member since 2003,⁵ the country is linked with regional and global markets through an assortment of trade agreements. It has eight bilateral free trade agreements (FTAs) with Belarus, Georgia, Kazakhstan, Kyrgyzstan, the Republic of Moldova, Tajikistan and Turkmenistan, and Ukraine. It is also a member of the Commonwealth of Independent States (CIS) and, since January 2015, the Eurasian Economic Union (EAEU); a beneficiary of the Generalized System of Preferences (GSP) programmes of Canada, Japan, Norway, the United States of America and Switzerland; and, enjoys a GSP+ status with the European Union (EU) which grants the country zero or reduced tariffs market entry for 6,400 tariff lines.⁶

Most recently, the Government signed a Comprehensive and Enhanced Partnership Agreement (CEPA) with the EU, which has been provisionally applied since 1 June 2018.⁷ While the agreement does not provide for a free trade area with the EU, it brings immediate cost saving benefits given its emphasis on removing non-tariff trade barriers.⁸

Trade development has been sought as a vehicle for enabling enterprises to attain economies of scope and scale, as a prerequisite for driving economy-wide structural transformation towards increased specialisation in high-value added activities. Indeed, and pursuant to the Government's 5-year development strategy, "Armenia Development Strategy for 2014-2025", trade development has been underscored by targeted efforts to ensure macroeconomic stability, support enterprise development and the overall strategic goal of consolidating a knowledge-based economy and improve the country's overall business environment.⁹

As shown in figure 1.1, these efforts enabled the economy to swiftly bounce back from the 2008 global financial crisis and attain consistent growth. However, unemployment remains high, standing at around 18 percent in 2017,¹⁰ underscored by persisting poverty. While extreme poverty, measured in terms of the percentage of the population living below the poverty line of USD 1.90 per day, is minimal (2 percent in 2017), around

3 Armenia covers an area of 29,743 square kilometres in total (Atlas of the Republic of Armenia, Statistical Committee of the Republic of Armenia, 2018; available at: www.armstat.am/file/doc/99511083.pdf)

4 World Bank database

5 Armenia became a member of the WTO on 5 February 2003.

6 Official Journal of the European Union (2012) Regulation (EU) No 978/2012 of the European Parliament and the Council of 25 October 2012 applying a scheme of generalised tariff preferences and repealing Council Regulation (EC) No 732/2008 (trade.ec.europa.eu/doclib/docs/2012/october/tradoc_150025.pdf)

7 CEPA was signed on 24 November 2017.

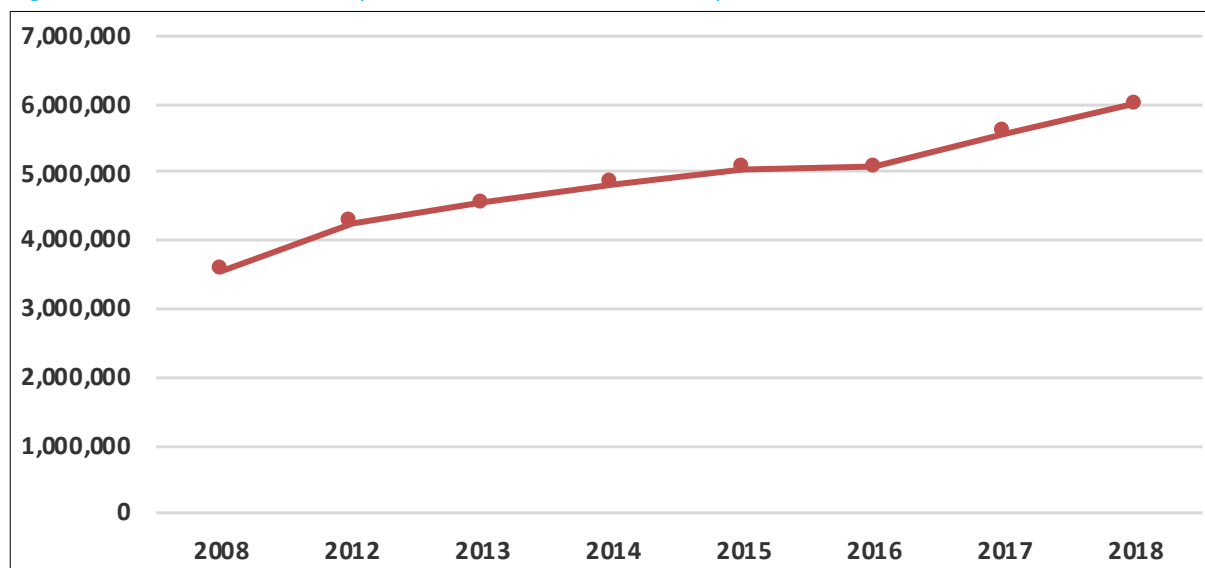
8 Trade related provisions are based on the WTO Technical Barriers to Trade (TBT) and the Phytosanitary Measures (SPS) Agreements. CEPA also features special emphasis on the exchange of experience and best practices.

9 An English version of "Armenia Development Strategy for 2014-2025" is available at: https://eeas.europa.eu/sites/eeas/files/armenia_development_strategy_for_2014-2025.pdf
For a concise overview of reform achievements till 2018 see, for example, the WTO's 2018 Trade Policy Review of Armenia; available at: https://www.wto.org/english/tratop_e/tpr_e/s379_e.pdf

10 ARMSTAT (www.armstat.am)

30 percent of the population were affected by poverty (living below USD 3.3 per day) in 2017¹¹ with urban-rural income disparity continuing a historic trend.¹² As shown below, these imbalances reflect deep-seated structural weaknesses, which have been undermining the trickle-down effect of economic growth.

Figure 1.1 Armenia's GDP (nominal, in Armenian Dram million)



Source: Statistical Committee of the Republic of Armenia (ARMSTAT)

1.1.1 Economic structure

As shown in figure 1.2, the Armenian economy has been registering a consistent shift towards services, which has seen its share in GDP increase from around 46 percent in 2012 to around 53 percent in 2018 driven by information and communication technology (ICT), tourism and healthcare. Similarly, the industrial sector increased its share in GDP from around 16 percent to 18 percent during same period, while agriculture, hunting, forestry and fishing sector saw its share decline from around 18 percent to 14 percent over the same period under the weight of adverse weather conditions.

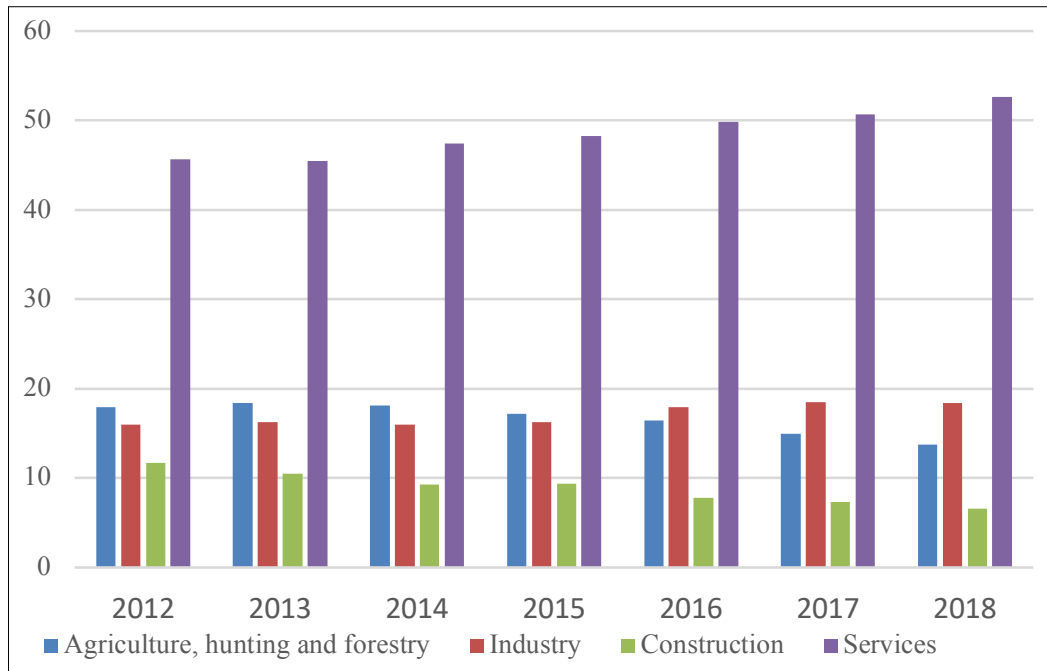
The above structural changes are testimony to the Government's success in bringing about a move away from the strong dependence on construction. Once the driving force for income generation, construction registered a sharp contraction in the wake of the global financial crisis.¹³ While initially caused by the dwindling remittances and foreign direct investment (FDI) inflows, the sector's persistent contraction over the ensuing years also reflects the growth in the remaining sectors. These dynamics brought the sector's GDP contribution to around 10 percent in 2017 down from around 25 percent in 2006.

11 World Bank database

12 In 2017, households residing urban areas earned an average of 65,520 Armenian Dram (AMD) per month, while households in rural areas earned 47,296 ADM (Food security and poverty report, January-December 2018, Statistical Committee of the Republic of Armenia; available at: <https://www.armstat.am/en/?nid=82&id=2125>)

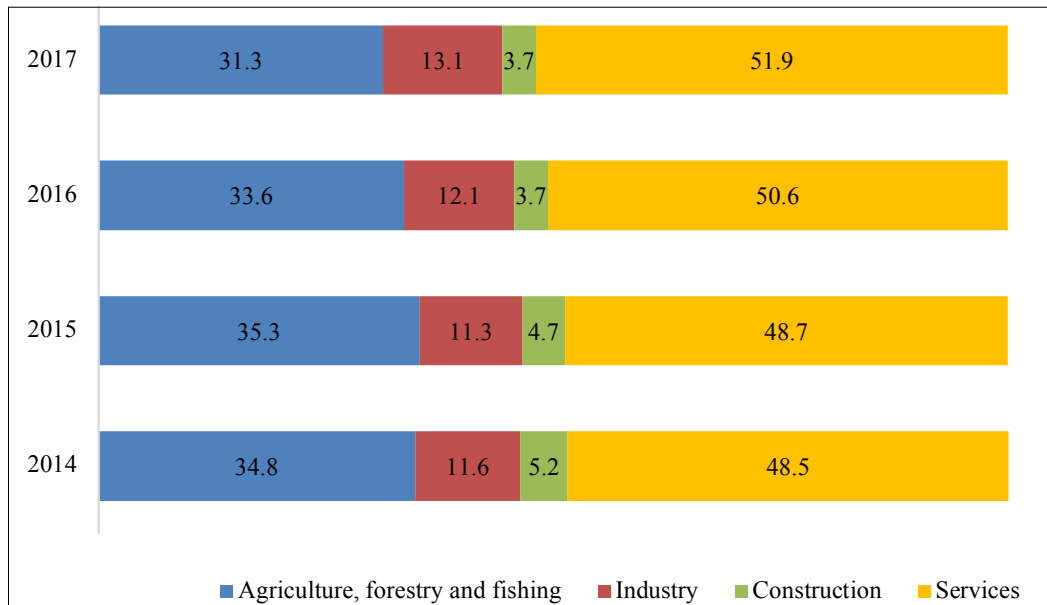
13 ARMSTAT (2007) Armenia in Figures; available at: <http://www.armstat.am/en/?nid=82&id=649>

Figure 1.2 Armenia GDP by sector



Source: ARMNAB

Figure 1.3 Armenia's employment by sector (% shares)



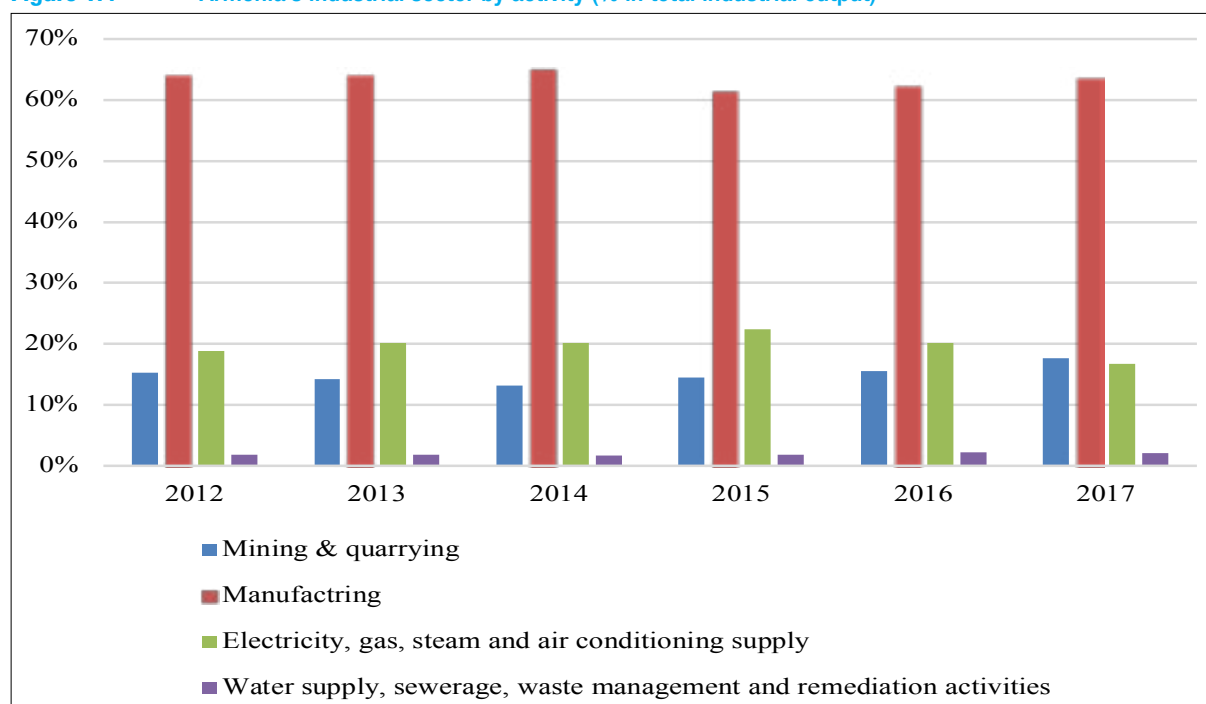
Source: Calculations based on ARMSTAT

These structural changes generated new job opportunities in the services sector, with its share in total employment registering consistent growth to reach around 52 percent in 2017 up from 44 percent in 2010 (Figure 1.4). In contrast, the industrial sector's share in employment registered a modest increase from 10.2 percent in 2010 to 13.1 percent in 2017, while the share of agriculture decreased from around 39 percent to 31 percent suggesting low productivity levels. The sector's contraction cannot be understood in isolation of the country's unfavorable climate conditions, accentuated by dry summers and cold winters featuring heavy snow and hail that effectively wipes out the harvest and jeopardizes the farmers' ability to produce the following year.

The industrial sector's stagnant contribution to GDP and employment mirrors the performance of its driving force, namely the manufacturing sector. As shown in figure 1.4, manufacturing's share in total industrial output has been growing at 1 percent per year since 2015. With a 63 percent share, it remains below the previous peak level of 65 percent registered in 2014.¹⁴

Leveraging the structural changes into increased job opportunities and higher GDP levels is complicated by the predominance of cottage industries, comprising micro, small and medium enterprises (MSMEs). These accounted for 99.7 percent of total registered enterprises in 2015,¹⁵ with micro enterprises, employing less than 10 persons and generating less than 100 million Armenian Dram (AMD) in value-added or profits annually¹⁶, constituting the largest segment (92 percent of total enterprises). Small enterprises (employing less than 50 persons and generating less than 500 million AMD in value-added or profits), accounted for 7 percent, with medium enterprises (employing less than 250 persons and generating less than 1500 million AMD in value-added or profits annually) accounting for the remaining 2 percent. The challenge is how best to support the graduation of micro enterprises into small and medium-sized categories, while stimulating the creation of a new generation of medium and large enterprises with greater specialization in activities with higher value-added.

Figure 1.4 Armenia's industrial sector by activity (% in total industrial output)



14 Calculations shown in figure 1.4 are based on published data by ARMSTAT

15 European Bank for Reconstruction and Development (EBRD) Business Support Office (2017), Research on SME taxation field; available at: <http://www.bso.am/wp-content/uploads/2017/12/SME-Taxation-Field-2016.pdf>

16 The enterprises classification criteria is established under the law of on State Support for Small and Medium Entrepreneurship

1.1.2 The trade sector

Armenia has a vibrant trade sector, with exports registering consistent growth since 2009, with the exception of 2015 (Figure 1.5). However, as shown in figure 1.6, at USD 1.9 billion in 2017, imports continue to outstrip export growth, so that trade deficit remains high.¹⁷

Figure 1.5 Evolution of Armenia's exports and imports (USD million)

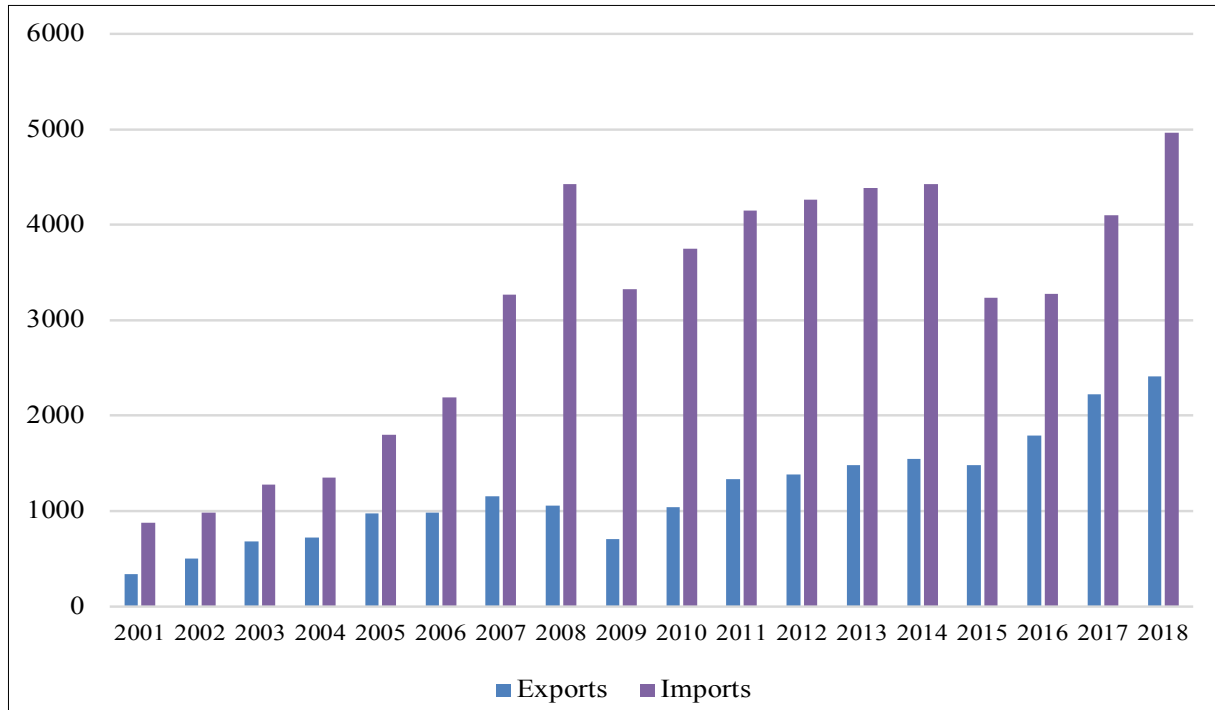
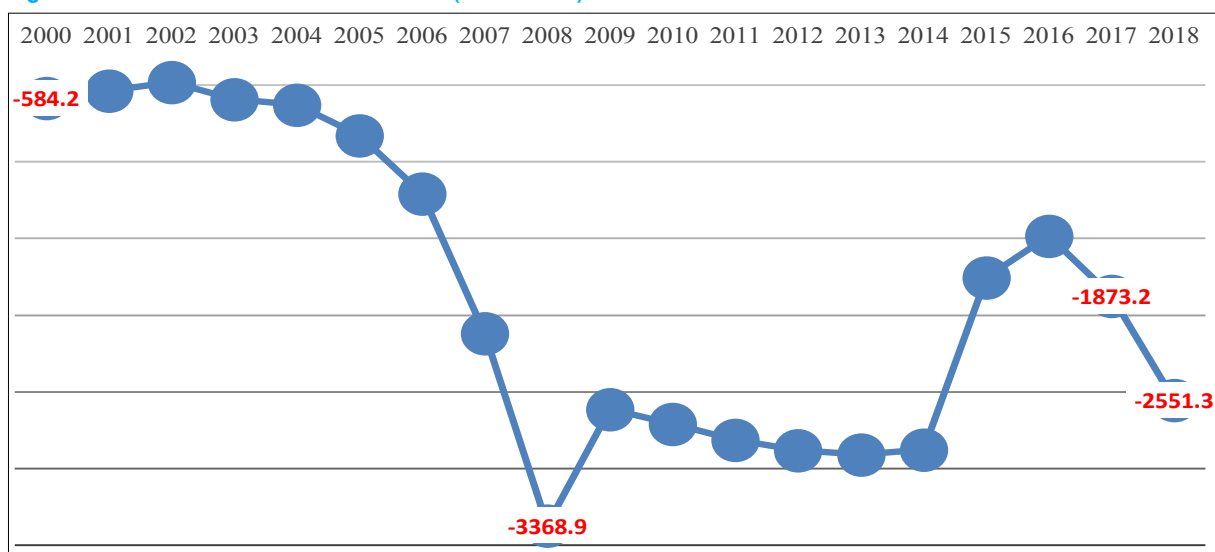


Figure 1.6 Armenia's trade balance (USD million)



Source: Calculations based on ARMSTAT

17 Central Bank of Armenia (www.cba.am).

Moreover, as shown in Annex 1 (Table A1.1), exports remain resource intensive (dominated by mineral products, precious stones, metals and non-metal products) and concentrated with a few trading partners. While the period since 2013 has witnessed a certain degree of market diversification in the form of increased exports to Bulgaria, People's Republic of China and Switzerland, the Russian Federation continues to constitute the main outlet for Armenia's products (Table 1.1).

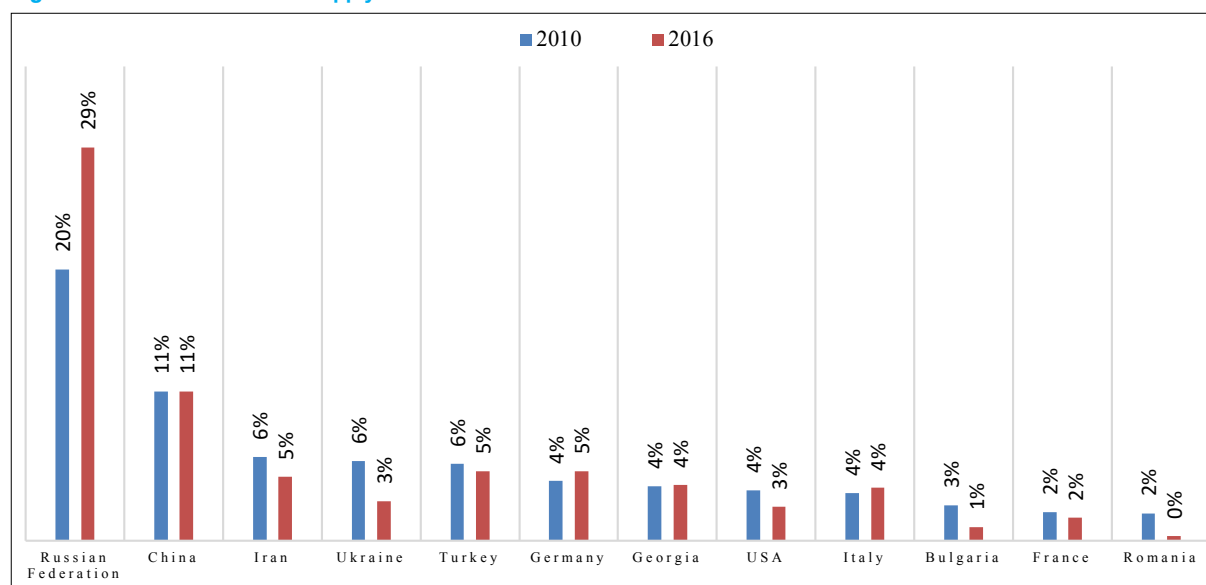
Table 1.1 Armenia's main export markets (%)

Export markets	1997	2003	2013	2017
<i>Russian Federation</i>	23.0	15.3	24.0	27.0
<i>Bulgaria</i>	0.2	0.2	11.2	14.1
<i>Switzerland</i>	1.0	5.4	1.1	11.7
<i>Georgia</i>	3.8	1.8	5.1	6.9
<i>People's Republic of China</i>	0.0	0.8	4.9	5.9
<i>Iraq</i>	0.0	0.0	3.5	5.8
<i>Germany</i>	4.3	7.6	6.2	5.4
<i>Netherlands</i>	0.1	3.8	4.8	4.4
<i>Iran</i>	19.7	2.8	6.1	4.1
<i>United Arab Emirates</i>	1.3	2.9	0.6	3.2
<i>United States of America</i>	3.3	3.2	6.4	2.8
<i>Syrian Arab Republic</i>	1.3	0.1	0.2	2.5

Source: Calculations based on the United Nations Comtrade data

On the import side, Armenia shows a significant reliance on international markets for meeting local demand for fuel, natural gas and, to a more limited extent, intermediate goods (Annex 1, Table A1.2), which are mainly sourced from the Russian Federation (Figure 1.7).

Figure 1.7 Armenia's supply sources



Source: Calculations based on the United Nations Comtrade data

The persistent trade deficit is yet another structural imbalance caused by the economy's weak productive capacity, which also manifests itself in the economy's reliance on remittances for generating income¹⁸ and vulnerability to fluctuations in global commodity prices. These conditions have limited the Government's sources for financing development, while burdening the economy with indebtedness.¹⁹

1.1.3 Challenges and emerging opportunities

The challenge facing the Armenian Government relates to capitalising on achievements to date to consolidate a knowledge-based economy with increased specialisation in economic activities with high value-added. At the same time, the high unemployment rates beg the need for supporting labour intensive activities. This twin objective is at the centre of the Government's 5-year development strategy that features an emphasis on developing the productive capacity of the labour-intensive light industries and MSMEs in general (Box 1.1).

Most recently, the Government adopted a new Tax Code to reduce the enterprises' financial burden. The Code, which entered into force in January 2018, exempts exports from value-added tax (VAT) as well as, among others, products sourced by Authorized Economic Operators from non-Eurasian Economic Union members for use in manufacturing goods destined for exports within 180 days from importation.²⁰

Box 1.1 Supporting productivity growth at the enterprise level: Special toolkits

1) Special tax and customs regimes

- a) Special tax and customs regimes for exporting companies
- b) Deferred VAT for goods imported under investment goods and programs
- c) A number of free trade zones with use of PPT toolkit (particularly on the area of Zvartnots airport and Mars company) with application of relevant tax and customs regimes

2) Financial support and ensuring access to financing:

- a) Loans at special terms (e.g. for investments aimed at implementation of quality assurance system, export expansion, creation of jobs)
- b) Provision of export guarantees
- c) Provision of credit guarantees
- d) Own capital funding
- e) Participation in investment funds

3) Access to markets:

- a) Identification of goods with export potential and potential partners
- b) Presentation and protection of interests of exporters through trade representations
- c) Support to participation in exhibitions
- d) Organization of incoming and outgoing business visits and conferences
- e) Branding of countries and specific sectors in target markets
- f) Support to involvement of trade representatives in target markets

4) Capacity building/increase of competitiveness:

- a) Co-funding of human resources training programs
- b) Provision of technical and financial assistance to companies in implementation of internationally recognized quality assurance systems
- c) Support to sharing technologies and knowledge, including using potential and contacts of the Diaspora.
- d) Promoting research studies and developments:
- e) Foundation of techno and industrial parks
- f) Provision of grants for joint researches and developments by companies and higher educational institutions,
- g) Creation of venture funds

Source: Armenia Development Strategy for 2014-2025

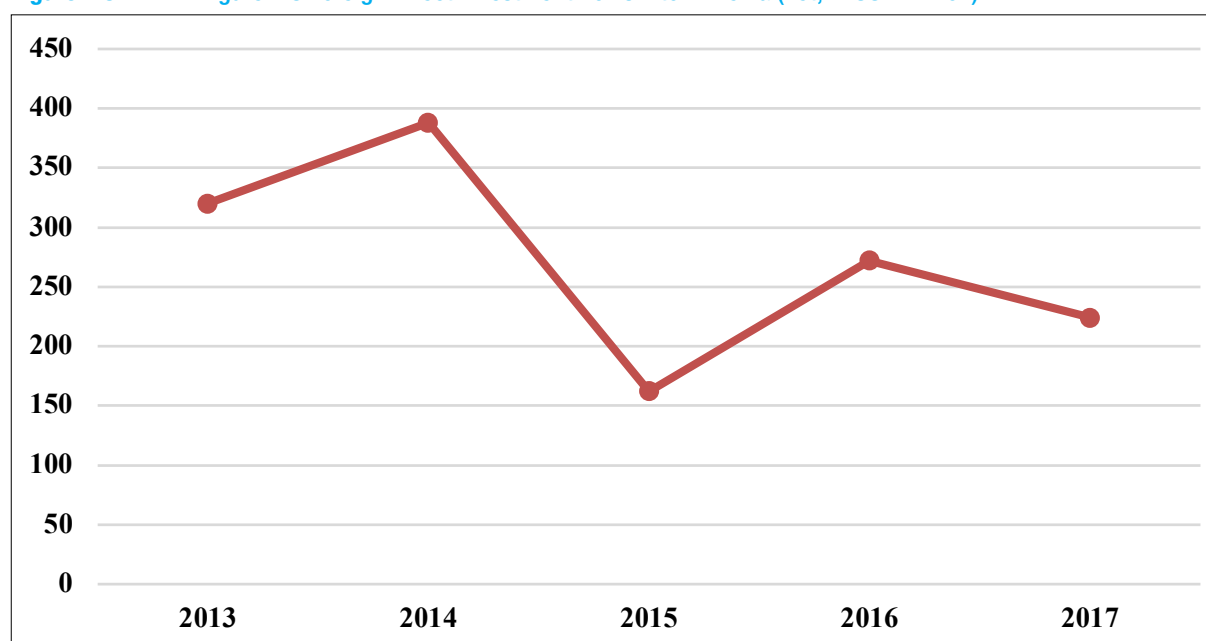
18 Remittances from abroad, estimated at USD 1.5 billion in 2017, constitute around 10 percent of GDP (Central Bank of Armenia).

19 According to the International Monetary Fund, the share of external debt in GDP jumped from 17 percent in 2007 to 58 percent in 2017 (<https://www.imf.org/en/Publications/CR/Issues/2019/01/30/Republic-of-Armenia-Technical-Assistance-Report-Public-Investment-Management-Assessment-46565>).

20 Exports and imports fulfilling these conditions are subject to zero percent VAT rate. The tax code is available at: http://www.petekamutner.am/Shared/Documents/_ts/_tl/Taxes/or_2016_ho165.pdf

While Armenia's regional integration efforts offer new opportunities for attaining economies of scope and scale, achieving the much-needed structural transformation is complicated by the dearth of investments in research and development, estimated at 0.02 percent of GDP²¹, and the modest FDI inflows. As shown in figure 1.8, FDI inflows are concentrated in energy, telecommunications, metallurgy, hotel services and air transportation,²² and exhibit a volatile trajectory. Recent estimates suggest the need for intensifying investment attraction, showing FDI inflows as decreasing by 43.5 percent during the second quarter of 2018 compared to the same period in 2017.²³

Figure 1.8 Figure 1.8 Foreign Direct Investment flows into Armenia (net, in USD million)



Source: World Bank, Country Economic Update, Summer 2018

The country's access to transit facilities in neighbouring countries is another complicating factor. The borders with Turkey, which constitutes over 82 percent of Armenia's total borders, remain closed as well as shared borders with Azerbaijan, causing traders to re-route inbound and outbound cargo via Georgia. As shown in the next chapters, this re-routing invariably increases the length of the journey,²⁴ with the consequence of inflating transaction costs to prohibitive levels and setting the limits to the economy's growth potential.

It is against this background that the Government is striving to develop the economy guided by the national 5-year development strategy, which sets the foundation for supporting the much-needed structural transformation. The strategy assigns the Government the role of an enabler, providing the conducive business environment and targeted support measures to allow enterprises to reap the expected benefits from regional integration efforts.

21 SDG Implementation Voluntary National Review of Armenia (2018); available at: https://sustainabledevelopment.un.org/content/documents/19586Armenia_VNR_2018.pdf

22 United Nations Conference on Trade and Development (UNCTAD), World Investment Report 2018, available at: https://unctad.org/en/PublicationsLibrary/wir2018_en.pdf

23 ARMSTAT (https://www.armstat.am/file/article/sv_07_18r_420.pdf)

24 Armenia is less than 200 miles from the ports of the Black Sea and 350 miles from the Caspian. However, most of these ports are inaccessible to Armenia.

This study seeks to contribute to the successful implementation of the national development strategy by supporting the removal of regulatory and procedural barriers to trade in goods. In so doing, it highlights the implications for the achievement of the 2030 global sustainable development goals (SDGs), particularly in relation to leveraging trade reforms for structural transformation (SDG8), job creation (SDG9), gender equality (SDG5) and partnerships for the goals (SDG 17).

1.2 Methodology

The UNECE evaluation methodology features actor-oriented questionnaires, geared to ascertaining behind and at-the-border regulatory and procedural trade barriers. The questionnaires focus on: (i) trade facilitation measures; (ii) quality control systems embodied in standardization policies, technical regulations, quality assurance, accreditation and metrology (SQAM); and, (iii) trade-related infrastructure, including transport and logistics.²⁵ Below is a brief discussion of the concepts and analytical parameters that underpin the methodology.

1.2.1 Analytical parameters

The analysis of trade facilitation conditions is based on the UNECE Buy-Ship-Pay (BSP) reference model, which provides a system-based conceptualization of international trade transactions. These transactions are treated as proceeding along **a single continuous process**, which spreads across the three main operations carried out by traders:

- BUY – the conclusion of trade terms and the establishment of sales contract.
- SHIP – physical transfer of the goods, including regulatory procedures related to official controls;
- PAY – payment transactions (the claim for the payment in the case of exports, and the payment for the purchased goods in the case of imports).

As shown in Figure 1.9, the business processes are conceived as a chain of logically sequenced activities to establish commercial contracts (commercial procedures); arrange for the inland and cross-border transportation of goods (transport procedures); complete export and import formalities (regulatory procedures); and, secure payments (financial procedures).

Targeted supply chain actors under the questionnaires, include, traders, State officials, transport operators, logistical service providers²⁶ and market support institutions, with a view to identifying capacity shortfalls undermining overall end-to-end value chain operations. Actors are assessed in terms of their contribution to increasing the efficiency, transparency and predictability of trade, as opposed to their functional performance.²⁷ Attention is also given to trade documents and procedures, which are measured against key trade facilitation principles, including transparency, communications, consultations and cooperation; simplification, practicability and efficiency; non-discrimination, consistency, predictability and due process; harmonization, standardization and recognition; and the use of modern information and communication technology (ICT) systems.²⁸

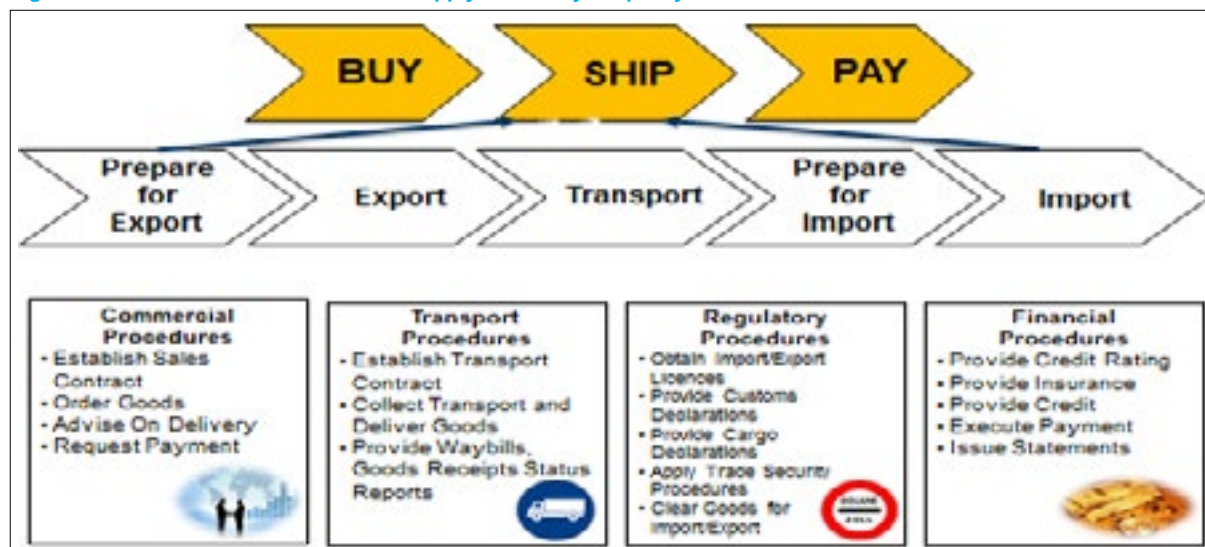
25 The UNECE evaluation methodology is available online at: <https://www.unece.org/tradewelcome/studies-on-regulatory-and-procedural-barriers-to-trade.html>

26 Only transport operators and logistical service providers with extensive services and broad geographic coverage are interviewed.

27 For a detailed discussion of this Model, see UNECE Recommendation 18 (UNECE, 2001).

28 UNECE (2006). Towards an Integrated Strategy for UN/CEFACT, Geneva, Switzerland.

Figure 1.9 UNECE international supply chain Buy-Ship-Pay reference model



The insights emerging from the actor-oriented questionnaires are complemented by a sector-focused assessment of regulatory and procedural barriers to trade, using the UNECE/ESCAP Business Process Analysis (BPA) methodology.²⁹ The methodology applies the Unified Modelling Language, which uses internationally recognized standard graphical notations for mapping the day-to-day activities carried out under the BSP categories. The aim is to capture:

- Quantitative (time/money) and qualitative impacts of regulatory and procedural barriers;
- Shortfalls in transport and logistical services;
- Shortcomings in the country's SQAM system;
- Shortfalls in public-private sector consultative mechanisms;
- Key policy issues with direct bearing on the traders' performance;
- Alternative options for addressing the identified regulatory and procedural barriers; and,
- Capacity-building needs of State agencies, traders, transport sector, logistics service providers.

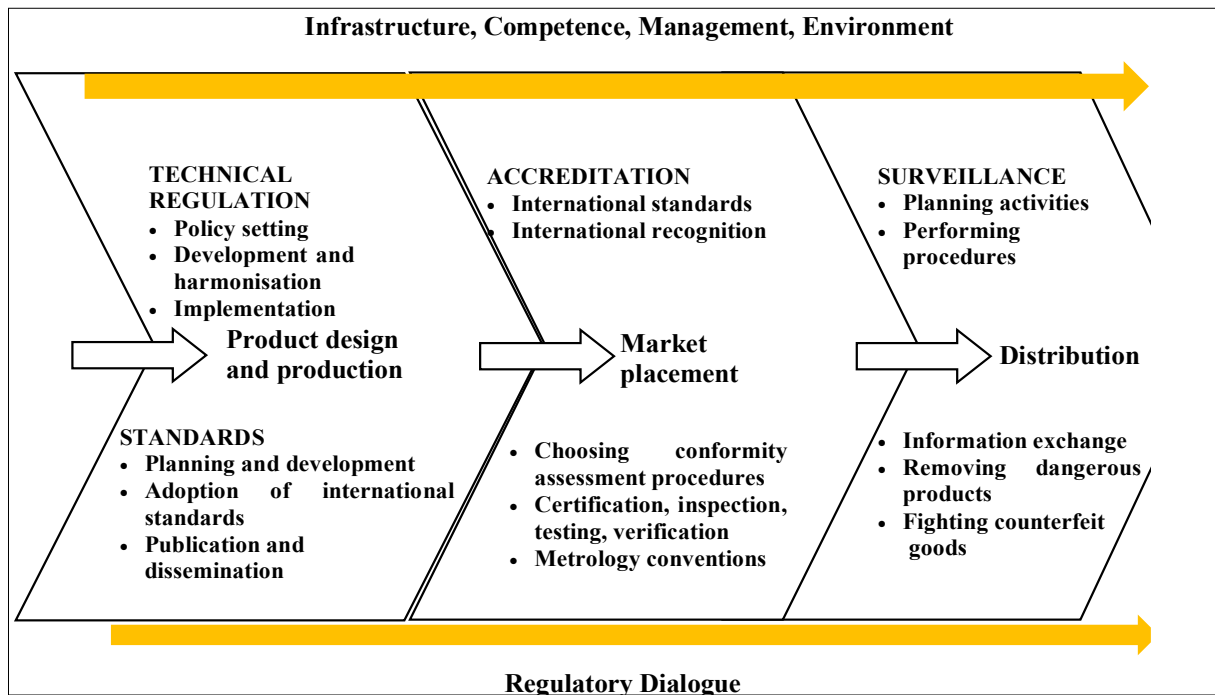
The results of the BPA could serve as a basis for the:

- Analysis of data requirements and data flow
- Development of standardized data
- Design of improved export processes
- Design of a prototype single window entry form
- Design of a prototype single window entry system
- Decisions on infrastructure and logistics services development
- Design of appropriate laws and market support institutions

To take the analysis a step further, the study uses the product life cycle approach to ascertain capacity shortfalls within the SQAM system. As shown in Figure 1.10, regulations and institutions are assessed in terms of their impact on product design, its placement on the market and eventual distribution.

²⁹ The latest version of the joint UNECE/ESCAP Business Process Analysis Model (2012) is available online at: www.unescap.org/unnext/tools/business_process.asp

Figure 1.10 Product life cycle and regulatory system processes



1.2.2 Concepts and terminologies

The concept of “trade facilitation” and the terms covered under “SQAM” are to be understood as follows:

- **Trade facilitation** refers to the extent to which import/export procedures, information and documentation requirements are rationalized, harmonized, simplified, streamlined and automated to reduce transaction costs and increase overall efficiency and transparency.
- **Standardization policies** refer to policy documents and legislation concerned with the formulation, publication, and implementation of guidelines, rules, and specifications associated with the characteristics of products, such as its size, shape, design, functions and performance, or the way they are labelled or packaged before being placed on the market. A **Standard** refers to a technical specification approved by a recognized national, regional or international standardization body and made available to the public for repeated or continuous application. Conformity with standards, which are developed by public or private entities, is voluntary.³⁰ When a standard is referenced in legislation (as a basis for technical regulation), it becomes mandatory.
- **Technical regulations** are defined, pursuant to the Agreement on Technical Barriers to Trade (TBT), as a “document which lays down product characteristics or their related processes and production methods, including the applicable administrative provisions, with which compliance is mandatory. These may also include or deal exclusively with terminology, symbols, packaging, marking or labelling requirements as they apply to a product, process or production method”. Technical regulations are mandatory.
- **Conformity assessment** relates, pursuant to the Agreement on TBT, to the procedures used, directly or indirectly, to establish that relevant requirements under technical regulations are fulfilled. Conformity assessment can be set up as voluntary “self-regulation” or mandatory schemes.³¹

³⁰ The study focuses only on public standards and the policies associated with their development.

³¹ The study focuses only on mandatory conformity assessment schemes.

- Related to conformity assessment is **accreditation**, which refers to independent evaluation of testing and calibration laboratories, management systems, inspection bodies and so on, to confirm compliance with internationally recognized standards and requirements for risk reduction purposes.
- **Metrology**, traditionally known as “weights and measures”, is the science of measurement. Together with standardisation, accreditation and conformity assessment, it is one of the essential pillars of national quality infrastructure. Scientific and industrial metrology is crucial for establishing and disseminating measurement units and providing the necessary tools to support the measurements needed by industry. Legal metrology ensures the credibility of measurements and measuring instruments in regulated areas of trade, health, safety and environment. It is essential, not only for consumer protection, but also for protecting export revenues and official measurements.

1.3 Scope of the study

This study focuses on strategic non-resource-based sectors, which were selected in consultation with the Ministry of Economy, based on their contribution to exports. Listed using the Standard International Trade Classification (SITC) Revision 3 (top level), these sectors include:

- Food and live animals
- Beverages and tobacco
- Chemicals and related products
- Manufactured goods classified chiefly by material
- Miscellaneous manufactured articles

The regulatory and procedural barriers to trade were identified using actor-oriented questionnaires targeting supply chain members, including, traders, State officials, transport operators, logistics service providers and market support institutions.³² These were approached in late 2018-2019 by UNECE national and international consultants during face-to-face interviews, and are listed below.

Traders

In-depth interviews were carried out with 91 traders. These represented 61 male-owned enterprises (interviewed in October 2017-January 2018) and 30 female-owned enterprises (interviewed in September 2018). The focus on female-owned enterprises was dictated by the limited number of female-owned enterprises engaged in export activities; a phenomenon that came across clearly from UNECE assessment studies in other countries.

Female respondents who participated in the traders’ survey that was launched in 2017 accounted for 26 percent, and the majority were not owners. This begged the question as to whether this limited engagement reflects entry barriers or specific constraints that undermine female-owned enterprises’ ability to sell their products abroad. The 30 female-owner were interviewed using a tailored questionnaire that was developed by the UNECE, with a view to gaining a better understanding of the growth dynamics influencing this segment of the business community. Only enterprises engaged in, or with plans to engage in, exports were invited to participate.

The 91 traders were engaged in strategic sectors with major contribution to exports and income growth as well as those with export potential and operated in the country’s major trade and industrial hubs. Their views and concerns are, therefore, pertinent for gaining a better understanding of regulatory and procedural barriers to trade and the implication for export diversification and regional integration.

32 Only transport operators and logistical service providers with extensive services and broad geographic coverage were interviewed.

This emphasis is consistent with the task at hand, which seeks to enable a better understanding of how best to leverage trade for structural transformation (SDG8) and job creation (SDG9). To allow for supporting gender equality (SDG5), the analysis will distinguish between male and female owned enterprises, with this chapter focusing on the former and the next on the latter.

Ministries and State agencies

- Ministry of Economy
- Ministry of Emergency Situations
- Ministry of Energy Infrastructures and Natural Resources
- Ministry of Healthcare
- Ministry of Nature Protection
- Ministry of Transport, Communication and Information Technologies
- Food Safety Inspection Body under the Government of the Republic of Armenia
- State Revenue Committee Customs Service
- National Institute of Standards
- National Institute of Metrology
- National Accreditation Body

Market support institutions and logistics service providers

- Chamber of Commerce and Industry
- Customs brokers
- Freight forwarders

1.4 Outline of the study

The study is divided into eight chapters. The introduction in Chapter 1 is followed by the profile of the interviewed traders in Chapter 2. Chapter 3 provides an assessment of trade facilitation conditions in the country and leads to an examination of the institutional bottlenecks facing State agencies involved in the areas of technical regulation, standardization and conformity assessment in Chapter 4.

Chapter 5 highlights the implications of the identified barriers for regional integration, thereby setting the context for capturing the interplay between the identified barriers and export diversification. In so doing the study brings forward the growth dynamics influencing structural transformation at the enterprise level, making a distinction, in chapters 6 and 7, between those influencing male and female-owned enterprises. Chapter 8 provides concluding remarks and action-oriented recommendations for the Government's consideration. The chapter also highlights the recommendations' contribution to the achievement of the sustainable development goals (SDGs), with a view to providing the Government with evidence-based indicators for monitoring progress in implementing the 2030 Agenda.

In addition, upon the request of the Government, a thorough analysis of regulatory and procedural barriers to increasing exports of dried fruits and vegetables, accorded special emphasis for agricultural development and job creation. The analysis, conducted in October 2018 and provided in the appendix, brings forward priority needs that should be addressed in tandem with the recommendations provided in Chapter 8.

Chapter Two

Traders' Profile

2.1 Introduction

As previously mentioned, this study involved face-to-face interviews with 91 traders from across the country belonging to priority sectors identified by the Government using the UNECE traders' questionnaires. The enterprises comprised 61 male-owned enterprises and 30 female-owned enterprises engaged in or with plans to commence export activities.

This chapter provides the profile of these enterprises to set the context for the analysis. It starts by providing the salient features of the surveyed enterprises in terms of their size, location and activities. The differences between female and male-owned enterprises are then highlighted, leading to an overview of the surveyed traders' transport modes of choice and concluding remarks on the profile of the surveyed enterprises.

2.2 Salient features

Mirroring the overall structure of the enterprise sector, around 54 percent of the surveyed enterprises were micro, employing less than 10 persons (Figure 2.1). Small enterprises accounted for the second largest segment (35 percent), with medium and large enterprises accounting for a combined share of 11 percent.

The enterprises choice of location mirrors national trends, with the capital city of Yerevan standing as home to around 77 percent of the surveyed enterprises (Figure 2.2). The city generated 41 percent of total industrial output³³ and accommodated around 52 percent of small and medium size enterprises in 2017.³⁴

All the enterprises were engaged in international trade, though their activities were more tilted towards imports, and some combined trade with manufacturing activities. These common features mask differences in sectoral size, specialization, and trade patterns, which are highlighted in the below sections.

Figure 2.1 Surveyed enterprises by size (% shares)

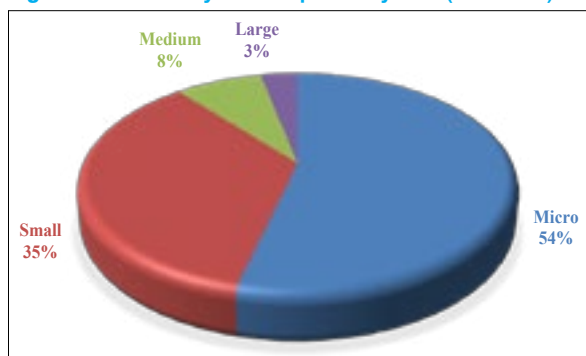
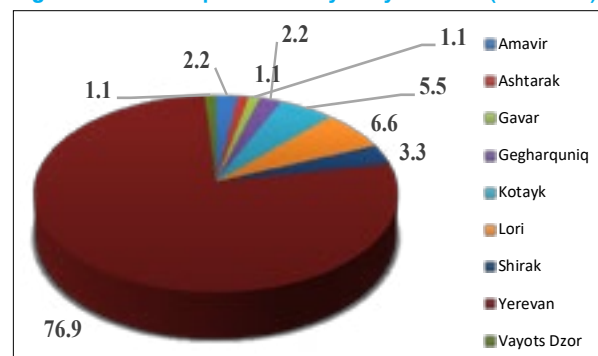


Figure 2.2 Enterprises surveyed by location (% shares)



33 ARMSTAT

34 Around 52 percent of SMEs are located in Yerevan and the adjacent regions of Kotayk (7.5 percent), Ararat (6.3 percent) and Armavir (6.4 percent). European Bank for Reconstruction and Development (EBRD) Business Support Office (2017), Research on SME taxation field; available at: <http://www.bso.am/wp-content/uploads/2017/12/SME-Taxation-Field-2016.pdf>

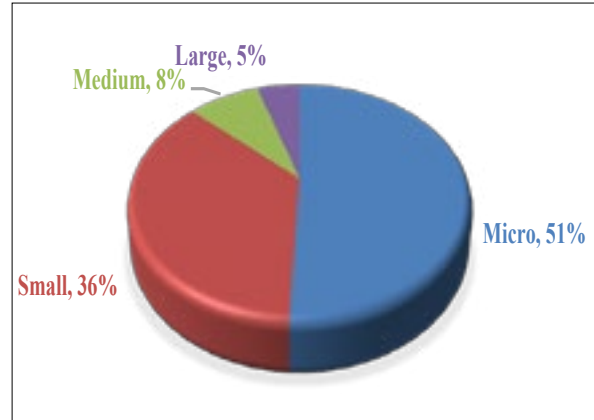
2.2.1 Male owned enterprises

2.2.1.1 Location, size and activities

As shown in figure 2.3, micro enterprises accounted for the largest segment of the male-owned enterprises. The enterprises choice of location also mirrors national trends, with the capital city of Yerevan standing as home to the largest segment (Figure 2.4).

In terms of sectors, enterprises engaged in manufactured articles represented the largest segment, with a 28 percent share (Figure 2.5). Those belonging to food and live animals represented the second largest segment (25 percent), followed by those engaged in manufactured goods (20 percent) and chemicals (11 percent).

Figure 2.3 Male-owned enterprises by size



All the surveyed traders were engaged in international trade. However, this engagement was heavily tilted towards imports, and involved sourcing products for sale in domestic markets, use in manufacturing or re-export. Those involved in export activities represented 25 percent.

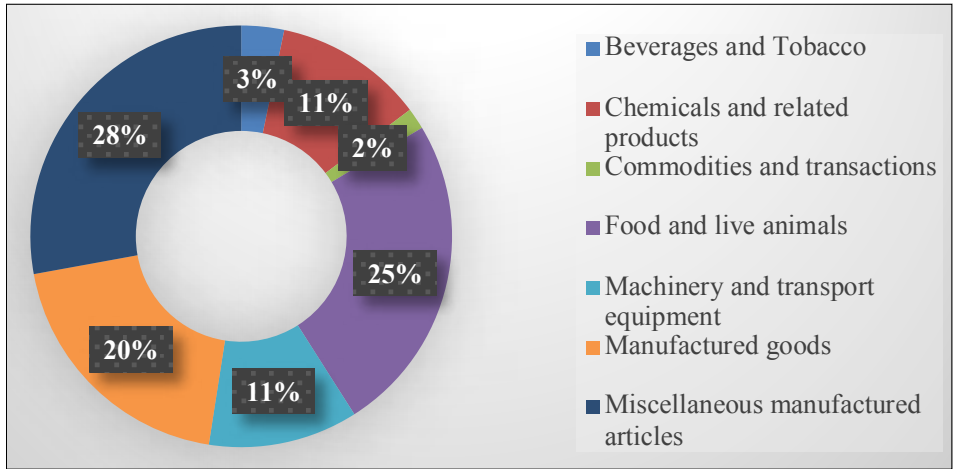
Moreover, around 27 percent combined export and import activities with production.

As shown in Annex 2 (Table A2.1), producers manufactured 85 products (of which 78 were final products), and the majority combined production with export and import activities.

Figure 2.4 Male-owned enterprises by location



Figure 2.5 Male-owned enterprises by sector (% share)



2.2.1.2 *Export, import and trading partners*

The enterprises export 68 products to a diversified list of partners, including: Argentina, Belgium, Belarus, Canada, Congo, the Czech Republic, France, Georgia, Germany, Iran, Kazakhstan, Kuwait, Kyrgyzstan, Latvia, Lithuania, Poland, Malaysia, Qatar, the Russian Federation, Spain, Sweden, the United Arab Emirates, Ukraine, the United Kingdom of Great Britain and Northern Ireland and the United States of America (USA).

Figure 2.6 Male-owned enterprises top 10 export markets (% of respondents)

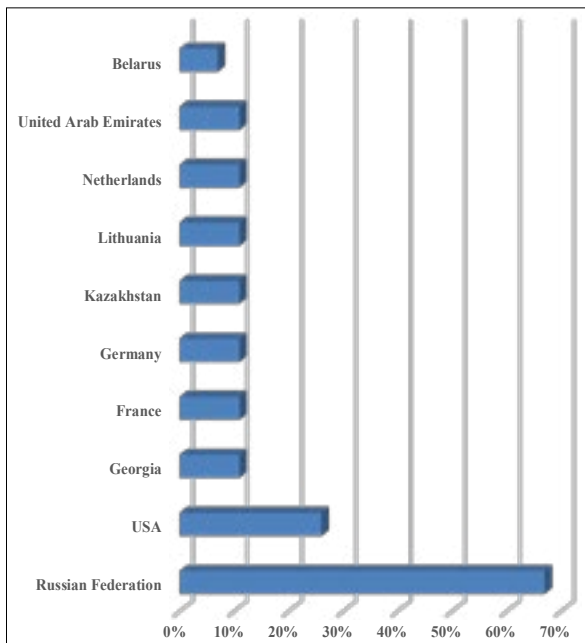
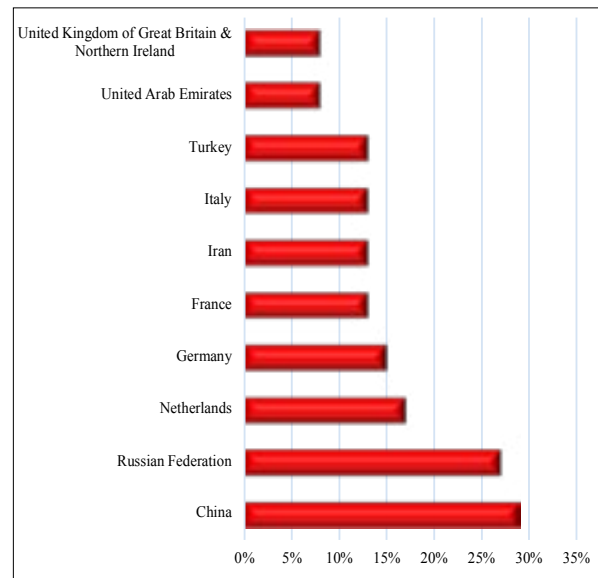


Figure 2.7 Male-owned enterprises top 10 import sources (% of respondents)



This impressive list, provided in annex 2 (Table A2.2), comes around 33 percent of the enterprises commenced export activities in 2008.³⁵ As shown in figure 2.6, the Russian Federation stands as the main outlet, continuing a historic trend.

On the import side, the enterprises source 158 products, consisting mainly of consumer goods (Annex 2, Table A2.3). Most of the products are sourced from People's Republic of China and the Russian Federation, reported as the main partners by 29 and 27 percent of the respondents, respectively (Figure 2.7).

2.2.2 Female-owned enterprise

2.2.2.1 Location, size and activities

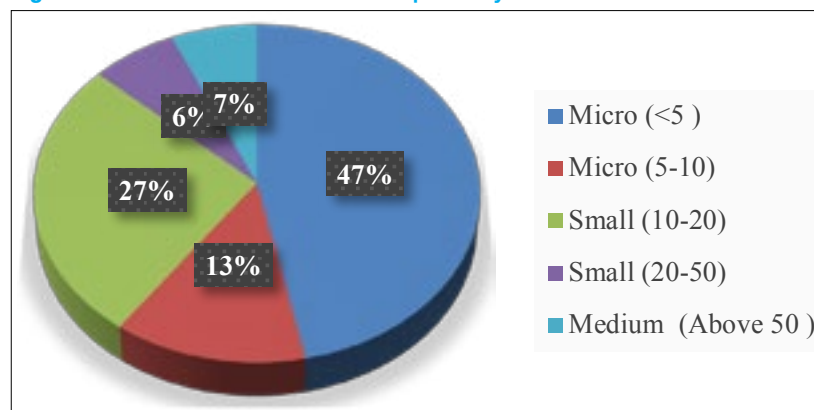
As shown in figure 2.8, the female-owned enterprises were predominantly micro, with those employing fewer than 5 persons constituting the largest segment. Just like their male-owned counterparts, the majority were located in the capital city of Yerevan; Armenia's commercial and industrial hub (Figure 2.9).

In terms of activities, around 50 percent were involved in manufacturing, followed by food (43 percent) and beverages (7 percent). As shown later, this limited range of activities cannot be understood in isolation of the factors that inspired the entrepreneurs' decisions to join the business community (Chapter 7).

All the enterprises were engaged in production. As shown in annex 2 (Table A2.4), these activities involved manufacturing 79 products, including 71 final products that are dominated by food and textiles.

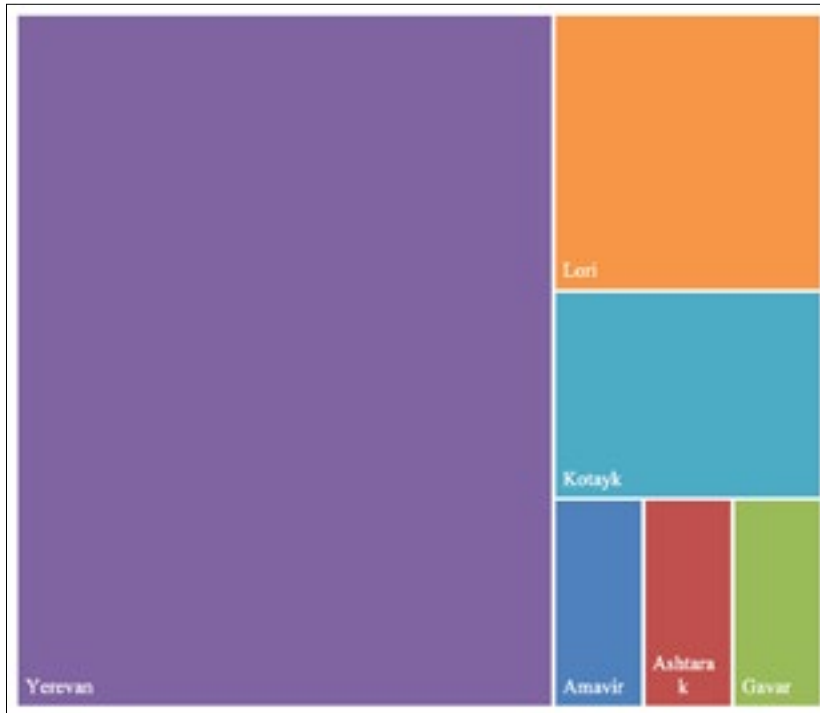
However, only 50 percent, or 15 enterprises, were engaged in international trade. Of these only 11 enterprises were engaged in selling their products abroad.

Figure 2.8 Female-owned enterprises by size



35 The remaining traders reported 2001, 2007, 2011 and 2017 as the start date for exports

Figure 2.9 Female owned enterprises by locaiton

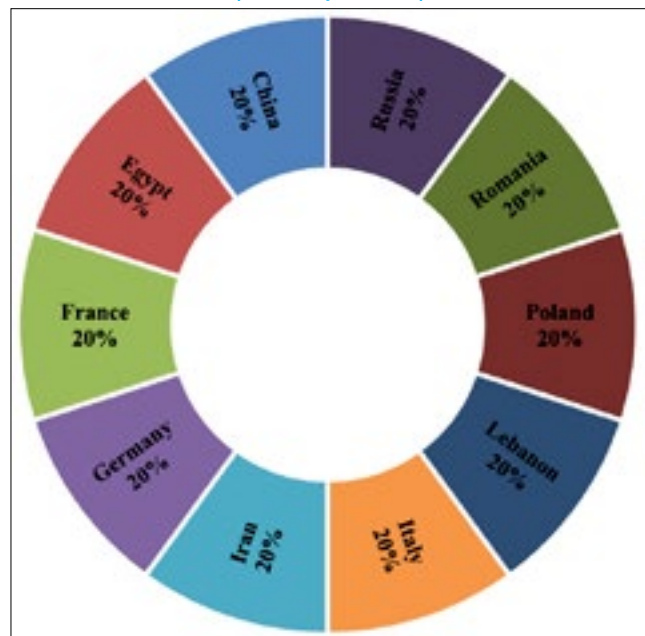


2.2.2.2 Exports, imports and trading partners

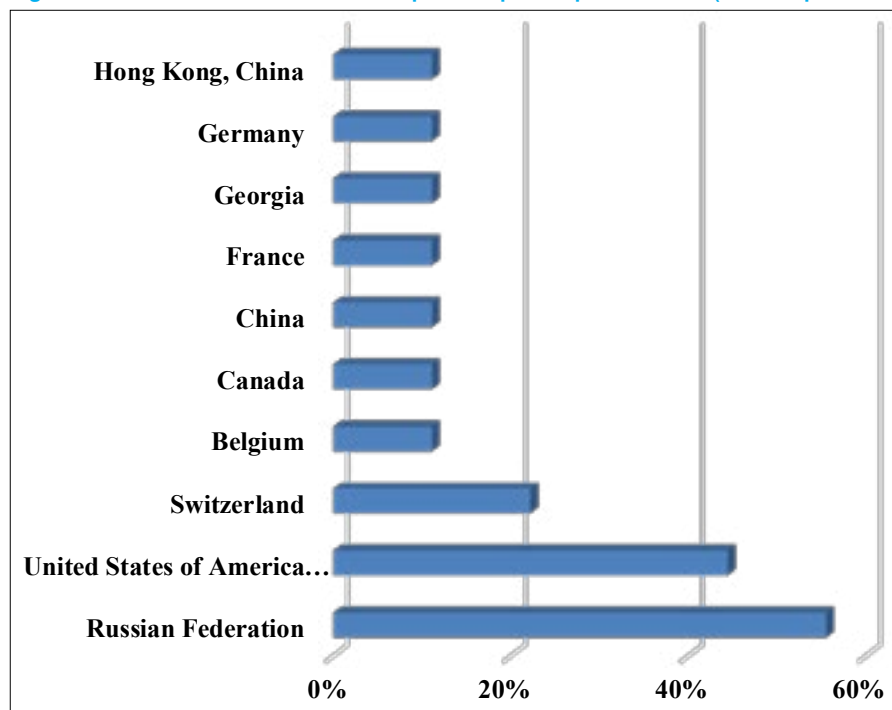
The female-owned enterprises export 11 products to 16 countries across the globe, with the Russian Federation and the United States of America representing the main trading partners (Annex 1, Table 1.5). This record, reflected in figure 2.10, was build over the past three years, with the majority reporting the period 2015-2018 as marking the start date of exports.³⁶

On the import side, the enterprises source 15 products, consisting mainly of raw material (Annex 1, Table 1.6). These products originate from 15 countries, with the top ten sources claiming equal shares of the enterprises’ total imports (Figure 2.11).

Figure 2.10 Female owned enterprises top 10 supply sources (% of respondents)



³⁶ Around 27 percent reported commencing export activities in 2018. Another 27 percent reported 2017 as a start date, while 18 percent commenced exports in 2015.

Figure 2.11 Female-owned enterprises top 10 export markets (% of respondents)

2.3 Transport modes of choice

Trucks constituted the traders' transport mode of choice for shipping to/sourcing from nearby countries and were used in combination with maritime transport for dispatching cargo to/from distant markets. Mirroring national trends, Georgia stands as the surveyed traders' main gateway to the world. As shown in table 2.1, the bulk of inbound and outbound cargo transits the territory of Georgia by road or is transshipped via the port of Poti (with trucks used to transport the cargo to/from the port of Poti).

Transport by air was used on a limited basis for shipping light products (Annex1, Table A1.7), and only a handful of enterprises reported shipping by rail, given the high costs that this transport mode involves. Armenia has only one active international rail crossing, which passes through Georgia. Using this rail means that international freight must necessarily arrive via the port of Poti at a higher cost since BCPs with Azerbaijan are closed.

As shown in the next chapters, these transport routes reflect not only the limited options available to enterprises, but also the slow progress in implementing infrastructure development initiatives. Traders are additionally challenged by Armenia's underdeveloped road network.³⁷ As explained by traders and forwarders, except for those connected to international networks, primary roads tend to be in poor conditions, frequently unpaved and narrow (consisting of one lane) with poor signage. This is particularly the case of the main road to Iran, described as narrow, steep and in poor repair, rendering freight transport a risky undertaking and effectively perilous in winter. Secondary roads are also in poor repair so that they create unnecessary risks for traders, particularly during winter. As shown in the next chapter, these conditions are responsible for increasing transaction costs to prohibitive levels, with negative consequences for the enterprises' competitiveness and development prospects.

³⁷ According to most recent statistics by ARMSTAT Armenia's road network ran 7,570 kilometres in total length in 2006, including: 1803 kilometres of highways; 1966 kilometres of provincial roads; and, 3801 kilometres in communal roads. The motorways (limited access highways to motor vehicles only) stretched over 1686 kilometres in 2008.

Table 2.1 Transport modes and routes used for shipment to target markets

<i>Destination country</i>	<i>Transport mode</i>	<i>Transit</i>
<i>Belgium</i>	Truck, Maritime	Georgia
<i>Belarus</i>	Truck	Bulgaria, Georgia, Russian Federation, Turkey
<i>Bulgaria</i>	Truck	Belarus, Georgia, Russian Federation, Serbia, Turkey
<i>Canada</i>	Truck, Maritime	Georgia, Spain
<i>Congo (Democratic Republic)</i>	Truck, Maritime	Georgia, Russian Federation
<i>Czech Republic</i>	Truck	Bulgaria, Belarus, Georgia, Russian Federation
<i>France</i>	Truck	Bulgaria, Georgia, Russian Federation, Serbia, Turkey
<i>Georgia</i>	Truck	
<i>Germany</i>	Maritime, Truck	Bulgaria, Georgia, Russian Federation, Turkey
<i>Iran (Islamic Republic)</i>	Truck	
<i>Iraq</i>	Truck, Maritime	Bulgaria, Georgia, Russian Federation, Turkey
<i>Kazakhstan</i>	Trucks, Rail	Bulgaria, Georgia, Russian Federation, Turkey
<i>Kuwait</i>	Truck	Bulgaria, Georgia, Russian Federation, Turkey
<i>Kyrgyzstan</i>	Truck	Bulgaria, Georgia, Russian Federation, Turkey
<i>Latvia</i>	Truck	Bulgaria, Belarus, Georgia, Russian Federation
<i>Lithuania</i>	Truck	Bulgaria, Belarus, Georgia, Russia, Turkey
<i>Malaysia</i>	Truck, Maritime	Georgia
<i>Poland</i>	Truck	Georgia
<i>Qatar</i>	Truck, Maritime	Bulgaria, Georgia, Russian Federation, Turkey
<i>Russian Federation</i>	Truck, Maritime	Georgia
<i>Serbia</i>	Truck	Bulgaria, Georgia, Turkey
<i>Spain</i>	Truck, Maritime	Georgia
<i>Sweden</i>	Truck	Georgia, Turkey
<i>Turkey</i>	Truck, Maritime	Georgia
<i>United Arab Emirates</i>	Truck, Maritime	Bulgaria, Georgia, Russian Federation, Turkey
<i>Ukraine</i>	Truck, Maritime	Georgia, Bulgaria, Belarus, Russian Federation
<i>United Kingdom of Great Britain and Northern Ireland</i>	Truck, Maritime	Georgia
<i>United States of America</i>	Truck, Maritime	Georgia, Bulgaria, Belarus, Russian Federation, Germany

2.4 Concluding remarks

The surveyed enterprises share the salient features of the Armenian non-resource-based industries, in that they are dominated by micro and small enterprises and tend to be concentrated in the capital city of Yerevan. Moreover, while all the enterprises are actively engaged in foreign trade, their activities are tilted towards imports for sale in local markets, re-exports and use in manufacturing activities.

Less than 50 percent of the enterprises were involved in exports. The enterprises have succeeded in extending their outreach to regional and global markets, despite the limited transporting routes and high transport costs resulting from the closure of BCPs with Azerbaijan and Turkey. However, the enterprises show a significant reliance on the Russian Federation and, to a more limited extent, the USA as the main outlet for their products.

These common features are underpinned by differences in size, sectoral specialization and export mix. Female-owned enterprises are dominated by micro enterprises and tend to be concentrated in two industries; namely food and textiles. Yet, barring a few exceptions, their product mix is markedly different than their male counterparts (Box 2.1). They also seem to have been met with limited success when it comes to selling their products abroad (Annex 2, Tables A2.4 and A2.5).

Box 2.1 Manufactured goods by female-owned enterprises***Products manufactured exclusively by female-owned enterprises***

- | | | | | |
|--|------------------------------|--|-------------------------------|---------------------------------------|
| – Alani (pitted dried peaches stuffed with ground walnuts and sugar) | – Coconut oil | – Gourmet sweets (nougat, lokum, marzipan) | – Peach seed oil | – Suits for women |
| – Anti-aging products | – Curtains | – Grapes (for wine or for table) | – Pistachios | – Sun-dried tomatoes preserved in oil |
| – Dried apricots | – Dresses (women and girls) | – Grapeseed oil | – Quinoa | – Sunflower oil |
| – Apricot seed oil | – Dried apple | – Hempseed oil | – Rapeseed oil | – Animal feed |
| – Bags | – Dried apricots | – Humus | – Roasted almonds | – Sweaters |
| – Bio-liquid | – Dried cherries | – Jewelry from non-precious materials | – Roasted nuts | – Sweet sujuk |
| – Brandy | – Dried cornel | – Lavash | – Roasted peanuts with pepper | – Tan (Armenian kefir) |
| – Cardigans for women | – Dried figs | – Linseed oil | – Roasted peanuts with salt | – Trousers |
| – Chakalakum | – Dried melon | – Matsone (Armenian yogurt) | – Scarves | – T-shirts |
| – Chia | – Dried pear | – Nail care products | – Serums | – Walnut oil |
| – Children's costumes | – Dried persimmon | – Narine (Armenian fermented milk) | – Shampoo | – Whole-grain wheat lavash |
| | – Dried raisins | | – Shirts | – Yogurt |
| | – Dried walnut | | – Silk ensembles for women | – Skirts |
| | – Essential oils from plants | | – Silver hand-made jewelry | – Spices |
| | – Face creams | | – Gata (Armenian pastry) | |
| | – Face scrubs | | | |

Products manufactured by both female and male-owned

- | | | |
|----------------------|------------------|-------------------|
| – Baklava | – Dried Peach | – Shoes for women |
| – Butter | – Dried Plum | – Soap |
| – Cheese | – Dried tomatoes | – Vodka |
| – Pyjamas (children) | – Natural soaps | – Wine |

These differences reflect at once the factors that inspired the female entrepreneurs to venture into joining the business community (Chapter 7). They also reflect the different sets of growth dynamics bearing on the male and female-owned enterprises (Chapters 6 and 7), including trade facilitation and SQAM systems. These systems are unable to deliver on the Government's ambitious strategy, with their impact undermined by not only the current conditions of landlockedness but also by capacity shortfalls within State agencies and enterprise support institutions. These shortfalls are responsible for many of the regulatory and procedural trade barriers identified in the study (Chapters 3 and 4).

Chapter Three

Trade Facilitation Conditions

3.1 Introduction

Trade facilitation ranks high on the Government's 5-year development strategy, as part of a broader effort to modernise public administration and consolidate good governance. Migration to a paperless environment is at the centre of this effort, providing impetus for improving the quality of public services, reducing corruption, bringing greater transparency to decision-making processes and increasing the society's participation in these processes.³⁸

Reforms to date have involved the modernization of customs administration through the introduction of an electronic platform that supports the full automation of customs clearance procedures (including data entry and direct registration) using international standards (including the Single Administrative Document) based on UN/CEFACT Recommendation No. 34 on Data Simplification and Standardization for Single Windows and Recommendation 36 on Cross-Border Interoperability of Single Windows.³⁹ The platform, which is being developed using home-grown ICT system, also features a risk assessment function, and automatically assigns cargo to clearance/control channels (green for clearance without examination; yellow for documentary examination required; red for documentary and physical examination).

As of 2019, the platform was still in the development stage. It was used for processing customs declarations for imports of vehicles and medicine, with access granted to registered customs representatives (i.e., brokerage companies⁴⁰) with at least two certified employees who have successfully completed the training requirements. The platform was also used for calculating customs fees and charges associated with importing used passenger cars,⁴¹ and is connected with the management information system of the Food Safety Inspection Body (FSIB) under the Government. Trade is also supported by an electronic permits and licences system⁴², which is managed by the Ministry of Transport, Communication and Information Technologies.

Migration to paperless trade is proceeding in tandem with the streamlining and simplification of cross border trade in fulfilment of the country's commitments with the Eurasian Economic Union Customs Code⁴³ and the WTO Agreement on Trade Facilitation. As of March 2019, the Government has implemented 71 percent of these commitments, including those associated with: disciplines on fees and charges; appeal procedures; border cooperation; perishable goods; movement of goods intended for import under customs control; documentation requirements; pre-shipment inspection; rejected goods; temporary admission; post clearance audit; freedom of transit; and, customs cooperation. In addition, the Government is in the process of integrating the entire set of national non-tariff measures legislation into the United Nations online Trade Analysis Information System (TRAINS).⁴⁴ The system, which classifies legislation at the HS-based tariff line level (HS 6-digit), is an important tool for improving transparency.

38 As established under Armenia Development Strategy for 2014-2025. The strategy marshals development efforts around 4 priorities: Growth of employment; development of human capital; improvement of social protection system; and, institutional modernization of the public administration and governance.

39 UN/CEFACT recommendations are available at: https://www.ECE.org/cefact/recommendations/rec_index.html

40 Consistent with the terminology of the Eurasian Economic Union Customs Code, brokerage companies are referred to as customs representatives.

41 http://www.petekamutner.am/csOS_VehiclesCustomsValue.aspx

42 <https://www.e-gov.am/certificates/>

43 The Eurasian Economic Union Customs Code is established under the "Treaty on the Customs Code of the Eurasian Economic Union" of 11 April 2017, which entered into force in January 2018. The Treaty is based on the World Customs organization revised Kyoto convention and incorporates the principles of the WTO Agreement on Trade Facilitation. The Treaty is published at the Eurasian Economic Commission website. An English version also available at:

http://www.eurasiancommission.org/en/act/tam_sotr/dep_tamoj_zak/SiteAssets/Customs%20Code%20of%20the%20EAEU.pdf

44 The systems is maintained by UNCTAD <https://unctad.org/en/Pages/DITC/Trade-Analysis/Non-Tariff-Measures/NTMs-trains.aspx>

Table 3.1 Armenia's participation in UNECE Transport Agreements and Conventions

<i>Area</i>	<i>Agreements and Conventions</i>
<i>Infrastructure networks</i>	– European Agreement on Main International Traffic Arteries (AGR), 1975
<i>Road traffic and road safety</i>	– Convention on Road Signs and Signals, 1968
<i>Vehicles</i>	– Agreement concerning the Adoption of Uniform Technical Prescriptions for Wheeled Vehicles, Equipment and Parts which can be fitted and /or be used on Wheeled Vehicles and the Conditions for Reciprocal Recognition of Approvals Granted on the Basis of these Prescriptions, 1958
<i>Other legal instruments related to road transport</i>	– European Agreement concerning the Work of Crews of Vehicles engaged in International Road Transport (AETR), 1970 – Convention on the Contract for the International Carriage of Goods by Road (CMR), 1956 – Protocol to the Convention on the Contract for the International Carriage of Goods by Road (CMR), 1978
<i>Border crossing facilitation</i>	– Customs Convention on the International Transport of Goods under Cover of TIR Carnets (TIR Convention), 1975 – Customs Convention on Containers, 1972 – International Convention on the Harmonization of Frontier Controls of Goods, 1982 – International Convention to Facilitate the Crossing of Frontiers for Goods Carried by Rail, 1952
<i>Dangerous goods and special cargo</i>	– Agreement concerning the Adoption of Uniform Technical Prescriptions for Wheeled Vehicles, Equipment and Parts which can be fitted and /or be used on Wheeled Vehicles and the Conditions for Reciprocal Recognition of Approvals Granted on the Basis of these Prescriptions, 1958

Armenia is also signatory to 11 UNECE transport agreements and conventions, which provide a solid basis for transport development and facilitating the smooth flow of goods across borders (Table 3.1).

Barring the area of transparency, where female-owned enterprises reported additional challenges, the results of the traders' survey shows that the participation of female and male owned enterprises' in international trade is complicated by the same set of challenges. These stem from the lack of clarity over applied rules and procedures, a constraint that cannot be understood in isolation of the multi-faceted reforms underway within the context of the agreements with the EAEU and the EU; instances of cumbersome documentary requirements; weaknesses in border control functions; and, the limited range of transit routes available for traders.

3.2 Transparency

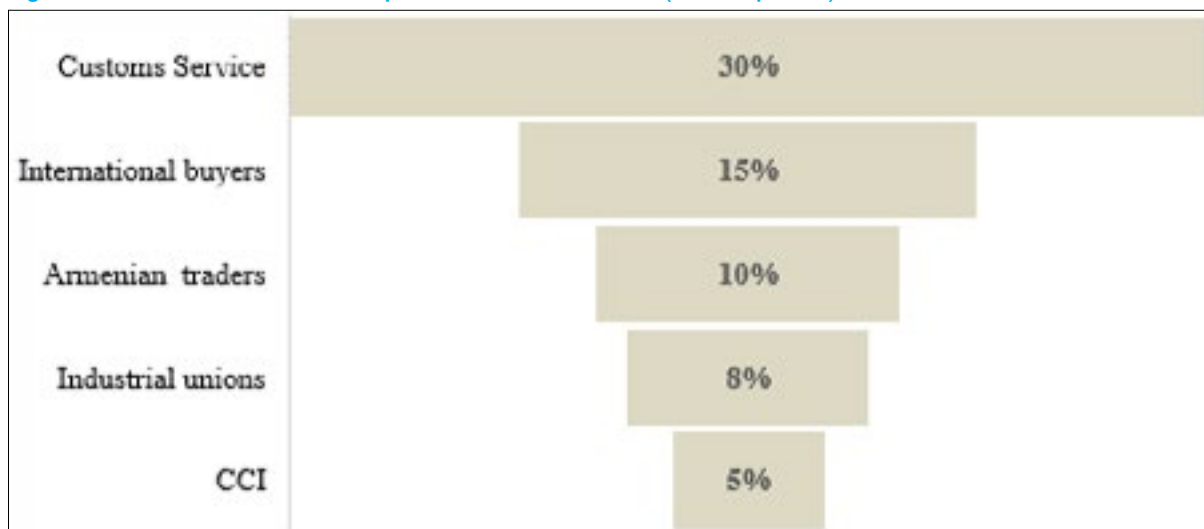
Most of interviewed male traders rely on customs brokers and freight forwarders for keeping abreast of applicable trade-related legislation and associated administrative procedures, which as shown in the remaining section is consistent with the important role that these actors play in supporting export and import activities. Traders also rely on the Customs Service institutional website, which provides up-to-date information in more than one language on cross border trade and customs fees.⁴⁵

Customs Service was also reported as the main authoritative source for further information on specific issues, which is obtained upon request by phone or email.⁴⁶ Other sources for additional information reported by traders include international buyers and, to a limited extent, industrial unions and the Chamber of Commerce and Industry (CCI) of Armenia (Figure 3.1).

45 Information is published in Armenian, English and Russian at: <http://www.petekamutner.am/DefaultCs.aspx?sid=cs>

46 Traders can subscribe to the Customs Service newsletter, disseminated free of charge by email, for up-to-date date information on applied customs regulations and administrative procedures. <http://www.petekamutner.am/Content.aspx?itn=csOSNewsletter>

Figure 3.1 Male-owned enterprises information sources (% of responses)



None of the traders reported using the advance rulings service for tariff lines, which was launched in 2017 with a maximum response time of 90 days. Traders seem to prefer reaching out to the Customs Service by email or phone and noted receiving the requested information within 1-2 business days. Customs Service officials, who lamented that the service is indeed not widely used, added that there were also cases where traders presented one set of documents for obtaining advance rulings only to clear their goods using another set.

The surveyed traders are not actively engaged in public-private sector consultative meetings. Only 36 percent of the traders reported participating in such meetings over the course of 2017, which were organized by the Ministry of Economy,⁴⁷ State Revenue Committee and the Ministry of Agriculture on quarterly, bi-annual and annual basis (depending on the organizing agency).

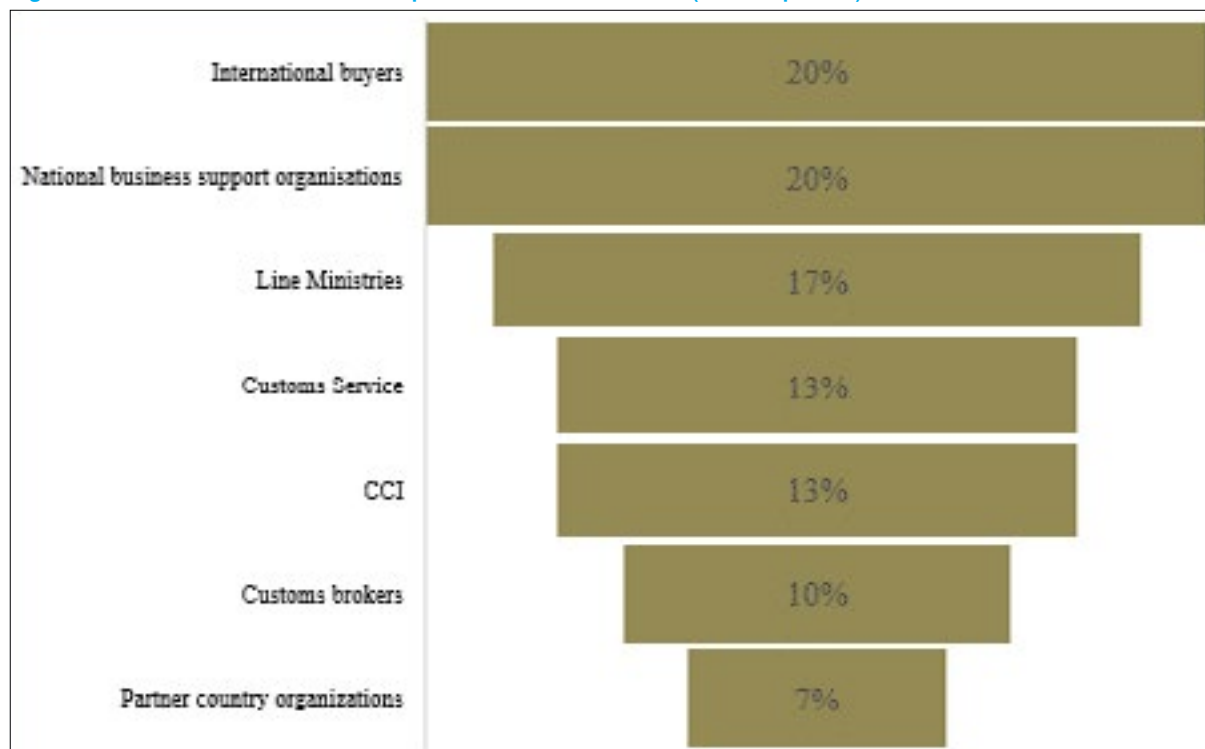
Key issues that formed the focus of consultations included tax policy and associated procedures along with customs clearance requirements, reflecting the Government's preparations for implementing the new tax code and the Eurasian Economic Union Customs code that were both slated for entry into force in January 2018.

Traders found these meetings useful in terms of shedding light over applicable legislation and procedures and providing enterprises with an opportunity to voice their concerns. However, the majority reported participating on an *ad hoc* basis.

By and large, male traders seem to be satisfied with the above-mentioned information sources. However, they complained about the shifting regulations, particularly in relation to consequences for documentary requirements, which complicates planning and causes delays. This concern was also raised by customs brokers, who also rely on the Customs Service website for keeping abreast of applied rules and approach the relevant agencies for additional information. While the agencies are quick to respond, usually within one working day, the information provided is sometimes confusing. This is particularly the case when the documentary requirements are not stipulated in national legislation.

Customs officials noted that the shifting regulations reflect the complex legislative harmonization effort under the EAEU, and noted that member States are still in the process of developing the complete set of regulations and procedures for implementing the EAEU Customs Code. This means that EAEU Customs Code is being implemented alongside national legislation for certain areas, pending the adoption of the said regulations and procedures. The national Customs Code of Armenia is also used for governing trade with the EU.

47 The Ministry publishes the schedule for these meetings on its website (<http://www.mineconomy.am/en/176>)

Figure 3.2 Female-owned enterprises information sources (% of responses)

In contrast, female-owned enterprises seem to rely on a broader range of information sources. The institutional websites of the different State agencies aside, owners show significant reliance on international buyers and business support organizations (Figure 3.2). Most cited among these were Business Armenia and the Small and Medium Entrepreneurship Development National Center under the Government of Armenia. Line Ministries, particularly the Ministry of Economy and the FSIB were also cited as main information sources. The owners noted that these institutions organize workshops to disseminate information on ongoing/ planned reforms and are quick to respond to requests for assistance. This includes not only providing information on trade procedures, but also helping enterprises find new partners and familiarising themselves with regulatory requirements in target markets.

Female traders are also engaged in public-private consultations. Around 43 percent reported participating in such consultations, which are organized by the Ministry of Economy, the Ministry of Health, the Ministry of Agriculture and the Tax Service. While the traders found these events as providing conducive forums for voicing their concerns, they noted the lack of follow-up measures.

The concerns raised by female and male owned enterprises reflect the increased challenges generated by the Government's multifaceted trade reforms to fulfil its commitments under the agreements with the EAEU⁴⁸ and the EU. As shown throughout the following chapters, traders have limited knowledge of the EAEU⁴⁸ and EU harmonised common standards and regulatory requirements. This is clearly demonstrated by the enterprises' low demand for quality standards. Closing this knowledge gap needs to be accorded priority treatment to enable enterprises to capitalize on emerging growth opportunities.

48 Enterprises benefited from a two-year transitional period (2016-2018) to achieve compliance with EAEU regulatory requirements, with the exception of certain products (e.g., furniture and wheeled vehicles) that carry longer periods of transition (2019 and 2022, respectively).

3.3 Documentary requirements and the use of electronic documents

The assessment shows that trade with non-EAEU countries is subjected to minimal documentary requirements. Goods originating from/destined to these countries are cleared based on the transport document (bill of lading or waybill and, for goods in transit, the TIR Carnet), the commercial invoice and sales contract. These are submitted along with the packing list, insurance policy and support documents for proving compliance with national and destination country safety, health and environmental protection regulatory requirements.

Goods sourced from/destined to EAEU countries, which are treated as internal trade transactions, are accompanied by a statement from the buyer on payment of VAT (filled out by the buyer and approved by national tax authorities) and a tax declaration (filled out by the seller) along with permits (as needed).

At issue are the challenges traders face in obtaining some of the trade documents. On the export side, traders highlighted several difficult to obtain documents due to what they described as complex procedures and/or support documentary requirements. Most notable is the certificate of origin (CoO) for products destined to the EU (Form A) issued by the Chamber of Commerce and Industry (CCI), which was cited by food producers. For example, exporters of dried fruits and chocolates reported providing extensive support documents, including: commercial invoice; customs declarations for imported raw material used in the production process; and a technical report detailing the production process and the use of raw material (to establish the level of processing). The exporters noted that they are also requested to provide an expertise act, issued by the CCI Limited Liability Company Armexpertiza, following onsite assessment of their production facilities, which extends the wait time for obtaining the CoO to up to 3 days. The CCI noted that work is underway to commence issuing certificates of origin in electronic form.

Similar concerns were raised by food producers exporting to third countries (i.e., non EAEU countries) as well as those selling alcohol in EAEU.⁴⁹ The respondents explained that they find it difficult to provide the technical reports. Exporters also noted that the process is further complicated by Armexpertiza requirement of having the goods loaded onto the trucks for verification before CoO issuance. This increases transaction cost in the form of additional fees for freight forwarders.

CCI and Armexpertiza representatives explained that the CoOs are issued following a standard procedure⁵⁰ within 3 working days if an expertise act is needed. Otherwise, it is issued within 1 working day. The fees have been recently streamlined to 30,000 dram if an expertise act is required and 10,000 dram otherwise (without expertise act). The difficulties stem from the exacting rules that traders should comply with, which dictate the extent of documentary requirements. The expertise act is not required for goods produced exclusively from locally sourced raw material; if the shipment weighs less than 2500 kilograms; for naturally dried fruits; and, for dried fruits that are processed (using machines) without additional ingredients (i.e. sugar).

They noted that the process is complicated by incomplete documentation and/or inaccurate information (contained in submitted support documents). Enterprises are not familiar with the rules of origin and this also applies to those with extensive experience in trade. CCI addresses this by offering individual consultation upon request, during which traders gain proper understanding of the specific rules applicable to their shipments and benefit from direct assistance in completing the documentary requirements.

49 Alcohol beverages destined to the EAEU should be accompanied by a certificate of origin.

50 Government Decision No. 1772 of December 2010.

As shown in table 3.2, exporters, particularly those selling dried fruits and alcohol in the EAEU⁵¹ and third countries, singled out conformity certificates as difficult to obtain. The difficulties stem from the laboratory test analysis, which take up to one week to complete. It is worth noting that compliance with the EAEU regulatory requirements can be proven through a declaration of conformity, which enterprises can fill in themselves. Yet, none of the traders reported using this option, showing preference to obtain the certificate of conformity, which is valid for 5 years. Exporters of wine also singled out quality certificates as difficult to obtain, noting that they are challenged by the preparation of the detailed technical report that should accompany the samples submitted for laboratory tests.

Yet another difficult to obtain document is the Convention for International Trade in Endangered Species (CITES) permit, which is issued by Ministry of Nature Protection. Exporters of frozen Siberian sturgeon and caviar noted that the permit should be signed by the Minister, causing unnecessary delays and multiple visits if the Minister is not available. Exporters of dual use goods also lamented the long wait time for obtaining the required certificate from the National Security Service, which they understand is caused by the extensive control checks that the Service should undertake.

For Armenian traders, a major concern are the administrative procedures. Cases in point are the veterinary and phytosanitary certificates that are issued by FSIB. Documentary requirements are limited to the duly filled application for, sales contract and commercial invoice; all of which are submitted by email or in hard copy. The certificates are issued within one working day. If the goods are deemed to present health risks, a sample is dispatched by the trader for laboratory analysis, which takes 2 to 10 working days to complete depending on the range of testing parameters. Officials from FSIB noted that the certificates are issued in 30 minutes (Box 3.1).

Veterinary certificates are also issued during the same day, since producers are subjected to regular onsite inspections. The procedure involves the following steps: (i) submission of the duly filled application (in hard copy or by e-mail); (ii) review of application; (iii) physical inspection of the products by veterinarian; (iv) veterinary certificate is prepared and submitted to the headquarters (in paper form or by email) for issuance. Laboratory tests are conducted if the products are deemed to present health risks and if the producer has not exhibited deviation from the veterinary requirements during the regular inspections. Interviewed traders expressed their satisfaction with the procedures, with the exception of fresh fish exporters. These lamented the long wait time for obtaining veterinary certificates, which always involve laboratory tests that take up to 5 days to complete. For these exporters, the delay carries significant costs in the form of damaged goods, since fish farming is perishable.

Other difficult to obtain documents cited by traders include re-export permits, which involve a long wait time and are often impossible to obtain. This requirement can be explained by the country's commitment to ensure that goods imported at levels below the EAEU common external tariff (CET) are not re-exported to other EAEU member States without effective payment of the difference.⁵²

51 The certificate is mandatory for products included in the EAEU common list of products subjected to conformity assessment procedures. These products should comply with a number of common technical regulations, including: "On Safety of Packaging", Technical Regulations "On Safety of Products for Children and Teenagers", Technical Regulations "On Safety of Toys", Technical Regulations "On Safety of Perfumery and Cosmetic Products", Technical Regulations "On Safety of Products of Light Industry". The certificates, which are valid throughout the EAEU territory, are issued by conformity assessment bodies registered with the EAEU. The list of products and conformity assessment bodies is available at: http://www.eurasiancommission.org/en/docs/Pages/IL_OS.aspx. Products that are not included in the list are regulated by national conformity assessment legislation and procedures.

52 As per Eurasian Economic Commission Council Decision No. 1138 of 10 December 2014, Armenia's accession package to the EAEU involved temporary exemptions for up to five years for 966 tariff lines until 2022. The exempted lines cover agricultural goods, chemicals, plastic and rubber, textiles, base metals, machinery, vehicles and precision instruments. For further details on this, see chapter five.

Box 3.1 Procedures for issuing phytosanitary certificates

In order to obtain an export phytosanitary certificate, the economic operator submits an application to the Border Control Point of the State Food Security Service, which includes:

- 1) the name, surname, place of residence of the exporting person, in case of a legal entity - the full name and location;
- 2) name of the importing country;
- 3) name, surname and residence address of the receiving person, in case of a legal person - full name and location;
- 4) names and quantity of exported plants, plant products and regulated articles;
- 5) place of receipt.

The Service, within one working day of the receipt of the request, carries out an examination of the exported plants, plant products and regulated articles and, in case of conformity with the rules of phytosanitary requirements of the importing country, issues a phytosanitary certificate, in accordance with RA Government Decision No. 1093-N of 30.08.2007, paragraphs 21 and 22 of Appendix 1.

This process, in fact, lasts nearly 30 minutes.

Paragraph 31 of the same Annex states that the granting of a phytosanitary certificate is denied within 24 hours of filing the application. The granting of a phytosanitary certificate is denied if the exported cargo does not comply with the phytosanitary requirements of the importing country, e.g. the cargo is infected with such harmful organisms the entry of which to that country is prohibited, which can only be confirmed by the results of laboratory examination.

When importing goods subject to phytosanitary control, the importer presents the trade and transport documents and the phytosanitary certificate issued by the exporting country to the Border Control Point of the Service. Sampling from the imported cargo and laboratory examination are carried out only when the Service inspector detects organisms on the surface or in packaging of the product subject to phytosanitary control, which by their morphological properties are similar to quarantine objects (quarantine harmful organisms), or if plant disease symptoms, i.e. signs of damage to the product of phytosanitary control by quarantine harmful organisms are detected. In this case, permitting or rejecting the import of the given cargo is determined by the results of the laboratory examination. If harmful organisms or their symptoms are not found during the examination, the import of the cargo is permitted immediately. This process also lasts for nearly 30 minutes, but, in case of need for laboratory testing, up to 24 hours, depending on the type of harmful organism. At the time of import, a quarantine phytosanitary control act is issued on the border, which is the document permitting the import of the given cargo. The import process is regulated by Annexes 3 and 4 of the RA Law on State Control of Food Safety. Both the phytosanitary certificate in the case of export and the quarantine phytosanitary control act in the case of import are provided free of charge.

Source: FSIB⁵³

Table 3.2 Documentary requirements for exports by level of difficulty

<i>Document</i>	<i>Product</i>	<i>Level of difficulty</i>	<i>Wait time</i>	<i>Cost (Armenian Dram, AMD)</i>	<i>Support Documents</i>
Certificate of origin for Commonwealth of Independent States (CIS) countries outside of the EAEU (Form ST-1)	Jewelry	Rather difficult	2 weeks	30,000	<ul style="list-style-type: none"> – Duly filled application form – Sales contract – Copy of Company Registration Certificate for VAT payment – Technical product description sheets – Certificate of authenticity (Ministry of Economy)
EAC Certificate (2 years validity)	Wine, cognac vodka, fruit vodka, berry vodka, roasted peanut	Difficult	1 week	100,000	<ul style="list-style-type: none"> – Duly filled application form – Sales contract – Copy of Company Registration Certificate for VAT payment – Quality certificate (attesting implementation of international standard) – List of product ingredients – Samples

53 Written comments received by the Secretariat on 15 May 2019

Table 3.2 Documentary requirements for exports by level of difficulty (continued)

<i>Document</i>	<i>Product</i>	<i>Level of difficulty</i>	<i>Wait time</i>	<i>Cost (Armenian Dram, AMD)</i>	<i>Support Documents</i>
Conformity certificate (non-EAEU)	wine fruit vodka, berry vodka and cognac vodka	Easy	1-3 days	50,000-100,000	<ul style="list-style-type: none"> – Duly filled application form – Samples
Certificate of origin	Shoes (destined to Belgium and UAE).	Easy	3 days	30,000	<ul style="list-style-type: none"> – Duly filled application form – Commercial invoice for locally purchased raw material – Packing list – Sales contract – Technical report detailing the production process and the use of raw material
Certificate of Origin for EU countries (Form A) and CIS countries outside the EAEU (Form ST-1)	Dried Fruits, wine	Difficult	2-3 days	30,000	<ul style="list-style-type: none"> – Duly filled application form – Packing list (2 copies) – Company's license (2 copies) – Commercial invoice (2 copies) – Company's registration certificate for VAT payment (2 copies) – Technological sheets detailing the production process (2 copies); – Commercial invoices for locally sourced raw materials – Customs declarations for imported raw materials used in the production process; – Appellation of origin statement: Declaration attesting to the national origin of the fruits from local municipality confirming that producer has own orchard, the type of trees and planted area (2 copies).
Conformity certificate issued by the National Institute of Standards (SARM) with 3 years validity	Red Dry Wine, Red Semi-Sweet Wine, White Dry Wine, White Semi-Sweet Wine	Difficult	3 days	50,000	<ul style="list-style-type: none"> – Duly filled application form – Company's license – Appellation of origin statement – Technical product description report – Samples
Certificate (VI 1) issued by the National Institute of Standards (SARM) issued for each shipment based on the commercial invoice	Wine	Difficult	3 days	30,000 per bottle	<ul style="list-style-type: none"> – Duly filled application form – Commercial Invoice – Packing list – 4 samples of each type of wine – Technical product description report – Appellation of origin statement
Veterinary certificate	Frozen fish	Difficult	3-5 days (with lab tests); 2 days and free of charge (without tests)	50,000-60,000	<ul style="list-style-type: none"> – Dully filled application form – Samples – Sales contract – Commercial invoice

Table 3.2 Documentary requirements for exports by level of difficulty (continued)

<i>Document</i>	<i>Product</i>	<i>Level of difficulty</i>	<i>Wait time</i>	<i>Cost (Armenian Dram, AMD)</i>	<i>Support Documents</i>
Dual use certificate	Brass Scrap, Aluminium Scrap, Copper Scrap	Easy	2 days	40,000	<ul style="list-style-type: none"> – Commercial Invoice, – Sales contract – Invoices for locally sourced raw material – Customs declarations for imported material – Technical production description sheets
Dual use certificate (issued by National Security Service)	Hard Disc Drive, Server, Computer, Ram Random Access Memory, Motherboard, Network Device, Switch Router	Easy	5 days	60,000	<ul style="list-style-type: none"> – Commercial Invoice, – Sales contract – Invoices for locally sourced raw material – Customs declarations for imported material – Technical production description sheets
Dual use certificate	Computers, Servers, Network Devices	Easy	2 weeks	80,000	<ul style="list-style-type: none"> – Commercial Invoice, – Sales contract – Invoices for locally sourced raw material – Customs declarations for imported material – Technical production description sheets
Export permission from the Ministry of Economy	Jewelry	Easy	3 days	0	<ul style="list-style-type: none"> – Certificate of Origin – Commercial Invoice (3 copies) – Company Registration Certificate for VAT payment

On the import side, traders reported their satisfaction with the simplified documentary requirements associated with sourcing from the EAEU countries. As shown in table 3.3, difficulties arise when importing meat from non-EAEU enterprises that are not included in the EAEU list of approved suppliers. Traders noted that it is difficult to register these suppliers, since this requires onsite inspection by the EAEU experts.⁵⁴

Similarly, as shown in the next section, inbound shipments from non-EAEU countries subject to veterinary and phytosanitary control are withheld with customs pending the release of laboratory test results, sometimes for an extended period, even though the goods are accompanied by the required certificates. Traders reported that the FSIB inspectors at border crossing points do not allow the shipments to pass customs if not accompanied by a national phytosanitary certificate. This requirement, explained the traders, is meant to enable traders to sell the goods in local markets. As the laboratory test results are not issued the same day, traders assume additional costs in the form of storage fees. For temperature sensitive products, the delays are compounded by financial losses in the form of damaged goods owing to the lack of refrigerated storage units at main border crossing points. Officials from FSIB noted that phytosanitary certificates for imports are issued within 30 minutes, but, in case of need for laboratory testing, up to 24 hours, depending on the type of harmful organism (Box 3.1)

54 Animal and meat products subject to veterinary control are listed in CU Commission Decision No. 317 and its amendments <http://www.eurasiancommission.org/ru/act/txnreg/depsanmer/regulation/Documents/Пр.1%20Единый%20перечень%20тов.pdf>. In 2017, the EAEU expanded the list to add leguminous vegetables used for animal feed, citron melons, and some feed additives. This was notified the WTO in October 2015 (G/SPS/N/RUS/110). Third country suppliers of these products should be registered in the common list of establishments authorized to export to the EAEU. These suppliers are granted the veterinary certificates after passing an audit of their SPS control system, which is conducted by EAEU auditors.

Other difficult to obtain documents cited by traders were product specific. Precious metals manufacturers reported experiencing delays in obtaining the State control act, which is issued by the Ministry of Economy. The wait period, which can reach 3 days, delays customs clearance, with the consequence of undermining the enterprises' ability to ensure timely delivery of products and generate additional costs in the form of freight forwarding fees.

On their part, importers of goods subject to cryptographic control reported significant delays in obtaining documentary requirements.⁵⁵ Most notable is the notification-cryptographic certificate and import permits issued by the National Security Service, which take up to 25 days and 10 days to obtain, respectively. The delay in obtaining the import permit, noted the traders, reflects the waiting time for receiving confirmation as to whether the product in question is registered in the Eurasian Economic Union Register of cryptographic means. Traders noted that as this delay is inevitable, they apply for this permit well in advance of shipment delivery.

Concerns were also raised by importers of dual use goods. Traders find the documentary requirements for obtaining the dual use certificate from the National Security Service as difficult to fulfil. The majority reported resorting to specialized companies for handling these requirements in return for an average of 60,000 AMD in services fee. Traders said that these fees enable them to save on human resources and time, and noted that it takes 5 days to obtain the certificate.

Traders also reported experiencing difficulties in obtaining import permits from the Ministry of Health, which does not have presence at border checking points. They argued that arrangements should be made for ensuring the presence of an inspector from the Ministry upon the arrival of goods. The inspector usually takes samples that are dispatched for laboratory tests, which extends the wait period to up to 6 days.

The above concerns aside, all trade documents are issued in the Armenian language and those accompanying inbound cargo should be translated into Armenian, which creates additional unnecessary costs. For example, goods accompanied by two certificates generate around USD 30 in translation costs per shipment. The requirement of submitting some trade documents in several copies should also be lifted, as this burdens the traders with red tape. In addition, as shown in tables 3.2 and 3.3, some documents are submitted in several copies, suggesting the need to reconsider administrative procedures associated with document issuance.

Table 3.3 Documentary requirements for imports by level of difficulty

<i>Document</i>	<i>Product</i>	<i>Level of difficulty</i>	<i>Waite time</i>	<i>Cost (AMD)</i>	<i>Support Documents</i>
"State control act" for importing precious metals (Ministry of Economy)	Jewelry Made of Semi-Precious Stones	Difficult	3 days	0	<ul style="list-style-type: none"> – Duly filled application form – Assay qualification certificate – Company's certificate of registration – Commercial invoice – Service contract
Conclusion on Cryptography certificate issued by the National Security Service	Phone Charger, Mp3 Music Player, USB plugs	Difficult	25 days	0	<ul style="list-style-type: none"> – Duly filled application form – Commercial invoice – Sales contract
Food hygiene certificate	Raw Chocolate and Marzipan from Belgium	Difficult	1 day	2000	<ul style="list-style-type: none"> – Commercial invoice – Sales Contract – Health Certificate from exporting country

55 Goods subject to cryptography control is available at: <https://www.sns.am/en/licensing/>

Table 3.3 Documentary requirements for imports by level of difficulty (continued)

<i>Document</i>	<i>Product</i>	<i>Level of difficulty</i>	<i>Waite time</i>	<i>Cost (AMD)</i>	<i>Support Documents</i>
Food hygiene certificate	Juice Concentrate from Netherlands	Difficult	4 days	50,000	<ul style="list-style-type: none"> – Certificate of analysis issued by a testing laboratory in the exporting country – Samples
Import permit issued by National Security Service	Server, Computer, Networking Equipment	Difficult	10 days	1000	<ul style="list-style-type: none"> – Dully filled application form – Sales Contract – Commercial invoice
Veterinary Certificate	Dried fish feed from Netherlands	Difficult	17 days	0	<ul style="list-style-type: none"> – Original Veterinary Certificate from exporting country, – Quality certificates (ISO, British Retail Consortium-BRC) – Commercial invoice – Sales contract
Phytosanitary Certificate	Tomato Seeds from Netherlands	Easy	3 days	12000	<ul style="list-style-type: none"> – Original of phytosanitary Certificate – Quality certificates (ISO, BRC) – Commercial invoice – Sales contract
Phytosanitary Certificate	Tannin	Difficult	2 weeks	20,000	<ul style="list-style-type: none"> – Quality certificate provided by the seller – HACCP certificate provided by the seller – Attestation from Armenian producer that the tannin will be used for the production of the good in question (in this case wine) – Sales contract – Commercial invoice – Samples
Food hygiene certificate	Chocolate Bars from France	Easy	2 days	60,000	<ul style="list-style-type: none"> – Original of Health Certificate (from exporting country), – Quality certificates (producer) – Commercial invoice – Sales contract
Food hygiene certificate	Food supplements	Easy	1 day		<ul style="list-style-type: none"> – Good Manufacturing Practices (GMP) certificate – Original health certificate from exporting country – Commercial invoice – Sales contract
Import license from Ministry of Health	Medicine	Easy	10 days ⁵⁶	5000	<ul style="list-style-type: none"> – Duly filled application form – Commercial invoice – Packaging list – Quality certificate
Import permit for high frequency devices (issued by the Ministry of Transport, Communication Information Technologies	Uninterruptible power supply (UPS) devices	Easy	1 day	1000	<ul style="list-style-type: none"> – Filled out application form – Sales Contract – Commercial Invoice

56 Officials from the Ministry of health noted that according to established legislation, the Ministry issues import licenses within 7 business days.

Table 3.3 Documentary requirements for imports by level of difficulty (continued)

<i>Document</i>	<i>Product</i>	<i>Level of difficulty</i>	<i>Waite time</i>	<i>Cost (AMD)</i>	<i>Support Documents</i>
Phyto-sanitary certificate	Chickpeas from Lebanon	Easy	1 day	70000	<ul style="list-style-type: none"> – Commercial invoice – Sales contract – Certificate of conformity from exporting country – Sample
Conformity certificate	Printing ink, Polymeric Raw Material (Polystyrene)	Easy	5 days	Not provided by trader	<ul style="list-style-type: none"> – Filled out application form – Certificate of Analysis issued by a testing laboratory in the exporting country – Sample
Supervision Act from the Ministry of Economy	Golden rings, bracelets, pendants and earrings	Easy	2 days	0	<ul style="list-style-type: none"> – Not provided by the trader (handled by a specialized company)

The assessment also suggests that more needs to be done to promote the use of electronic documents. Electronic declarations are not used by traders, since the EAEU Customs Code reserves the possibility of online submission to brokerage companies and not individuals. Customs brokers reported that while the e-declaration platform is user friendly, they still need to submit the customs declaration in paper form.

In contrast, the permits system, which is widely used by traders, complicates trade activities for enterprises that rely on customs brokers and forwarders for obtaining documentary requirements. As explained by customs brokers, access to the system is granted for traders only at a time when it is the customs brokers and not the traders who handle the documentary requirements. This complicates the organization of customs clearance. The brokers, who cannot follow up, must wait for receiving the permits/licences from traders for submission (in hard copies) during customs clearance.

These concerns point to the necessity of speeding up the issuance of trade documents. The focus should be on streamlining the administrative procedures for issuing the support documents, and addressing instances of repetitive submission. These imperatives should be taken into account as the government proceeds to establish a single window facility pursuant to its commitments under the WTO Agreement on Trade Facilitation. The emphasis should be on ensuring one-time-submission through a unified platform that builds on existing systems (Chapter 8).

3.4 At the border control

Control functions are carried out at the traders' warehouse facilities (only upon the request of traders), at designated farms and storage facilities (for livestock and animal products) or at border crossing points (BCPs). Most of the consignments transported overland (road and rail) are cleared inland at secure cargo depots and warehouses designated as customs processing zones, while air cargo is cleared at airports. Goods are controlled by three agencies, namely: Customs Service, FSIB⁵⁷ (sanitary, phytosanitary and veterinary control) and the National Security Service. Customs duties payments are made through a single cashier to the Customs Revenue Service, which is responsible for tax revenue collection and administration.

57 See Government Decree No. 366-N of 5 April 2018.

Border control functions are carried out following internationally recognized best practice procedures and are framed in accordance with the integrated border management principles. For inbound cargo, the procedures commence with passport control followed by documentary checks and cargo/vehicle examination and eventual release of goods upon payment and the reverse for outbound cargo. Physical inspection involving several agencies is carried out simultaneously in inland customs terminals to avoid congestions, and at the border control is slated to benefit from the EAEU plans to establish EU-like rapid alert system for dangerous products.

Officials from FSIB noted that goods subjected to physical checks are cleared in two to ten working days depending on the testing parameters. Otherwise, i.e., if no tests are conducted, phytosanitary and veterinary certificates are issued free of charge the same day. However, FSIB efficiency is undermined by the lack of testing laboratories (FSIB has only three laboratories) and adequate vehicles (e.g., refrigerated trucks) for transporting samples to testing laboratories (where needed).

Since Armenia does not have common borders with the EAEU, goods are cleared using the customs transit procedure.⁵⁸ The procedure allows for declaring goods sourced from EAEU with the originating country customs authorities, and for clearing goods sourced from non-EAEU at the external frontier of the EAEU territory. Once declared, the cargo is accorded the status of “EAEU goods”, so that it could continue its journey under the customs transit regime and, thereof, benefit from the suspension of duties, taxes and regulatory measures applicable in the destination country.

For imports originating from non-EAEU countries, customs transit formalities are initiated at Lars-Verkhny border crossing point (BCP) between the Russian Federation and Georgia. As explained by customs officials, control functions focus on capturing irregularities (e.g., customs seal, gross and net weight) and the entire process should be completed within less than four hours. Traders expressed their satisfaction with these streamlined procedures and praised the customs zero-tolerance policy against informal payments that have been effectively implemented over the past two years.

Nonetheless, the assessment shows that clearance is often hindered by the lack of clarity over regulatory requirements on the part of the traders. Exporters often approach the customs officers to ensure fulfilment of documentary requirements and due diligence in filing out the customs declaration. Customs officials noted that traders are often in doubt or in disagreement with the customs brokers. This results in significant delays, especially at the Araratyan BCP, which has the heaviest traffic (80 percent of the cargo is processed at this BCP).

Delays are also caused by the Customs tendency to rely on physical inspection, particularly on imports sourced from non-EAEU countries. Most cited cases relate to food imports, which are subjected to sampling and laboratory tests, even though the cargo is accompanied by phytosanitary certificates from the relevant authorities in source countries. As explained by an importer of herbs, it sometimes takes up to 11 days to obtain the certificate, which delays clearance and generates additional costs in the form of storage and insurance costs (goods are kept at customs warehouses).

Other cases relate to importing goods subject to special permits, since requests can only be submitted upon the cargo's arrival to customs terminals. Clearance is invariably complicated by the delays even though the wait time has been reduced from one month to 5 working days (Box 3.2). Customs brokers noted that separate release from clearance is used on a very limited basis, and only when there is no storage space at the terminals warehouse facilities.

58 The customs transit procedure does not apply to goods transported through pipeline, electric transmission lines, sea or air. The EAEU customs transit procedure is established in the agreement on “On accession of the Republic of Armenia to the Agreement on Eurasian Economic Union of May 29, 2014”, Annex 5.

Box 3.2 Import permits and customs clearance: the case of computers

Clearing computers, servers and networking equipment is complicated by the processes associated with obtaining an import permit based on the dual-use certificate issued by the National Security Service. Interviewed customs brokers provided the following description:

- (i) The trader sends a letter to the NSS with a detailed description of the goods;
- (ii) NSS issues the dual use certificate (or refuses to do so);
- (iii) The trader submits the permit request along with the support documents online using the permit/license system that is managed by the Ministry of Transport, Communication and Information Technologies. The document is issued within five working days (previously in 30 days). Meanwhile, goods are kept at the terminal;
- (iv) Once the permit is obtained, the customs broker fills out the customs declaration using the Customs Service online platform. However, the declaration is printed and submitted in hard copy (along with the support documents) for customs valuation purposes;
- (v) Goods are released if assigned to the green channel following the payment of customs duties to the State Revenue Service.

Yet another major impediment to efficient clearance is customs valuation. Traders noted that the Customs Service tends to consider imports, particularly those sourced from People's Republic of China, Turkey and the United Arab Emirates, as undervalued and proceeds to use its own reference price list, which invariably indicates higher prices and is not published. This is also the case with goods purchased at discount prices, which effectively reduces profits. Importers of information and communications technology (ICT) equipment noted that clearance is consistently delayed if the products are imported for the first time, pending their introduction into the customs database for the purpose of establishing a reference price. While the customs creates what the traders and customs brokers referred to as a "sample document" detailing the technical specification of the product in consultation with the traders/brokers, the process is often long and results in extending clearance period by an addition day.

It is worth noting that appeal procedures, which have been revamped to ensure transparency, are not widely used.⁵⁹ Traders noted that they are discouraged by the long wait period for obtaining the Customs rulings, which, by law, is set at 30 days. Only 5 traders reported using this procedure to contest the Customs decision; four of which reported that the appeal decision was in their favour.

The Customs valuation practices contradict with Armenia's obligations under the WTO Customs Valuation Agreement, which stipulates calculating the customs value of imports using the transaction value method (i.e., based on the value reflected on the accompanying invoice) first, with the remaining methods applied in sequence if the customs value cannot be determined under the first method.⁶⁰ The difficulty is that customs has good reason, based on previous cases, to believe that at least some imports are under-valued; and has no means – beyond assessing the presented paperwork – of checking its assumptions. Part of the answer lies in the further development of the post-clearance audit function. This will enable customs to undertake systems-based audits, involving considered examination of the commercial processes and systems (losses, quantity discounting, and stock clearance, for example) underpinning import consignments; and then use the findings to adjust the parameters in the risk management system. This is a more holistic approach than the current practice, which relies mainly on the checking of individual import entries.

Such changes should be based on a review of the risk management system. A first step in this direction would be to further develop the AEO scheme, with a view to make it more accessible to enterprises. An AEO scheme should allow for monitoring overall performance of regular, reliable, compliant importers to have their overall performance monitored, rather than having their import consignments scrutinised transaction by transaction, and enable them to use simplified clearance procedures. This conceptualisation is imbedded in the Revised

59 Appeal procedures are published online: <http://www.petekamutner.am/Content.aspx?itn=csCIAppealProcedures>

60 The only exception is that the sequence of Methods 4 and 5 may be reversed at the request of the importer. The WTP Customs Valuation Agreement is available at: https://www.wto.org/english/docs_e/legal_e/20-val_01_e.htm

Kyoto Convention⁶¹, upon which the Armenia's national Customs Code as well as the EAEU Union Code is based. The development of this scheme will also be helpful in refining the customs automated risk assessment functionality, particularly the risk parameters used for establishing the traders' profiles.⁶²

3.5 Transit trade

Goods in transit are transported under the cover of the TIR Carnets⁶³ and are exempted from duties and taxes. However, as previously mentioned transit through Azerbaijan and Turkey remains blocked, with the consequence of increasing the cost and duration of shipment as enterprises re-route their cargo via Georgia. Georgia has been working closely with Armenia to facilitate cross border trade, and cooperation has been further strengthened over the past few years with the establishment of Integrated Border Management at the Bagratashen-Sadakhlo BCP along the main road between Tbilisi and Yerevan.

However, cargo transiting Georgia by truck through the Lars-Verkhny BCP between Georgia and the Russian Federation, commonly referred to as Upper Lars, is often impeded by congestion, particularly on the Russian side of the border. Traders noted that shipments through this BCP, which constitutes Armenia's closest gateway to the EAEU countries, are often delayed, sometimes up to 20 working days, with access completely blocked in winter due to repeated shutdowns. During these periods, goods are rerouted for shipment via the port of Poti at significantly higher costs.

Moreover, the assessment shows that transit via Georgia is often impeded by the lack of clarity over Georgia's environmental regulations and those related to dangerous goods. An illustrative case is an exporter of scrap metal who saw his shipment returned for failing to prove compliance with Georgia's regulations on hazardous waste. The trader explained that he was not clear as to the exact documents that should be accompanying the shipment, the issuing agency and the procedure for obtaining these documents.

61 International Convention on the Simplification and Harmonization of Customs Procedures, World Customs Organization, 1999 (as amended).

62 Such profiles usually contain a range of parameters, tailored to judgements made about the demands of the national control environment.

63 TIR carnet is a customs permit that allows a motor vehicle to be taken across an international border for a limited period.

Chapter Four

Regulatory and Standardization Policies

4.1 Introduction

Armenia's SQAM system comprises the National Institute of Standards (SARM), which is registered as a Closed Joint Stock Company (CJSC) under the Ministry of Economy with 100 percent State ownership; the National Accreditation Body (ARMNAB), which is a State Non-Commercial Organization under the Ministry of Economy; the National Institute of Metrology CJSC; and, the Market Surveillance Inspection Body, which is registered as a State inspectorate.

The system, which is coordinated by the Ministry of Economy,⁶⁴ has been the focus of consistent reforms to achieve compliance with international standards and best practices as envisaged in the quality infrastructure reform strategy 2010-2020. Since 2015, these reforms have been strengthened with an increased emphasis on regional harmonisation pursuant to the country's accession to the EAEU.

In 2019, the Government, which is an active participant in the development of EAEU common technical regulations,⁶⁵ was in the process of transposing the EAEU common technical regulations⁶⁶ and standards⁶⁷ into national legislation. Since the former involve stricter requirements, Armenia's accession package featured special and differentiated treatment provisions.⁶⁸ Applicable to most manufactured products, the provisions involve extensive transition periods, which for some products extend till 2019 (e.g., furniture) and 2022 (e.g., wheeled vehicles).

Drawing on the results of the face-to-face interviews with relevant State agencies, this chapter examines Armenia's SQAM system, with a view to highlighting capacity shortfalls that need to be accorded priority treatment.

4.2 Technical regulations

Technical regulations are developed by line Ministries based on the law "On Technical Regulation,"⁶⁹ following annual plans that guided by national priorities set out in the 5-year development strategy. Armenia's technical regulations are consistent with the WTO best practices in that they only spell out the essential requirements for ensuring compliance with safety, health and environmental protection concerns (Table 4.1).⁷⁰

64 The legislative basis of the Ministry's mandate in the area of SQAM is established under the Prime Minister of Republic of Armenia Decision No. 744 of 2018.

65 An overview of the EAEU procedures for technical regulations development is available at:

http://www.eurasiancommission.org/ru/act/teknreg/deptexreg/tr/Documents/%D0%98%D0%BD%D1%84%D0%BE%D0%B3%D1%80%D0%B0%D1%84%D0%B8%D0%BA%D0%B0_48.pdf

66 EAEU members have agreed to develop common technical regulations for 66 products (<http://www.eurasiancommission.org/ru/act/teknreg/deptexreg/tr/Documents/Ed%20perech%20new.pdf>; <http://eec.eaeunion.org/en/act/teknreg/deptexreg/tr/Pages/default.aspx>).

67 The number of common standards referenced in the EAEU common technical regulations is 5,000. These are being harmonized with international standards. As of September 2018, around 60% of the EAEU common standards were harmonized with international standards (Armenia 2018 Trade Policy Review, as submitted to the WTO; available at: https://www.wto.org/english/tratop_e/tpr_e/s379_e.pdf)

68 Eurasian Economic Commission Council Decision No. 1138 of 10 December 2014.

69 See Law "On Technical Regulation" of 2012 and subsequent amendments.

70 See Annex 3 of the WTO Agreement on Technical Barriers to Trade, also referred to as the "Code of Good Practice".

Table 4.1 Adopted methods for defining essential requirements in technical regulations

<i>Method</i>	<i>Rationale</i>
Technical requirements are contained in full in the text of the technical regulation	The requirements are defined in the text of the technical regulations
A national, regional or international standard is referenced by number, title, scope, date or any combination of these.	Most commonly used practice
An official list of “deemed to satisfy” standards is published	To provide producers, market surveillance and assessment bodies with the list of standards for achieving compliance with the requirements

Source: Ministry of Economy

Furthermore, the regulations are based on scientific evidence, collected through regulatory impact assessments (RIAs).⁷¹ As explained by officials from line Ministries, the RIAs’ focus on ascertaining the economic, legal, environmental and health consequences of new/ revised technical regulations, and are conducted by six specialized bodies working closely with the line Ministries.⁷²

The development of technical regulations also draws on the outcome of consultations with the private sector, which are organized by line Ministries involved in technical regulation development and the Ministry of Economy. Some Ministries, particularly the Ministry of Nature Protection, also rely on the enterprises’ written letters of concern for gaining further insights into the potential impact of new/ revised technical regulations. Moreover, draft regulations are published on the Government’s website for public comments⁷³ before eventual submission for adoption.

Armenia has committed to gradually transpose EAEU common technical regulations over a five-year transitional period that will expire end of 2020. The only exception was sanitary and phytosanitary legislation, which entered into force upon the country’s accession to the EAEU. As of September 2018, Armenia has implemented 36 EAEU technical regulations, amidst preparations to transpose and implement another 30. Officials noted that transposing the common EAEU technical regulations involves extensive discussions with the other member States to ensure proper reflection of Armenia’s specific needs.

The ministries were also in the process of harmonizing national legislation with 8 EU Directives for products that are not covered by the EAEU common technical regulations, including: low voltage electrical equipment safety, fuel, tobacco and vehicle safety. Armenia is also approximating national legislation in field of water quality and resources management with 5 EU Directives covering water management, floods, urban wastewater, drinking water and nitrates.

The responsible ministries said that the approximation process is often challenged by the lack of knowledge and expertise skills, noting that training is received on an *ad hoc* basis within the context of technical assistance projects. Some ministries reported receiving training as far back as three years. Officials also noted that successful implementation is challenged by the lack of conformity assessment bodies and raised concerns over the enterprises’ weak capacity to comply with the essential requirements contained in the harmonized technical regulations.

71 Decree “On Approval of Procedure of Development, Adoption and Implementation of Technical Regulations”

72 It was not possible to establish a clear understanding of RIA capacities and methodologies used. The interviewed officials noted that this is beyond their competence. They did not refer the UNECE consultant, who carried out the face-to-face interviews, to the specialized RIA bodies.

73 <https://www.e-draft.am/>

4.3 Standardization

The legislative basis for standardization is established under the law “On standardization” and associated legislation detailing standard-setting principles, organizational and methodical rules drawing on international best practices.⁷⁴ Armenia is a member of the World Organization for Animal Health (OIE): Codex Alimentarius; and, the Interstate Council for Standardization, Metrology and Certification of the Commonwealth of Independence States member. It is also a contracting party to the International Plant Protection Convention (IPPC).

Standard-setting activities are carried out by Technical Committees for Standardization, which bring together representatives from relevant State authorities and the industry.⁷⁵ The committees, which as shown in table 4.2 totalled 26 as of December 2018, are supported by SARM, acting as a secretariat.

Table 4.2 Armenia’s Technical Committees for Standardization (as at January 2019)

<i>No.</i>	<i>Title</i>
TC 01	Energy
TC 02	Meat, poultry, fish, eggs, and their products
TC 03	Fruit and vegetables product
TC 04	Milk and milk products
TC 05	Gas supply systems
TC 06	Information technologies
TC 07	Anti-seismic devices
TC 08	Water quality
TC 09	Chemical products
TC 10	Alcoholic beverages
TC 11	Tobacco and tobacco products
TC 12	Transportation
TC 13	Telecommunications
TC 14	Environmental management
TC 15	Cosmetic products
TC 16	Building, structures and building construction
TC 17	Biofuel
TC 18	Toy safety
TC 19	Electromagnetic compatibility of technical equipment
TC 20	Low-voltage electronic devices
TC 21	Compliance assessment and management systems
TC 22	Standardization policy and strategy
TC 23	Clinical laboratory testing and in vitro diagnostic test systems
TC 24	Safety in emergencies
TC 25	Petroleum and petroleum products
TC 26	Light and lighting

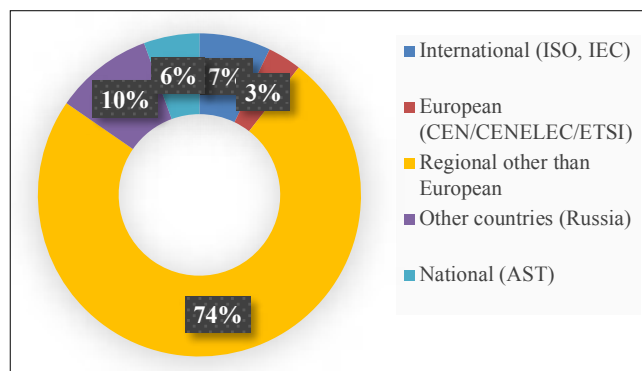
Source: SARM⁷⁶

74 Main legislation includes: AST 1.0-2006 “National System for Standardization. Basic provisions”; AST 1.1-2005 “National System for Standardization. Terms and definitions”; AST 1.2-2008 “National System for Standardization. Development of national standards”; AST 1.3-95 “National System for Standardization. Procedure for developing, agreement approval and state registration of specifications”; AST 1.4-2001 “National System for Standardization. Organization standards. Basic principles”; AST 1.5-2005 “National System for Standardization. Standards. General requirements for structure, drafting, presentation, content and indication”; AST 1.6-2006 “National System for Standardization. Adoption rules and methods for international and regional standards as national standards”; AST 1.8-93 “National System for Standardization. Procedure of expertise of the drafts of national standards”; AST 1.10-99 “National System for Standardization. Procedure for working out, acceptance, registration of rules and recommendations on of rules and recommendations on standardization, metrology, certification, accreditation and information about them”; and, AST 1.11-2002 “National System for Standardization. Procedure development and application of interstate standards”. A detailed list of standardization rules is published on SARM’s website at: <http://www.sarm.am/en/standarts/browse/1/9>

75 Technical committees are headed by chairs, elected by members and approved by SARM.

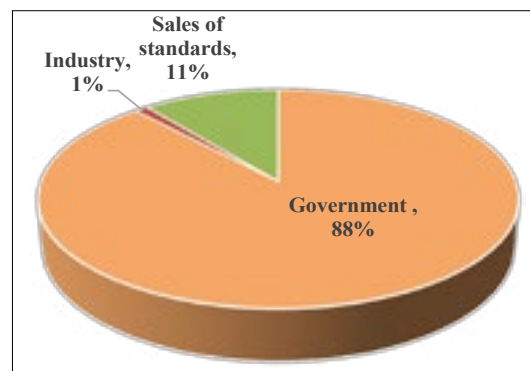
76 An up-to-date list of the technical committees is available at: <http://www.sarm.am/en/handznajoxovner>

Figure 4.1 Armenia's registry of standards



Source: SARM

Figure 4.2 SARM's sources of funds



Source: SARM

In delivering on its mandate, SARM draws on its participation in the standard-setting activities of the International Organization for Standardization (ISO) in its capacity as a member and the European Committee for Standardization (CEN) (Annex 3, Table A3.1). The institute is interested in joining the European Telecommunications Standards Institute (ETSI) as well as the International Electrotechnical Commission (IEC) to which it is an affiliate, with officials noting that membership in the latter is all the more important to enable SARM to cooperate with the European Committee for Electrotechnical Standardization (CENELEC).

As of January 2019, Armenia's registry comprised 6,947 standards.⁷⁷ As shown in figure 4.1, CIS interstate regional standards accounted for the largest share. Efforts were underway to ensure full and complete harmonization of the interstate standards with international standards within the context of the EAEU legislative processes.⁷⁸ SARM was also in the process of harmonizing national legislation with the European harmonized standards (ENs) for areas not covered by the EAEU regional standards (Annex 3, Table A3.2).

Officials noted that the institute's ability to deliver on its mandate is challenged by the lack of resources, given its heavy dependence on the public purse (Figure 4.2).

This has been undermining SARM's ability to attract expert assessors and industry representatives to participate in standard setting activities. It is often the case that industry representatives demand payment for participation, which the institute cannot afford.

These constraints have been also undermining SARM's ability to provide regular training to staff and industries, even though the institute has own training centre. Officials noted that staff receive training within the context of donor funded projects only. Most of the training courses were delivered by ISO, which also financed three training over the past 5 years.

4.4 Conformity assessment

Conformity assessment services are provided by State-owned and private conformity assessment bodies (CABs) guided by the law "On Technical regulation". The CABs are accredited by ARMNAB, which is guided by the law

77 Armenia's national registry of standards is available at: <http://www.sarm.am/en/standarts>

78 As of September 2018, around 60% of the EAEU common standards were harmonized with international standards (Armenia 2018 Trade Policy Review, as submitted to the WTO; available at: https://www.wto.org/english/tratop_e/tpr_e/s379_e.pdf). The Eurasian Economic Commission signed a Memorandum of Understanding with CEN and CENELEC on 21 June 2017, with a view to strengthen cooperation. The memorandum is geared towards facilitating information sharing, including best practices, and collaboration in international standard setting work under ISO and the IEC.

“On Accreditation” and associated Government Decrees.⁷⁹ In 2019, ARMNAB’s areas of competence covered: testing laboratories; calibration laboratories; inspection bodies; product certification body; management system; and, personnel certification bodies (Table 4.3).

A founding member of the Interstate Council for Standardization, Metrology and Certification of the Commonwealth of Independent States, ARMNAB operates following international best practices.⁸⁰ Accreditation decisions are based on an examination of the application requests⁸¹ and the results of onsite visits. Decisions are made by Accreditation technical committees, which are established by the Accreditation Board,⁸² which are submitted to the Director of ARMNAB for approval. The entire process takes six to nine months to complete, and ARMNAB maintains detailed records of accredited CABs for monitoring purposes

Table 4.3 ARMNAB’s areas of competence and staff

Area	International / regional standard	Internal assessors	External assessors	
			Technical assessors	Technical experts
Testing laboratories	ISO/IEC 17025	5	11	45
Calibration laboratories	ISO/IEC 17025	1	2	8
Medical laboratories	ISO 15189	-	-	-
Inspection bodies	ISO/IEC 17020	2	4	12
Product certification bodies	ISO/IEC 17065	4	5	38
Management systems certification bodies	ISO/IEC 17021-1	2	7	3
Persons certification bodies	ISO/IEC 17024	2	2	10

Source: ARMNAB

Decisions on expanding/reducing the competence areas of accredited CABs as well as on suspending/ re-granting of accreditation are also made by the Accreditation Technical Committees based on periodic assessments.

As shown in figure 4.3, by the end of December 2018 ARMNAB has accredited 57 CABs.⁸³ Most notable among the accredited bodies is SARM, which is the national CAB in the areas of: testing, management systems certification (quality management systems certification and environmental management systems certification); product certification; and, services certification. SARM has own laboratories specialized in foodstuff testing; radio and electronic equipment; petroleum; and, physical-chemical testing.

However, conformity assessment results issued by Armenian CABs are not recognized internationally. ARMNAB, which is an associate member of the European Cooperation for Accreditation (EA)⁸⁴, is yet to join the EA Multilateral Recognition Arrangement (MLA), the International Accreditation Forum (IAF) MLA and International Laboratory Accreditation Cooperation (ILAC) mutual recognition agreement (MRA).

79 Decree “On approval of membership and activity procedure of the Accreditation Council of certification bodies and testing laboratories in the field of conformity assessment and cancelling Decree of the Government of the Republic of Armenia No. 238 of 12 May 2007”.

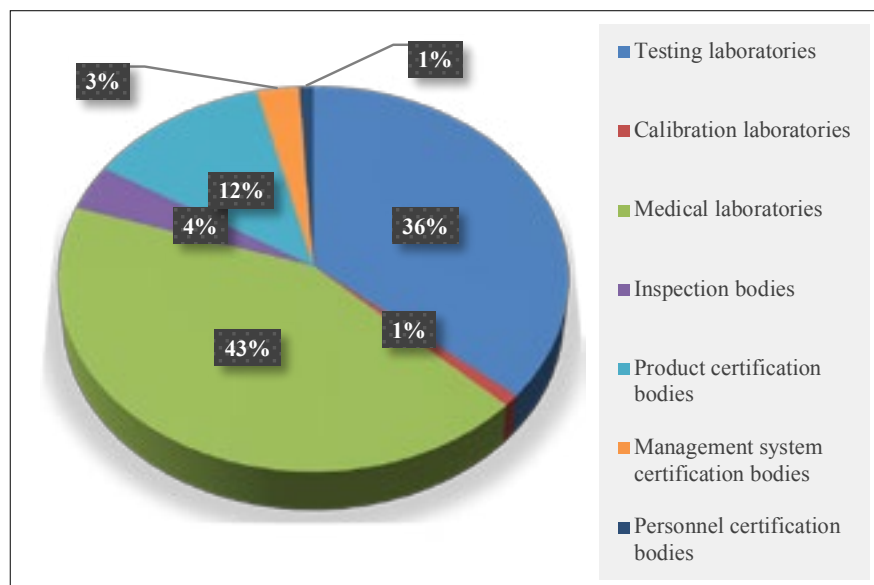
80 ISO/IEC 17011 standard on “Conformity assessment - Requirements for accreditation bodies accrediting conformity assessment bodies”.

81 <http://www.armnab.am/RegDocuments>

82 The procedure for establishing accreditation technical committees as well as their composition are set out in Accreditation Board Decision No.2 of 28 October 2015.

83 An up-to-date list of accredited CABs and those undergoing accreditation is published on ARMNAB’s website at: <http://www.armnab.am/CertificationBodyListN>

84 ARMNAB signed with associate membership agreement with EA on 24 November 2016. In is preparing to sign the Bilateral Agreement (BLA) with the EA in 2022.

Figure 4.3 National accredited CABs (as of end December 2018)

Source: ARMNAB

ARMNAB needs extensive support to complete its preparations. An important step in this direction would be to strengthen it with the advanced knowledge, expertise skills and ICT equipment, particularly in the areas of calibration and medical laboratories. Thus, far staff and expert training in all areas of competence has been erratic, provided exclusively within the context of capacity building projects.⁸⁵

Market surveillance⁸⁶ has entered a new phase in 2015 with the establishment of the Market Surveillance Inspection Body to consolidate market inspection functions for non-food products.⁸⁷ The inspectorate is responsible for ensuring consumer protection, including through defining rules of trade and industry; monitoring of market inspection activities; and, carrying out market control in 33 fields (Annex 3, Table A3.3). Inspection work is based on annual plans. The 2019 plan involved 250 inspections, including: 199 high risk, 39 medium risk and 12 low-risk business entities.⁸⁸

4.5 Metrology

Metrology activities, including applied (i.e., industrial), legal and scientific metrology, fall under the responsibility of the National Institute of Metrology (NIM) guided by the law “On ensuring uniformity of measurements” of 2013 and subsequent amendments. The guardian of Armenia’s measurement units, NIM’s areas of activity involve: type approval of measuring instruments based on the standards of the International Bureau of Weights and Measures (BIPM) and those of the Euro-Asian Cooperation of National Metrological Institutions (COOMET); calibration and inspection of measuring instruments; calibration of national standards; accreditation of legal entities and sole proprietors involved in the certification of measurement methods; and, scientific research in the field of metrology.

85 While the staff benefited from regular (three times a year) training over the period 2011-2013, they did not receive any training in 2016-2017 and were only trained once in 2018.

86 The information on market surveillance is based on desk study. It was not possible to schedule an interview with a representative from the Market Surveillance Inspection Body during the course of the field work. UNECE will gain first hand insights into the needs of this body during the stakeholder workshop.

87 The Inspectorate was established pursuant to the law “On inspection bodies” of December 2014.

88 <http://www.prosafe.am/public/uploads/pdf/2019/01/e74415ff9ee1d3241031a95f641ff586.xlsx>

In delivering on its mandate, NIM draws on its close collaboration with regional and international organisations (Table 4.4). However, the institute does not operate national standard-holding laboratories, nor does it participate in inter-laboratory comparisons due to the lack of financial resources. It lacks the expertise knowledge in industrial, scientific and legal metrology, with training courses delivered to date erratic and focused on general metrology. The need to further develop metrology cannot be emphasized, as a pre-requisite for addressing many of the challenges and concerns reported by CABs.

Table 4.4 NIM membership in regional and international organizations

<i>Metrology bodies</i>	<i>Areas of cooperation</i>
COOMET (member)	Etalons of physical quantities, legal metrology, accreditation and quality management systems, information exchange and training.
Scientific and Technical Commission on Metrology (STCMetr) of the Euro Asian Council for Standardization, Metrology and Certification (member)	Participation in STCMetr discussions on standard samples of composition and properties of substances and materials
International Atomic Energy Agency (member)	A secondary standard dosimetry laboratory (SSDL) operates in NIM with the assistance of the International Atomic Energy Agency (IAEA) that undertakes verification and calibration of dosimeters used in various fields to ensure relevant level of environmental protection and safety. In the framework of technical cooperation with the IAEA a secondary standard X-ray dosimetry laboratory will be established at NIM.
Physics and Technology Bundesanstalt (PTB), The National Metrology Institute of Germany (cooperation)	Advisory services, information exchange, training, participation in PTB conferences and seminars.

Source: NIM

Chapter Five

Regional Integration Dynamics

5.1 Introduction

As previously mentioned, the past few years have seen the Government embark on renewed efforts to increase the trade sector's contribution to economic development. These efforts involved leveraging regional integration with the EU and the EAEU to serve as an impetus for structural transformation, with a view to addressing the twin objective of job-creation and increased specialisation in production activities with high value-added. However, achieving the expected benefits is undermined by weaknesses in trade facilitation conditions and SQAM combine with the hindered access to international trade routes to inflate transaction costs.

This chapter takes the analysis a step further by exploring the welfare trade creation and trade diversion effects of existing regional trade arrangements. To do this, it starts with a brief overview of Armenia's trade patterns. It then uses trade indices to highlight the welfare effects of existing economic cooperation arrangements with the EAEU as a member of the regional block and with the EU under the GSP. This is followed by a discussion of policy implications drawing on the results of the traders' survey.

5.2 Trade patterns

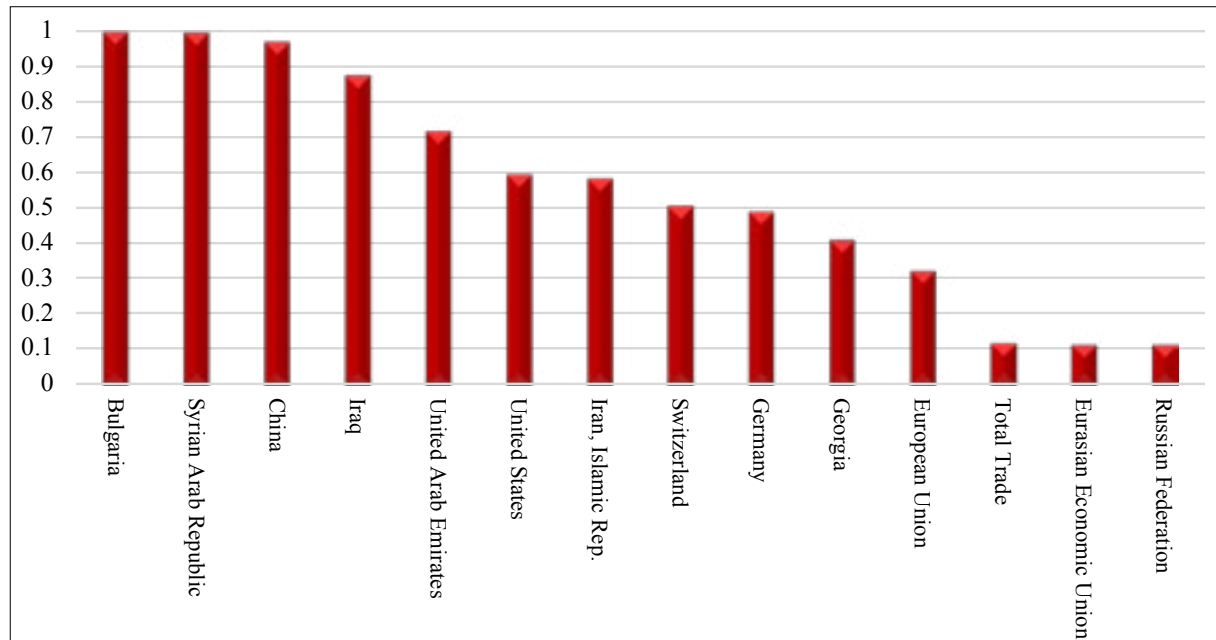
As previously shown despite consistent growth, exports continue to be outstripped by imports owing to the predominance of low-value added products and market concentration, with Bulgaria, Germany, Netherlands and the Russian Federation standing as the main outlets. Annex 1 (Table A1.3) sheds more light on Armenia's export pattern, showing that around 96 percent of the country's top 20 exports are sold on the EU markets. The EAEU shows a more limited demand for Armenia's top 20 exports, absorbing 57 percent of products.

However, a cursory examination of the country's export concentration index⁸⁹ reveals that exports to the EAEU are more diversified than exports to the EU (Figure 5.1) owing to geographic proximity and similar consumer tastes (Section 5.5). Exceptions to this trend are exports to Belgium and Syria, with only one product sold in each; a distinction, which as shown later is more a reflection of the enterprises' outreach efforts (Section 5.5).

In contrast, Armenia's imports from the EU are more diversified than those sourced from the EAEU (Figure 5.2), with EAEU standing as the main supplier of fuel, natural gas and aluminium (Annex 1, Table A1.4).

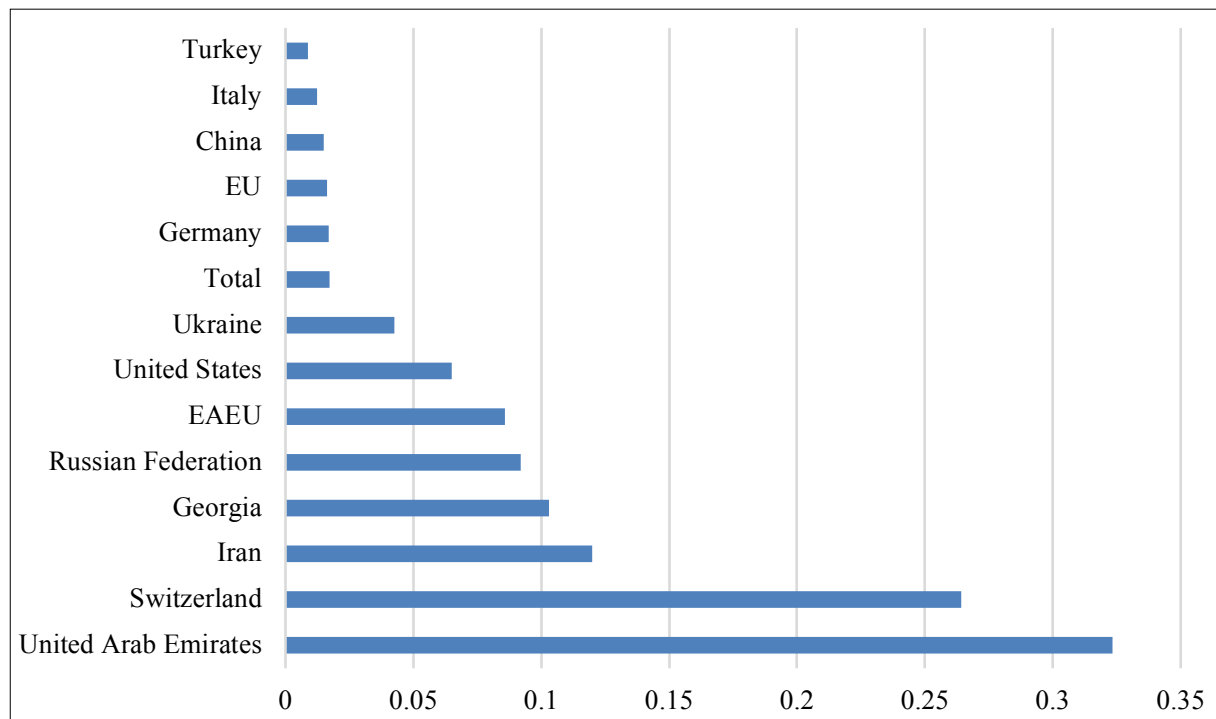
⁸⁹ This index measures the extent to which a high proportion of exports are delivered by a small number of economies. It ranges from zero (perfect diversification) to 1 (export concentration in a single product).

Figure 5.1 Armenia's export concentration index by main trade partner (2017)



Source: Calculations based on UN Comtrade data

Figure 5.2 Armenia's export concentration index by main trade partner (2017)



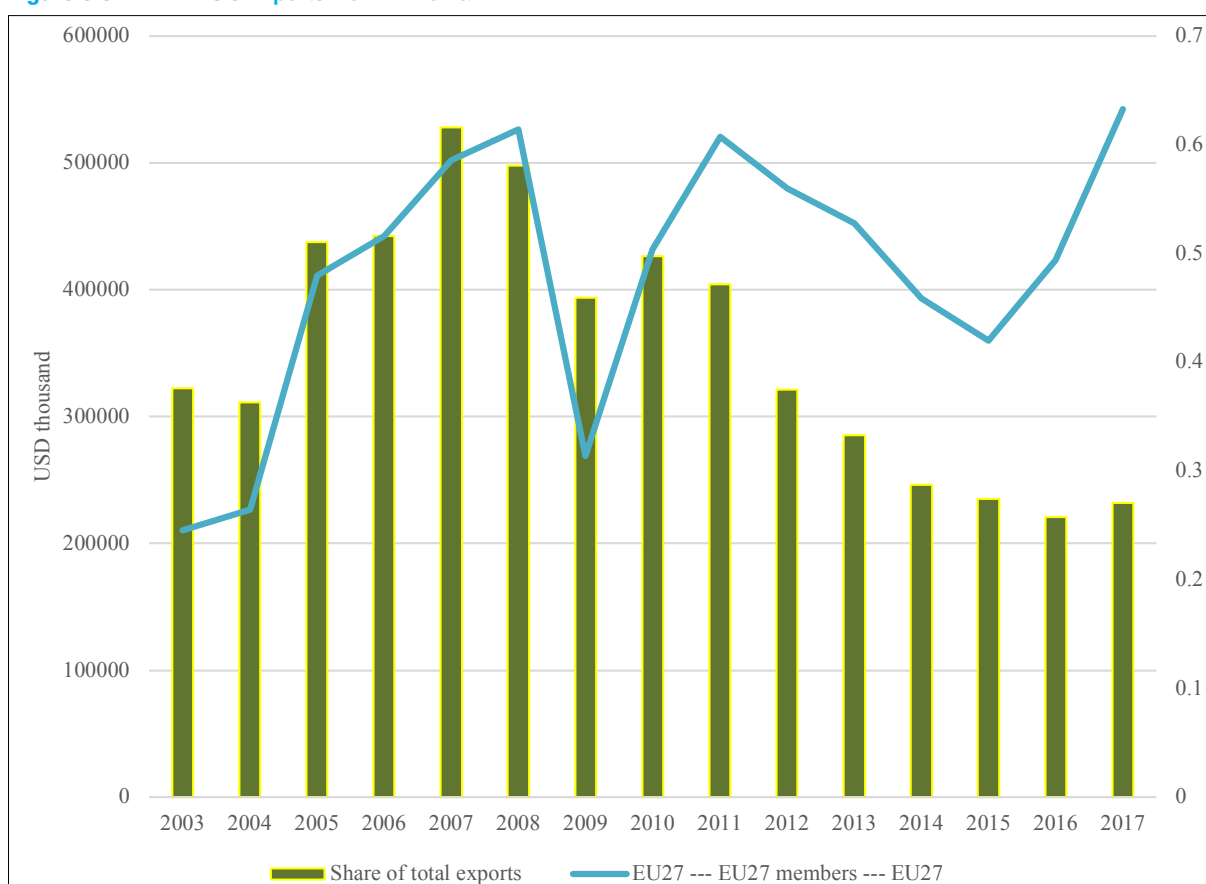
Source: Calculations based on UN Comtrade data

5.3 Welfare effects of regional cooperation arrangements with the EU

A more detailed examination of Armenia's exports to the EU shows metals as consistently occupying the EU's top 20 imports from Armenia, along with beverages, vehicles and machinery (Annex 1, Table A1.5). However, as shown in figure 5.3, Armenia's share in the EU's total imports is small, and exports to the region have been declining steadily since 2012.

Yet, as shown in table 5.1, the bulk of Armenia's top 20 exports to the region enjoy a strong comparative advantage, with the value of the revealed comparative advantage (RCA) index⁹⁰ exceeding 1. This is particularly the case of ferro-molybdenum and spirits obtained by distilling grape, which carry values above 200. The table also shows that these products have registered a consistent improvement in their overall competitiveness, with the value of RCA rising steadily. This means that these exports are unlikely to be substituted by alternative sources if the EU decides to lower its MFN rate or extend GSP treatment to countries exporting similar products.

Figure 5.3 EU's imports from Armenia



Source: Calculations based on UN Comtrade data

90 This index measures the extent to which exports enjoy a comparative advantage. It ranges from zero (no comparative advantage) to infinity. A country is considered as enjoying a comparative export advantage in products with RCA exceeding 1 (1 represents the break-even point). $RCA > 1$ signifies that the country's share is above the world's total exports of the product in question. RCA carrying a value between 0 and 1 denotes that the country does not enjoy a comparative in the product in question.

Table 5.1 Armenia's top 20 exports RCA

Products	2003	2013	2017
260300 Copper ores and concentrates.	33.9	70.2	81.0
720270 Ferro-molybdenum	323.2	776.2	595.3
740200 Unrefined copper; copper anodes for	89.9	190.8	59.4
760711 Aluminium (foil); Not backed	78.9	201.8	138.9
260800 Zinc ores and concentrates.	5.0	29.3	11.8
710231 Diamonds; Non-industrial	31.1	0.0	3.2
261390 Molybdenum ores and concentrates; other than roasted	363.0	56.4	51.4
220820 Spirits obtained by distilling grape	289.4	363.6	233.6
847420 Crushing or grinding machines	0.0	0.1	4.1
240220 Cigarettes containing tobacco	2.0	40.3	89.3
870323 Vehicles, with spark-ignition	0.0	0.0	0.0
903210 Thermostats	1.5	3.5	3.1
220600 Beverages fermented; Other fermented beverages	2.6	32.6	40.5
220421 Other wine; grape must with ferment	0.2	2.1	2.9
852520 Transmission apparatus	0.0	0.0	0.0
900190 Optical elements; lenses; Other	0.5	1.2	1.0
740400 Copper waste and scrap	8.5	2.7	2.9
710812 Gold, Non-monetary	0.0	0.0	0.0
251200 Siliceous fossil meals (for example	0.0	155.1	84.4
843041 Other boring or sinking machinery	0.1	0.0	1.6

Source: Calculations based on UN Comtrade data

Moreover, as shown in Annex 1 (Table A1.6), Armenian enterprises have registered a steady uptake of the EU GSP preferences. Exports under this scheme increased from EUR 13 million to EUR 130 million over the period 2003-2017 (column 1), bringing their share in total exports to the region to 37 percent in 2017 up from 16 percent in 2013 (column 12).

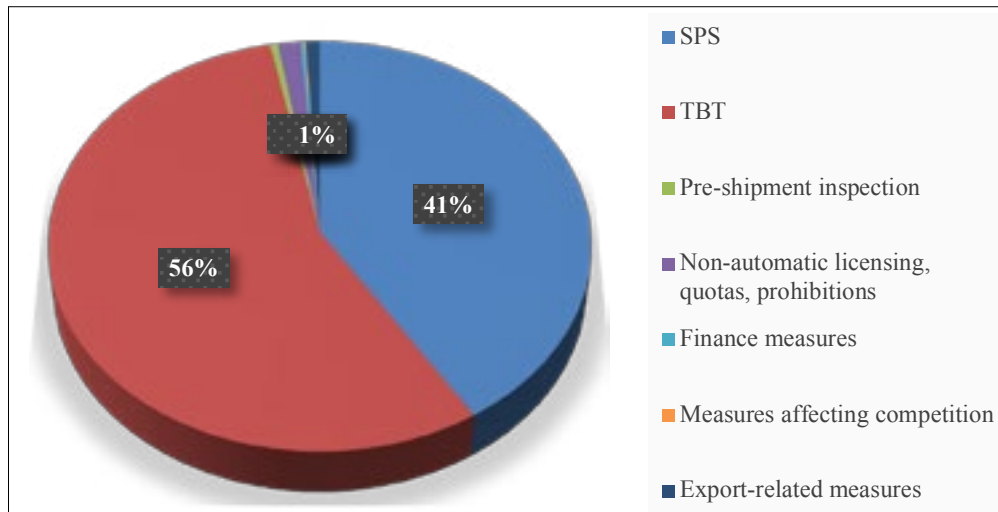
Annex 1 (Table A1.6) also shows that enterprises, particularly those driving exports to the region, have capitalized on the favourable market access conditions accorded to them under the GSP scheme. In 2003, an estimated EUR 30 million worth of exports (columns 1-5) were eligible for zero or reduced GSP rates, but actual exports were EUR 23 million only (column 6). The ability of the enterprises to utilise GSP preferential treatment increased considerable over time, from 77 percent in 2003 to 96 percent in 2017.

This almost full and complete utilisation of GSP preferences is further demonstrated in annex 1, table A1.7. The table shows that out of the EUR 122 million worth of products eligible for preferential GSP treatment in 2015-2017, around EUR 114 million benefited from zero or reduced rates. Metals accounted for the largest share of these exports, with ferro-molybdenum and aluminium foil registering a combined value of EUR 108 million. The two products also accounted for around 50 percent of the EU's imports from Armenia under the most-favoured nations (MFN) regime, with an average value of EUR 4.5 million over the same period (out of the EUR 8.5 million worth of products eligible for GSP treatment but imported under MFN rates).

This means that reversing the stagnation in Armenia's exports to the EU requires expanding the pool of enterprises that can achieve compliance with the region's non-tariff measures (NTMs). These measures mainly involve regulating technical barriers to trade (TBT) and addressing sanitary and phytosanitary (SPS) concerns, which together make up over 90 percent of applied NTMs in 2016 (Figure 5.4).

As shown in table 5.2, out of the thirty heavily affected products, thirteen figure on Armenia's top 20 exports and belong to food, beverages, clothing, iron and steel and plastics manufacturing. These industries should, therefore, form the focus of industrial development efforts, especially since they stand to offer significant contribution to job creation.

Figure 5.4 Breakdown of NTMs applied by the EU (2016)



Source: UN Trade Analysis Information System (TRAINS)

Table 5.2 NTMs reported by EU: top 30 affected products (2016)

HS code	Product	Number of NTMs
84	Nuclear reactors, boilers, machinery and mechanical appliances; parts thereof	12,236
3	Fish and crustaceans, molluscs and other aquatic invertebrates	11,288
85	Electrical machinery and equipment and parts thereof; sound recorders and	7,453
2	Meat and edible meat offal	6,004
20	Preparations of vegetables, fruit, nuts or other parts of plants	5,916
4	Dairy produce; birds' eggs; natural honey; edible products of animal origin, not	5,137
29	Organic chemicals	4,329
22	Beverages, spirits and vinegar	3,808
15	Animal or vegetable fats and oils and their cleavage products; prepared animal fats;	3,489
8	Fruit and nuts, edible; peel of citrus fruit or melons	3,192
90	Optical, photographic, cinematographic, measuring, checking, medical or	3,064
7	Vegetables and certain roots and tubers; edible	2,606
16	Meat, fish or crustaceans, molluscs or other aquatic invertebrates; preparations thereof	2,528
11	Products of the milling industry; malt, starches, inulin, wheat gluten	2,416
28	Inorganic chemicals; organic and inorganic compounds of precious metals; of rare earth	1,892
62	Apparel and clothing accessories; not knitted or crocheted	1,846
73	Iron or steel articles	1,751
10	Cereals	1,696
12	Oil seeds and oleaginous fruits; miscellaneous grains, seeds and fruit, industrial or	1,684
39	Plastics and articles thereof	1,510
72	Iron and steel	1,452
61	Apparel and clothing accessories; knitted or crocheted	1,347
52	Cotton	1,308
17	Sugars and sugar confectionery	1,288
38	Chemical products n.e.c.	1,229
9	Coffee, tea, mate and spices	1,162
19	Preparations of cereals, flour, starch or milk; pastrycooks' products	1,098
35	Albuminoidal substances; modified starches; glues; enzymes	1,053
44	Wood and articles of wood; wood charcoal	1,047
21	Miscellaneous edible preparations	1,015

Source: TRAINS

While Armenia's exports to the EU have stagnated, its imports from the region have been assuming an increasing trend to reach USD 780 million in 2017 up from USD 365 million in 2003. As shown in annex 1 (Table 1.8), Armenia's imports from the EU are quite diversified. The region stands as the main supplier to Armenia and, in some cases (machinery and vegetable extracts), constitutes the sole supplier.

5.4 Welfare effects of regional cooperation arrangements with the EAEU

As previously mentioned, Armenia's exports to the EAEU are more diversified than those destined to the EU. This is further highlighted in annex 1 (Table A1.9), which shows that the bulk of the products figuring on Armenia's top 20 exports to the world are sold in the EAEU markets. These exports are not similar to those sold in the EU markets, with the Finger-Kreinin product similarity index⁹¹ carrying a ratio of 4 percent (Table 5.3).

The table also reveals that Armenia's exports to the People's Republic of China and the EU have a higher degree of similarity, with the Finger-Kreinin index taking the ratio of 53 percent. This suggests that exports to these markets tend to be more based on comparative advantage despite the high transaction costs accrued by traders.

Table 5.3 Finger-Kreinin index export similarity index (2017)

	<i>China</i>	<i>EU</i>	<i>EAEU</i>	<i>Iran</i>	<i>Iraq</i>	<i>Switzerland</i>	<i>UAE</i>
<i>EU</i>	0.53						
<i>EAEU</i>	0.01	0.04					
<i>Iran</i>	0.00	0.00	0.02				
<i>Iraq</i>	0.00	0.00	0.02	0.00			
<i>Switzerland</i>	0.36	0.36	0.00	0.00	0.00		
<i>UAE</i>	0.00	0.03	0.03	0.00	0.85	0.00	
<i>USA</i>	0.01	0.11	0.11	0.01	0.00	0.00	0.04

Source: Calculations based on UN Comtrade data

As shown in annex 1 (Table A1.10), even though Armenia has consistently sold most of its top 20 exports to the EAEU, at 0.2 percent, its share in the region's total imports is negligible. This is despite the fact that Armenia has historically enjoyed tariff free access to the EAEU markets (by virtue of the free trade agreements established with CIS countries). This also comes despite the consistent improvement in Armenia's comparative advantage in the EAEU markets, except for diamond that has seen its RCA decline over the past years (Table 5.4).

The decline in exports over the past few years cannot be understood in isolation of the economic recession that has beset the Russian Federation. The country's improved economic performance coupled with the simplification in export procedures will certainly boost Armenia's exports to the EAEU.

On the import side, a cursory examination of Armenia's imports from the EAEU shows a declining trend over the years, with oil and natural gas dominated the country's top 20 imports from the region (Annex 1, table A.11). Armenia's accession to the EAEU brought about a rise in the country's tariff structure. As shown in annex A1.10, the difference between Armenia and the Russian Federation MFN tariffs stood at around 5 percentage points in 2014, measured in simple average MFN rates at the Harmonized System (HS) code two-digit level. Meat and edible offal (HS code 02) along with fertilizers (HS code 31) exhibited the highest difference points (5 percentage and 4 percentage points, respectively). While the differences are more pronounced when measured at HS six-digit, they remain limited to a handful of products.⁹²

91 The Finger-Kreinin product similarity index was calculated based on UN Comtrade statistics. The index takes a value between 0 and 100 percent, with 0 indicating no overlap in export profiles and 100 indicating absolute overlap. The more similar the export profiles are, the more likely that the products have comparative advantage.

92 For example, the difference between the Russian Federation and Armenia's simple average MFN rates is 48 percentage points on frozen chicken (HS code 020714). Incidents where the Russian Federation applies higher MFN rates are mainly related to meat (HS chapter 02) and on minerals (HS chapter 71).

Table 5.4 Armenia's top 20 exports to the EAEU: RCA

HS code and Product	1997	2003	2013	2017
220820 Spirits obtained by distilling grapes	178.0	316.5	375.8	240.2
940540 Other electric lamps and lighting	1.3	0.0	0.2	12.2
710239 Diamonds, Non-industrial	58.2	107.4	9.0	3.4
70200 Tomatoes, fresh or chilled.	0.0	0.0	0.9	13.1
030211 Salmonidae	0.0	4.3	152.6	176.2
040690 Cheese; Other cheese	0.0	1.4	2.3	4.1
060310 Flowers, cut; Fresh	0.0	0.0	3.0	8.8
220421 Other wine; grape must with ferment	0.7	0.3	2.2	3.0
711290 Metals, waste and scrap of precious metals;	12.1	0.0	0.4	9.1
180690 Chocolate and other food preparations	0.0	0.3	1.5	5.7
300230 Vaccines for veterinary medicine	6.3	0.5	0.0	23.5
220600 Other fermented beverages (for exam	0.0	2.8	33.7	41.6
620193 Anoraks, men's or boys'	8.2	0.6	2.8	6.4
200590 Other vegetables and mixtures	0.0	4.2	9.7	13.5
30269 Other fish, excluding livers	0.0	0.0	46.1	12.6
720270 Ferro-molybdenum	164.1	359.3	802.2	612.0
220110 Mineral waters and aerated waters	4.4	7.2	33.0	19.3
240220 Cigarettes containing tobacco	0.0	2.2	41.6	91.8
300490 Medicaments	0.5	0.1	0.2	0.3
620342 Trousers, bib and brace overalls	0.1	0.0	2.5	1.8

Source: Calculations based on UN Comtrade data

The situation changed upon Armenia's accession to the EAEU in 2015. The country registered an increase in its simple average MFN rates from 3.5 percentage points in 2012 to 6 percentage point in 2017, bringing the difference between the two countries' simple average MFN rates to 0.7 percentage points.⁹³ The increase affected 80 percent of products (77 out of the 96 product groups listed in annex 1, table A1.1) sourced from third-party countries, with peaks of 18 percentage points (simple average MFN rates increase) for arms and ammunitions and 15 percentage points for explosives.

Thus, even as joining the EAEU allows Armenia to further integrate itself with the region on the export side, the additional increase in Armenia's simple average MFN rates is likely to set in motion trade diversion effects; in that Armenian enterprises might choose to source products from less efficient suppliers. Evidence emerging from the traders' survey point to both trade creation and trade diversion effects, caused by not only changes in the county's tariff structure but also by trade facilitation measures, EAEU conformity assessment procedures, increased competition pressures, logistical considerations and the traders' preferences.

On the export side, several enterprises lamented losing partners from Belarus and the USA under the weight of increased competition from other suppliers (Annex 4, table A4.1). Others reported establishing relations with new buyers in Georgia and the Russian Federation. Geographic proximity was cited as the main reason for seeking new trade partners in Georgia. In the case of the Russian Federation, traders explained that their decisions were stimulated by the simplified export procedures, which allowed for capitalizing on the country's positive GDP growth rates⁹⁴ and other conducive factors. Most notable are: the geographic proximity, in terms

93 See World Tariff Profiles for 2013 (https://www.wto.org/english/res_e/booksp_e/tariff_profiles13_e.pdf) and 2018 (https://unctad.org/en/PublicationsLibrary/wto2018_en.pdf).

94 The Russian economy was able to overcome recession and has been registering positive GDP growth since 2016. Comprehensive information on the Russian economy's performance indicators are available at: <https://data.worldbank.org/indicator/ny.gdp.mktp.kd.zg?locations=ru>. It is worth noting that several traders reported losing their trading partners in the Russian Federation during the economic crisis, due to low demand and the devaluation of the Russian ruble.

of distance to markets; the ease of physical access via Georgia; the common language (Russian language widely spoken in Armenia); the similarity in consumer tastes and preferences; and, the large Armenian community and Diaspora institutions in the Russian Federation.

Yet others reported gaining markets in the Middle East and the EU. An illustrative case of the difficulties associated with exporting to the EU is the experience of manufacturer of cosmetics products. The manufacturer, which started exporting to the United Kingdom of Great Britain and Northern Ireland (UK) in 2018, explained that at issue were not only the challenge of meeting these requirements, but also of demonstrating compliance. The enterprise had to send samples for testing in the UK at a significant cost and spent 6 months learning about the rules of origin, which required presenting a certificate of origin for each raw material used. The choice of the UK did not follow a rigorous market analysis. Rather, it came on the heels of a trade fair, during which the manufacturer was approached by the buyer.

On the import side, enterprises reported sourcing from new suppliers in the EAEU, the EU and beyond. As shown in annex 4 (Table A4.2), instances of trade diversion were limited to a few cases, with traders reporting switching from non-EAEU to EAEU suppliers to avoid the higher EAEU CET. Compliance with the EAEU regulatory requirements was another reason. This was the case of a meat importer, who had to seek new suppliers capable of meeting the EAEU strict sanitary and phytosanitary requirements.

The implication for policy makers is to boost positive welfare gains through scaling up exports. This is all the more so since trade diversion dynamics may gain further impetus in 2022, which marks the expiry of the temporary exemptions for 966 tariff lines.⁹⁵ The exempted lines, which account for around 40 percent of products sourced from the EAEU, cover: agricultural goods, chemicals, plastic and rubber, textiles, base metals, machinery, vehicles and precision instruments.

Armenia's exports to the two regions enjoy significant RCA and carry limited degree of similarity. Evidence also shows that more could be done to boost food exports to the EU under the GSP+ scheme, which remain limited to non-framed crayfish.⁹⁶ This means that boosting exports is a question of leveraging the enterprises' growth dynamics, including those identified in chapters 6 and 7.

95 See EEC Council Decision No. 1138 of 10 December 2014.

96 See European Commission "Third Country Establishments List – Armenia", available at: https://webgate.ec.europa.eu/sanco/traces/output/AM/FFP_AM_en.pdf

Chapter Six

Implications for Export Diversification: The Case of Male-Owned Enterprises

6.1 Introduction

The previous chapters show that despite significant improvements in removing regulatory and procedural trade barriers, the road ahead remains challenging. Traders are still faced with red tape, especially since the Government is yet to complete migration towards paperless trade. Once achieved, this move is unlikely to translate into a significant rise in exports and job creation, owing to the weaknesses in the SQAM system. Most notable is the lack of internationally recognized CABs, which burdens exporters with additional costs in the form of product testing abroad and retesting fees in destination markets.

Armenia's disadvantaged conditions of landlockedness is another complicating factor. In 2019, Georgia stood as Armenia's main gateway to the world, owing to the impeded access to neighbouring transport facilities in Azerbaijan and Turkey. This limited access has left enterprises with no choice but to use longer routes, which inflate financial costs and generate unnecessary delays.

In addressing the above-mentioned challenges, the government is proceeding from the perspective that efforts should be complemented with targeted initiatives to achieve economic diversification through a transformation towards knowledge-based growth. This comprehensive approach is at the centre of its 5-year development strategy, drawing on past reform achievements and development experiences elsewhere.

While these efforts have created new export opportunities, the changes introduced to the country's tariff structure under the agreement with the EAEU have set in motion trade diversion effects. The overall effect on welfare may be negative unless there is a surge in trade creation. The trade indices reveal that most of Armenia's exports enjoy favourable RCA in destination countries, including the EAEU and the EU. The challenge is, therefore, how best to leverage existing growth dynamics for export expansion.

The remainder of this study ascertains these growth dynamics. In so doing, the emphasis will be on discerning those influencing the enterprises' technological capability, understood as the accumulated knowledge and skills to identify, appraise, utilise and improve on existing technologies and production techniques or develop new ones to modernize production processes and venture into new innovative production activities.⁹⁷

This approach is consistent with the task at hand, which seeks to enable a better understanding of how best to leverage trade for structural transformation (SDG8) and job creation (SDG9). To allow for a better understating of trade's contribution to gender equality (SDG5), the analysis will distinguish between male and female owned enterprises, with this chapter focusing on the former and the next on the latter.

97 This concept was advanced by Sanjaya Lall in Lall, S. (1992) Technological Capabilities and Industrialization, World Development, Vol. 20, no. 2: 165-186

6.2 The interplay between regulatory and procedural barriers and export diversification

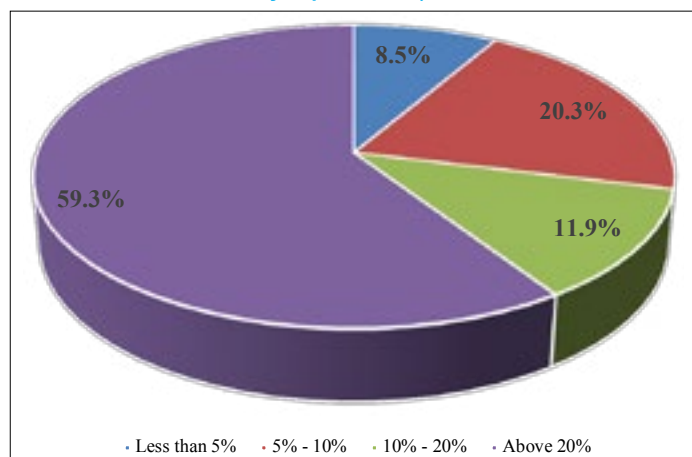
A starting point for a better understanding of the enterprises' growth dynamics would be to capture the interplay between the identified regulatory and procedural trade barriers and investment activities. The emphasis will be on ascertaining the extent to which business processes associated with achieving compliance with documentary requirements, passing customs and organizing transport inflate transaction costs and, thereof, act as an investment disincentive.

As shown in figure 6.1, around 59 percent of the surveyed male-owned enterprises reported that the fees associated with the above processes account for over 20 percent of their monthly expenditures, with transport accounting for the lion's share. Most of the exporters assume the bulk of transport costs, with less than a handful reporting delivery under favourable incoterms. The situation is different for importers. The majority included freight costs in the payable price, but reported assuming additional costs in the form of hiked up customs valuation.⁹⁸

For traders using the services of freight forwarders, and this is the case of most of the surveyed enterprises, transport costs are mainly driven by the prohibitive fees charged by these service providers. These fees reflect the longer routes available to traders. As previously shown, these often requires using the port of Poti, which traders described as expensive. The routes also involve difficult truck journeys, often fraught with risks and delays, particularly in winter, given the underdeveloped road networks.

Only 41 percent of the enterprises rely on company staff for organizing transport. However, the majority use rented⁹⁹ trucks and only for a limited leg of the journey; namely for transporting goods from warehouses to BCPs or vice versa. Traders using rented trucks for the entire journey reported paying high fees, even if the goods are shipped to/from nearby countries (i.e., Georgia and the Russian Federation) given the underdeveloped road networks.

Figure 6.1 Trade costs (% share in male-owned enterprises' monthly expenditures)



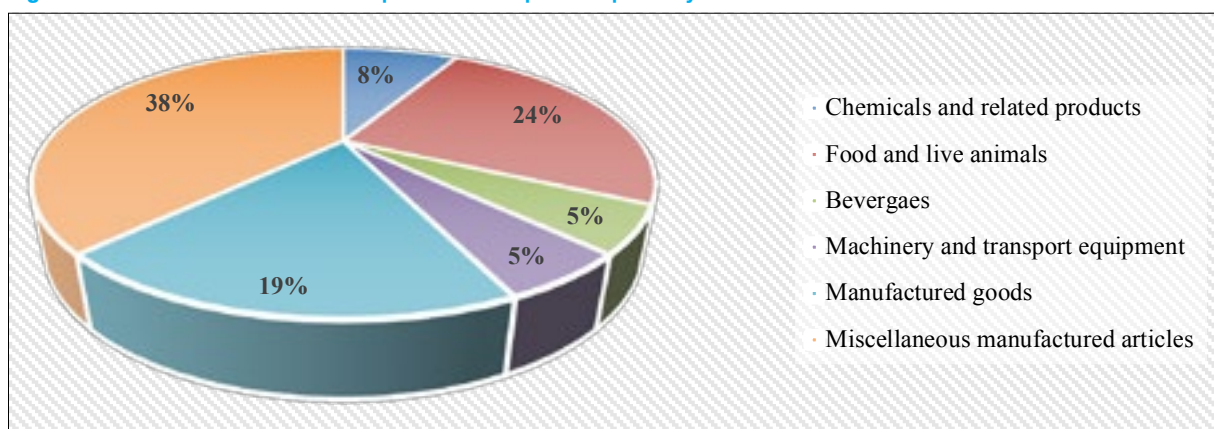
98 The Agreement stipulates that customs valuation shall, except in specified circumstances, be based on the actual price of the goods to be valued, which is generally shown on the invoice. This price, plus adjustments for certain elements listed in Article 8, equals the transaction value, which constitutes the first and most important method of valuation referred to in the Agreement. Sufficient information should be available to enable the specific adjustments such as: commissions and brokerage, except buying commission; packing and container costs and charges; the cost of transport, insurance and related charges up to the place of importation if the Member bases evaluation on a C.I.F. basis. As far as the interpretation of Article 8 is concerned, the freight bill and not the invoice provides objective and qualifiable data, since it represents a contract established between a trader and a carrier, containing the payable value for transportation.

99 Only 6 traders reported using own truck fleets.

Transport by air is even more expensive. This is particularly the case of luxury items (e.g., jewelry), which traders ship using international express services to ensure safe delivery. Traders shipping by normal post, noted that while less expensive, this transport mode results in delays, even if the goods are destined to nearby countries. For example, shipping to EU countries involves a delivery time of 15 days.

Yet, trade costs acted as an investment disincentive for only 16 percent of the surveyed traders. The remaining 84 percent were planning to expand their production and/or trade activities over the period 2019-2020, encouraged by the new opportunities generated by the regional integration agreements with the EAEU and the EU. As shown in figure 6.2, those belonging to the manufacturing sector represented the largest segment, followed by food producers.

Figure 6.2 Male owned enterprises with expansion plans by sector



The enterprises' plans featured a special emphasis on expanding production activities, signifying the enterprises' awareness of their limitations. The enterprises lamented the limited demand, owing to the low level of trust in Armenian products. Enterprises engaged in exports had to literally create such demand through relying on their network of friends (see below), and the majority are yet to achieve economies of scale (i.e., they export small volumes). Thus, to enterprises improving their production capacities is a natural path to follow and focusing on the internal market seems a reasonable starting point for launching and testing their new products. Indeed, around 65 percent of enterprises with expansion plans said that they are preparing to launch new products in the coming two years. Another 59 percent were planning to hire additional staff. Still another 49 percent were looking into purchasing new machinery and equipment. Moreover, around 27 percent were planning to establish additional branches in Armenia, and another 33 percent reported plans to source from new suppliers, particularly from the EAEU, to develop and diversify their production activities.

Export expansion was reported by only 27 percent of enterprises; of which 10 percent noted their intention to establish branches abroad. These enterprises have already achieved economies of scale and were looking for expanding their outreach and launching new production lines. The EAEU, particularly the Russian Federation, was cited as the main export destination by most of the traders, encouraged by the streamlined export procedures. The EU was also cited as a main export destination along with Australia, Canada, Georgia, Lebanon, New Zealand, USA, the United Arab Emirates and, to a limited extent, Brazil and Iran.

6.3 Enterprises' growth dynamics

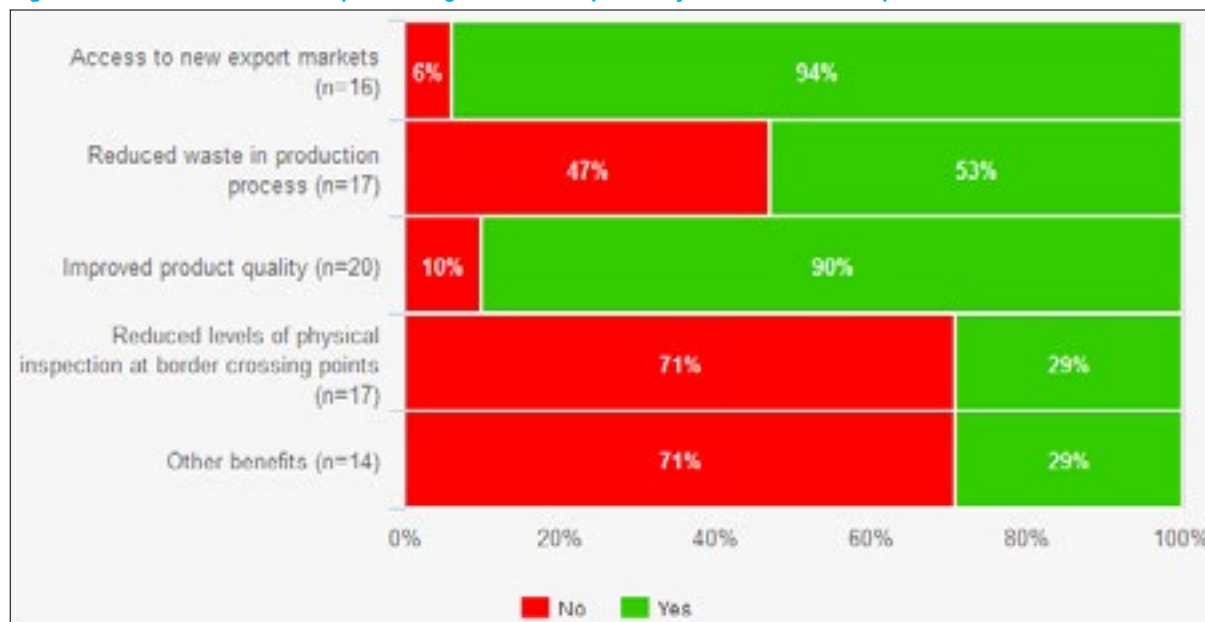
The results of the traders' survey show that enterprises operate in the absence of adequate support services. They rely on own initiative, driven by an entrepreneurial spirit and a strong sense of social responsibility. These factors are at the centre of the enterprises' success and could be further leveraged by nurturing the below growth dynamics.

Standards

As previously mentioned, compliance with the regulatory requirements in destination countries stands as a main challenge to achieving access to new markets. This challenge can be addressed by implementing international standards, particularly those referenced in technical regulations applied in destination countries. This is a rather complicated task, which requires significant investments and a steep learning curve. It involves, among others, re-organizing production processes, investments in new equipment and ICT systems and strengthening human resources with expertise skills. The benefits of these processes cannot be over-emphasized as they go beyond facilitating market access to providing the foundation for innovation, the pre-requisite for structural transformation.

The results of the interviews lends further evidence to the importance of standards, showing that nearly all of the male-owned export-oriented enterprises (25 percent of the surveyed enterprises) implement international standards, with 21 percent reporting the implementation of international and industry standards.¹⁰⁰ The majority of these belonged to the food industry (Table A2.7). For these enterprises, implementation of standards brought about improved market access conditions and overall product quality (Figure 6.3).

Figure 6.3 Benefits of implementing standards reported by male-owned enterprises



¹⁰⁰ While around 50 percent of the surveyed enterprises reported implementing quality standards, only 21 percent cited the standards applied. The remainder cited quality certificates as a proof of implementing standards, making it difficult to conclude as to the type of standards they apply and whether these also include international standards.

The need to ensure across the board implementation of quality standards among enterprises cannot be over-emphasized. An immediate step in this direction would be to facilitate access to external sources of funds. All the enterprises noted using retained earnings for financing the implementation of standards. The remainder noted that adopting additional standards, particularly the Hazard Analysis and Critical Control Points (HACCP) management system,¹⁰¹ is proceeding with much difficulty due to the lack of funds.

There is also a need to furnish enterprises with the required skills to determine the appropriate standards for improving their productive capacity. Enterprises do not have inhouse research function to explore such issues, with only 33 percent reporting systemic allocation of resources for research. The research is sometimes done inhouse or outsourced and is not necessarily focused on product development, with the majority using the funds for marketing research. The necessity of raising the enterprises' awareness and knowledge of standards is further evidenced from their limited use of environmental standards; a major requisite for moving to circular production processes. As shown in figure 6.3, only 53 percent of the enterprises cited reducing waste implementing standards.

In addition, figure 5.3 lends further evidence to the necessity of improving at the border risk management systems and techniques. Only 29 percent reported experiencing reduced levels of physical inspection at border crossing points as a result of implementing standards, suggesting a limited appreciation of the principle of presumption of conformity associated with the implementation of international standards.

Technological change

For ICT intensive industries, technological change seems to be seen as a threat and not an growth opportunity. The concerns raised by enterprises involved in manufacturing taximeters and electronic tracking devices for vehicles, such as GPRS (General Packet Radio Services) and GPS (Global Positioning System) illustrate this perception. The owners were preoccupied with their prospects in the face of the continuous advances in technologies, which will effectively render their products obsolete. They appeared to be at loss when it comes to addressing this challenge and seemed to be unaware of possible options to upgrade their products, including if the new technology is available locally. These concerns are further aggravated by the ongoing legislative reforms. The enterprises noted that the Government was considering a new legislative package, which, to their understanding, will involve changes in the licensing requirements and taxation.

E-commerce

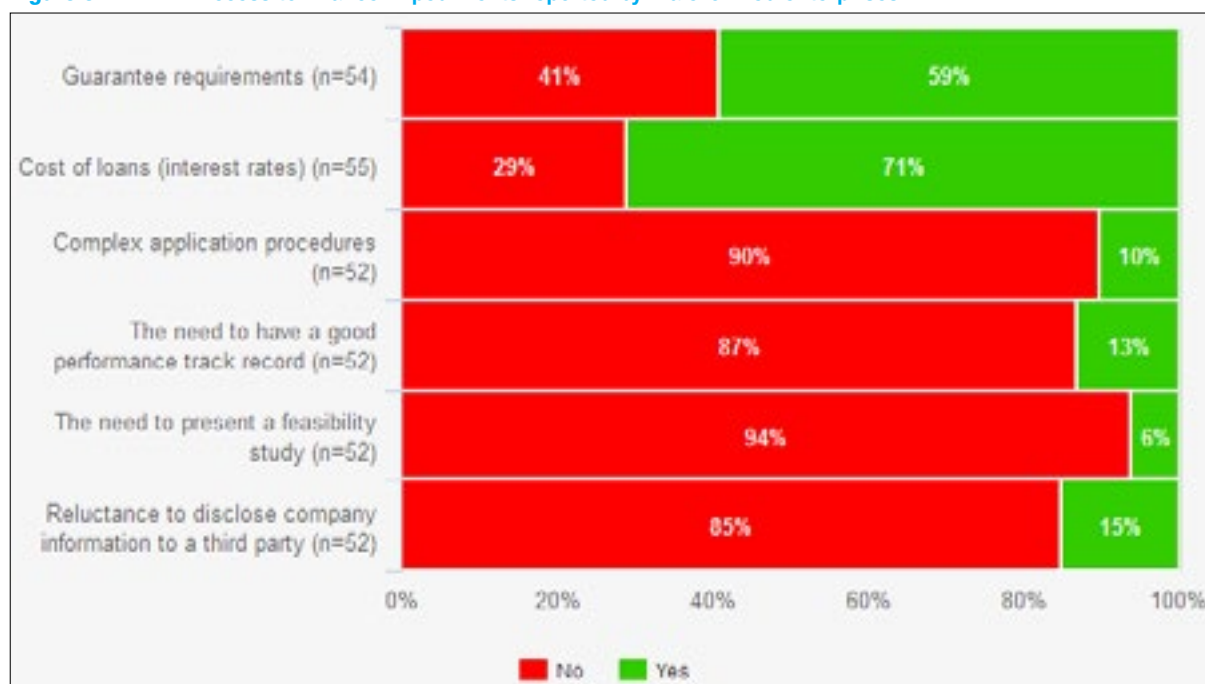
E-commerce does not figure as an important growth enabler for the surveyed enterprises. Around 67 percent reported having own institutional website, with the remainder citing the lack of funds and skilled staff as a major impediment to launching own website. Some questioned the value of investing in the virtual market place, noting that they are not confident that their products would attract buyers. This scepticism is further evidenced by the limited number of enterprises engaged in e-commerce. Only 22 percent of enterprises are engaged in online trade, with the remaining 78 percent using online presence for promotional purposes only.

101 The HACCP system addresses food safety through the analysis and control of biological, chemical, and physical hazards from raw material production, procurement and handling, to manufacturing, distribution and consumption of the finished product.

Access to finance

Around 60 percent of the surveyed enterprises reported experiencing difficulties in accessing external sources of funds. Commercial banks seem to be the only source. Just like commercial banks elsewhere, Armenian banks are risk averse, rendering strict loan guarantee requirements and high interest rates (Figure 6.4)

Figure 6.4 Access to finance impediments reported by male-owned enterprises



The interviewed traders explained that banks only accept movable assets as collateral against loans, and these are often priced downwards.¹⁰² The enterprises' efforts to address this constraint were met with failure. A case in point is a producer of wine and brandy, who managed to obtain the bank's approval to take immovable assets (namely, raw materials) as collateral. The bank's approval was conditional to insuring the said asset; a condition that was impossible to meet with insurance companies refusing to cover raw material.

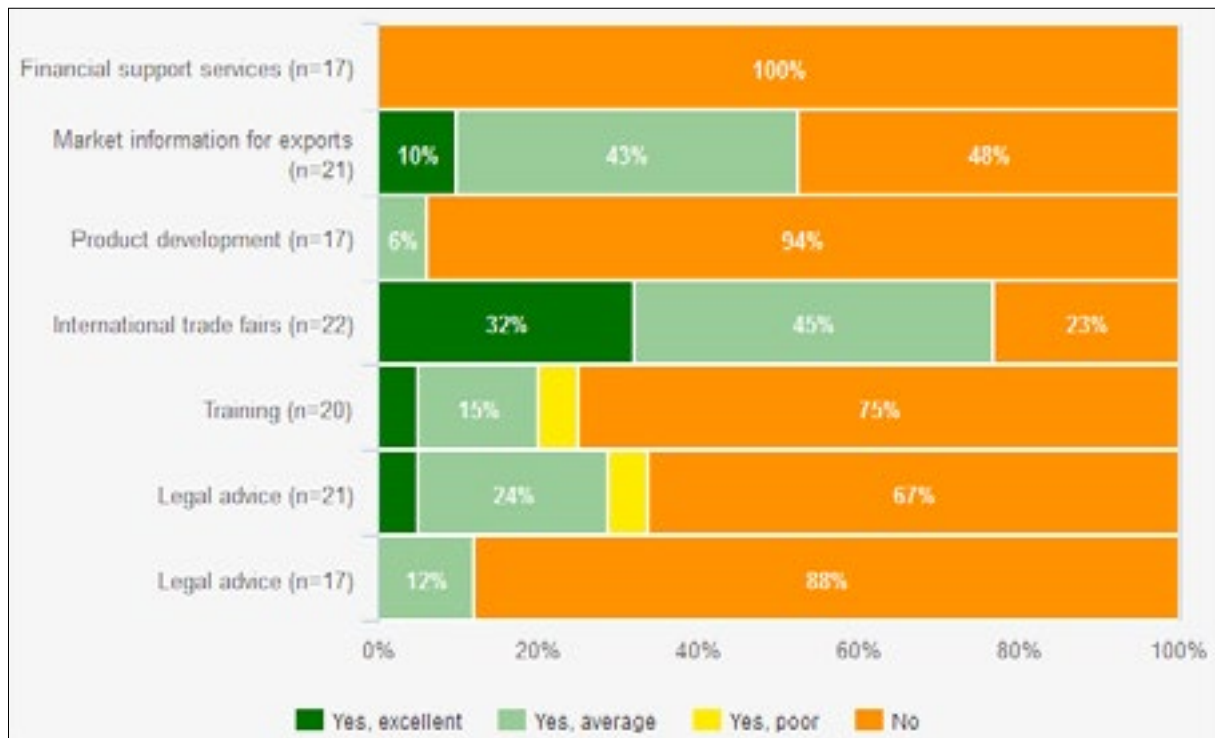
Enterprise support services

The surveyed enterprises appear to operate in the absence of adequate support services. As shown in figure 6.5, support services received over the past two years tended to be concentrated in marketing information (particularly on export opportunities and international trade fairs) and legal advice. Other services received include training and product development, reported by a limited number of enterprises, and rated by several as poor.

This limited range of support services comes in contrast with the broader list reported by female-owned enterprises (Chapter 7). Evidence collected throughout this assessment does not allow for concluding if this discrepancy is due to lower demand on the part of male-owned enterprises or is the result of supply side limitations.

¹⁰² This undermines the enterprises' ability to access to bank loans, since the value of the asset pledged as collateral is usually greater than the amount of requested loan.

Figure 6.5 Male-owned enterprises' evaluation of support services received



Cooperation and networking

Around 97 percent of the surveyed enterprises singled out cooperation and networking with national and international counterparts as an important element for product development and outreach into regional and international markets. However, only 11 percent had partnerships with regional and international companies, pointing to the enterprises' limited success in attracting partners.

The owners highlighted the lack of adequate support services and reported relying on the Armenian communities in the diaspora for networking. These communities constitute a source of information on export opportunities and often act as the facilitator, enabling Armenian enterprises to establish relations of trust with transnational corporations.

Manufacturers of plastic, food and leather products stand out as the most successful in partnering with regional and international companies. The partnerships were established within the context of sub-contracting arrangements, which assigned the Armenian enterprises part of, or the entire, production processes and furnished them with new machinery and equipment, credit facilities and timely supply of raw material. The arrangements also generated networking and cooperation between the surveyed enterprises and national MSMEs, which were assigned (through sub-contracting arrangements) product assembly processes.

For these enterprises networking is a means for helping their communities. A case in point is a manufacturer of toys, who marshalled his network of partners abroad to help the artisanal craft industries in his Gyumri community. His efforts attracted interest in the wooden humming spinning top, which the owner was quick to capitalise on. The owner invested in marketing the toy under a local brand name and proceeded to contract the micro and small craft industries to produce the toys and arranged for their sale in international markets.

Customs brokers and freight forwarders

Customs brokers and freight forwarders play an important role in facilitating export and import activities. They are considered as authoritative information sources on applied trade rules and procedures; are called upon to handle documentary requirements and customs clearance; and, in the case of forwarders, are given the additional task of arranging transport. This role reflects at once the traders' limited capacity and, for many, modest experience in international trade. It is becoming all the more vital in light of the ongoing reforms, the regulatory and administrative consequences of which remain unclear for exporters and importers.

However, freight forwarders charge what traders described as prohibitive fees, while the brokerage industry has been weakened by the dissolution of the Customs Association in 2016. While a new body was created, it remains understaffed, handled by one customs broker who volunteered his time to liaise with the State agencies and keep the brokerage community abreast of new/revised regulations and procedures. Customs brokers noted that it would be difficult to sustain these arrangements.

There are also concerns over the role of customs brokers under the EAEU Union Customs Code. The code has introduced important changes. Brokerage activities are now restricted to companies, and not individuals as was the case prior to Armenia's accession to the EAEU. The companies, referred to the Union Customs Code as customs representatives, should have at least two certified employees. These are granted brokerage licenses for an indefinite period, after the successful completion of the training course, and should adhere to the obligatory training every three years. Thus, the entire industry must be recreated. Moreover, the line is blurred when it comes to the responsibilities of the brokers. The interviewed brokers were not clear if they share alongside the traders the responsibility of settling customs duties, taxes and import charges. These issues are generating unnecessary conditions of uncertainty among traders and brokerage companies, with adverse consequences for the industry's ability to maintain its important role.

Other factors

All the interviewed traders complained that at 20 percent, the value added tax (VAT) is too high. Some suggested reducing VAT levels to 15 percent, while others proposed granting traders longer payment period. This would go a long way towards relieving the enterprises' financial crunch, in that it allows traders to generate the required sales revenues.

In addition, exporters noted that VAT payment is often complicated by the delayed receipt of required documents from EAEU buyers. Traders noted that they find themselves unable to benefit from the zero VAT rate and/or excise tax relief, with their partners, particularly Russian buyers, providing the confirmation of tax payment well beyond the 180 days deadline designated by law.¹⁰³ Some reported receiving that they receive the payment confirmation six months after the actual dispatch of goods. Yet others lamented that they do not receive the said document at all.

Other growth impediments singled out by the enterprises as particularly problematic include: the high income tax levels (reported by enterprises as ranging between 24-32 percent); the underdeveloped road networks, the poor quality of electricity supply; and, the shortage of skilled workers locally.

103 The buyer should provide a statement confirming the payment of indirect taxes (or relief of indirect taxes, alternative payment of taxes) approved by the tax office. The statement should be submitted along with the export tax declaration (filled out by the Armenian seller) to the to the tax office within 180 days following the export of goods. Payment of indirect taxes are regulated by the Eurasian Economic Union Treaty (Annex 18) and the following national laws of the Republic of Armenia: Law "On value added tax", Law "On excise tax", RA Law "On peculiarities of calculation and payment of indirect taxes between the Republic of Armenia and Eurasian Economic Union".

Chapter Seven

Implications for Export Diversification: The Case of Female-Owned Enterprises

7.1 Introduction

As mentioned in chapter three, the female-owned enterprises' concentration in manufacturing, food and beverages cannot be understood in isolation of the factors' that inspired the owners' decisions to join the business community. All the interviewed owners cited the improvement of their household income as a main reason for venturing into business. A few reported being forced to join the business community after the loss of their husbands.

Indeed, around 27 percent of the owners are the sole income earners in their households, with those engaged in the food industry constituting the largest segment of the breadwinners. Another 20 percent contribute to over 50 percent of the household's monthly budget, with only 3 percent reporting modest contribution because their businesses remain too young to generate profits. The remaining owners reported generating less than 50 percent of their households' monthly income.

While their decision was dictated by economic considerations, the choice of their activities was driven by an entrepreneurial spirit and practicality. Some owners said that they saw in their business a means for "pursuing their passion". Others wanted to expand the family business. Still others sought to address a genuine need in their communities. This is particularly the case of enterprises engaged in the food, fertilizers and cosmetics, whose owners saw unmet demand for organic products. Underpinning these choices is also a search for flexibility. Most of the owners had children and saw in starting own business a logical way for attending to their families.

The owners drew on their formal training and previous working experience. Around 73 percent have formal training up to the university level. Another 40 percent had previous working experience in current areas of activity, which, in several cases, was gained abroad. Owners who lacked the knowledge and/or experience reported taking training courses that helped them initiate their businesses, and singled out, as most useful, courses provided by Business Armenia and the Small and Medium Entrepreneurship Development National Centre of Armenia.

Thus, for female-owned enterprises market entry is not an issue. The owners had access to and were furnished with the required support to overcome market entry problems. Their growth is closely linked to the owners' ability to strike a balance between improving their households' livelihoods and growing their businesses. It is this income straddling that is at the centre of their concerns. It is against this background that the female-owned enterprises growth dynamics will be measured and understood.

7.2 The interplay between regulatory and procedural barriers and export diversification

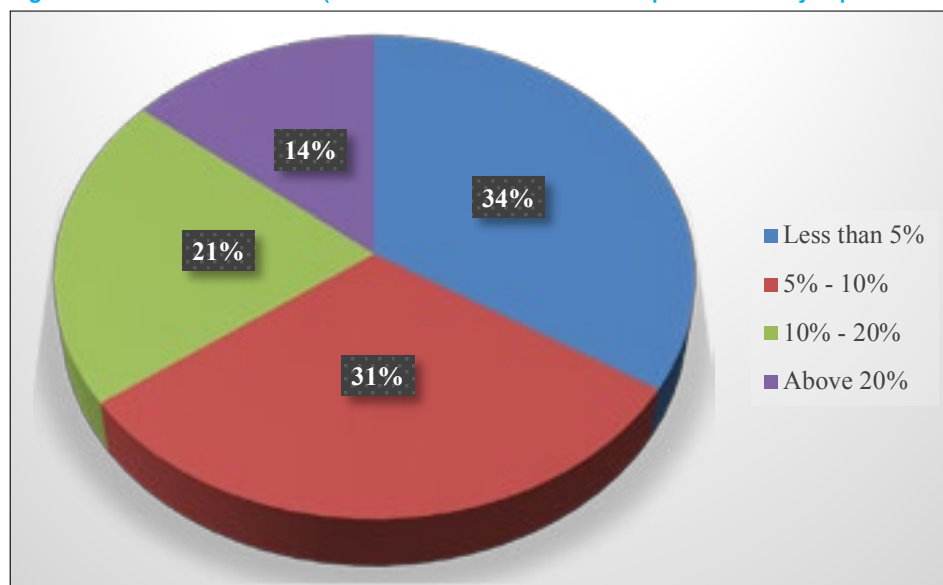
Just like the male-owned enterprises, female traders lamented being burdened by transaction costs. These costs, which account for over 20 percent of their monthly expenditures, were also driven by transport, which caused several enterprises to lose trade partners in distant countries, particularly the People's Republic of China and Thailand. Only a handful of female-owned enterprises reported shipping under favourable incoterms. Others, particularly food processors, reported reducing transport costs by pooling shipments with other enterprises. As shown in figure 7.1, enterprises reporting having to allocate over 20 percent of their monthly expenditures for covering trade costs represented 14 percent of the female-owned enterprises. This is consistent with the surveyed enterprises' limited participation in foreign trade (Chapter 2, section 2.2.2.1).

Despite these conditions, the female owned enterprises were set on expanding their businesses, with around 93 percent reporting plans to expand their businesses over the coming two years. Just like the male-owned enterprises, they were encouraged by the ongoing reforms and regional integration efforts, but were not keen on expanding exports.

As shown in Annex 4, these plans involved exporting to new countries, particularly to Georgia, the Russian Federation, the EU (particularly France and Spain) and, to a more limited extent, the People's Republic of China, Japan, UAE and the USA; hiring additional staff; launching new products; establishing branches locally and abroad; and purchasing new machinery and equipment. Reasons cited for purchasing new machinery and equipment included: improving overall product quality; increasing production capacity; upgrading production facilities; production process reorganization; launching a new product line; establishing storage facilities or purchasing storage equipment (food processing enterprises).

Owners who did not have expansion plans were mainly focused on satisfying local demand. The emphasis, they explained, is to invest the next two years in exceeding the break-even point. Owners engaged in export activities noted that they are hesitant to expand in the absence of a sustained surge in demand from international buyers.

Figure 7.1 Trade costs (% share in female-owned enterprises' monthly expenditures)

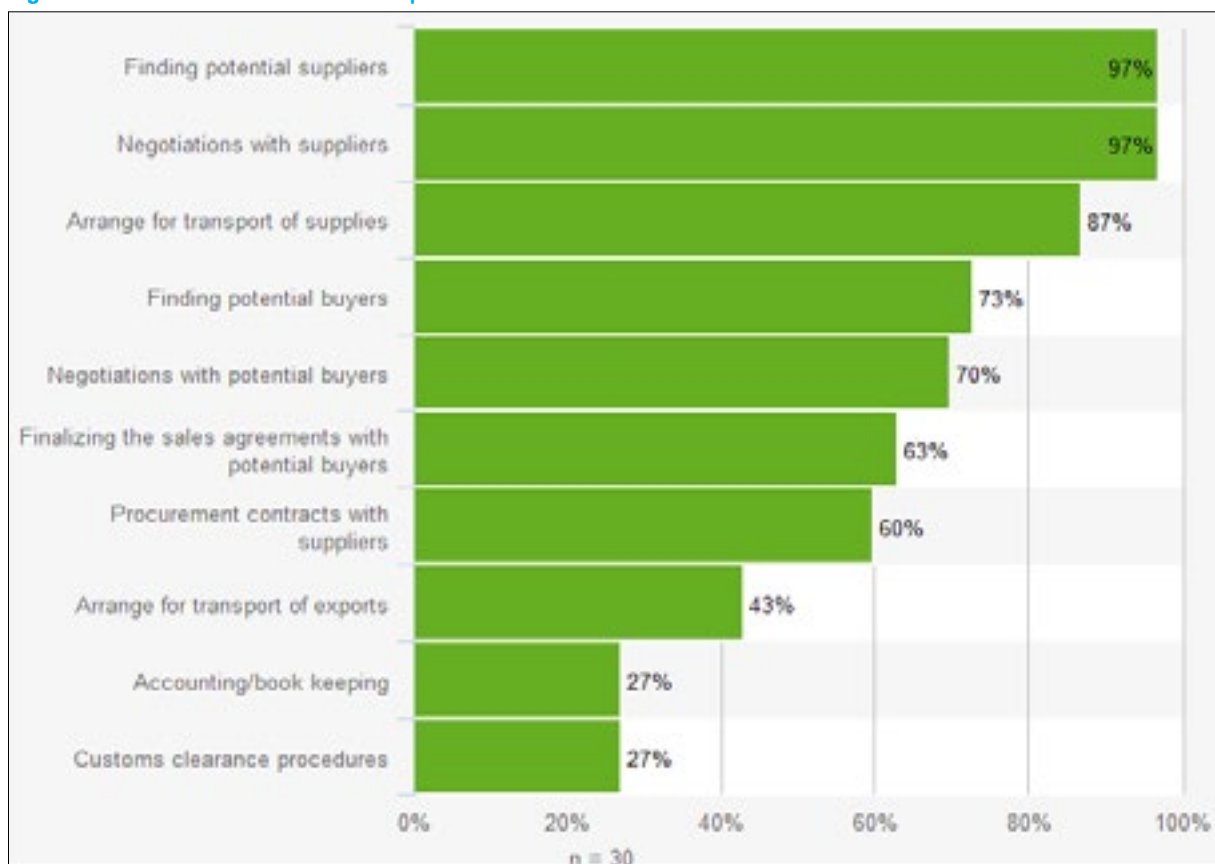


7.3 Enterprises' growth dynamics

Size

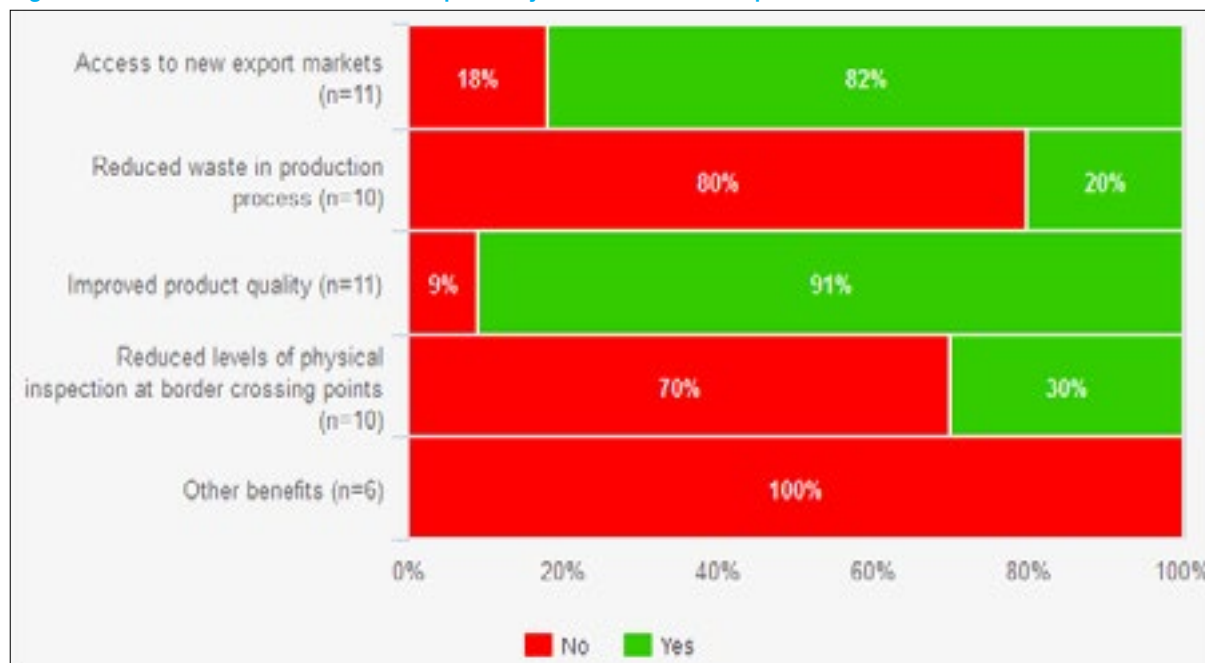
While the small size of their enterprises accords the owners the much-needed flexibility to maintain low costs, it comes with the burden of having to be involved in most, if not all, managerial functions. Moreover, as shown in Figure 7.2, the owners are mainly invested in finding and negotiating sales and supply contracts. This considerable investment reflects the limited scope of the owners' business networks, which, as shown below, was singled out as a main handicap. This handicap also means that the owners are left with limited time to explore and invest in strategic decision-making processes.

Figure 7.2 Female-owned enterprises' use of time



Standards

The enterprises' ambitious expansion plans contrast with their modest use of quality standards. Only 37 percent of the enterprises reported implementing quality standards. These were predominantly food producers, and few reported implementing EU and industry standards. As shown on figure 7.3, the enterprises found these standards helpful in improving market access conditions and overall quality. However, only 20 percent perceived standards as a means for reducing waste, pointing to a limited experience in choosing standards. Moreover, only 30 percent reported experiencing reduced levels of physical inspection at border crossing points, suggesting a limited appreciation of the principle of presumption of conformity among border control agencies.

Figure 7.3 Benefits of standards reported by female-owned enterprises

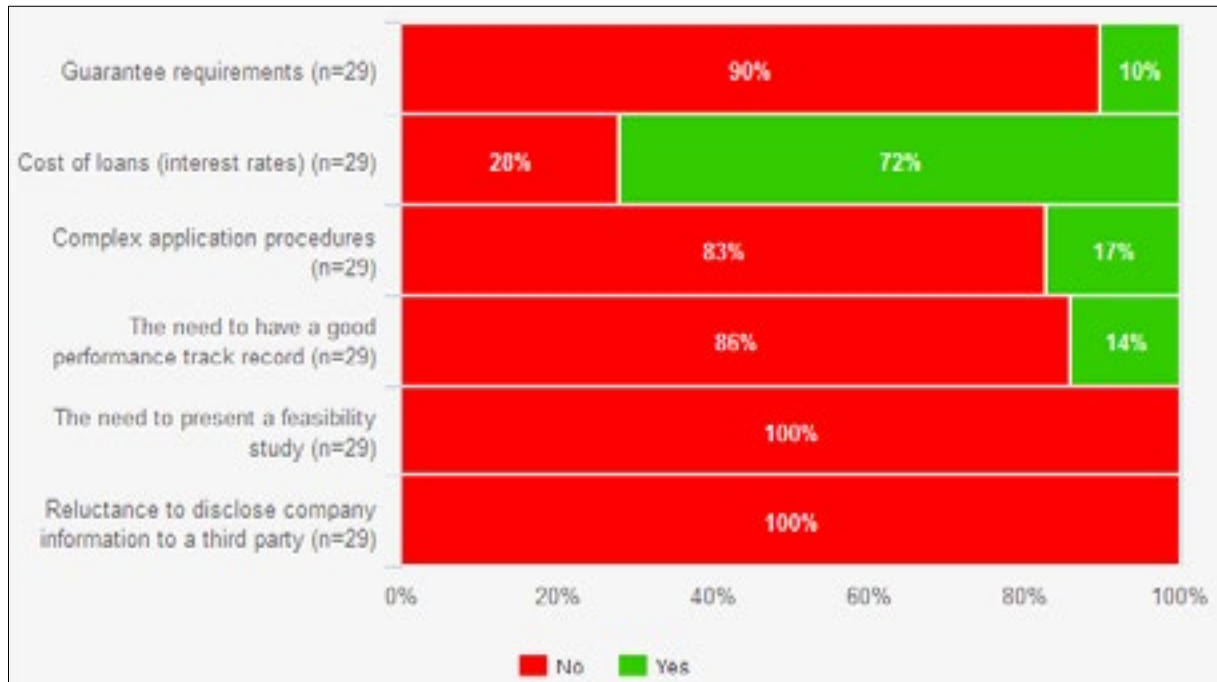
Barring a handful of enterprises that reported interest in implementing quality standards, the owners exhibited skepticism over the usefulness of such investment. Some, particularly those belonging to the food industry, noted that they used own recipes that involve specific requirements, so that they cannot see the value-added benefits. Others questioned the rationale of implementing standards, when they sell in local markets. Yet others noted that implementing standards will burden their companies, which remain small and drew attention to the lack of adequate testing laboratories to prove compliance. Still others lamented that they are not familiar with the standards applicable to their industries and the steps that should be taken to implement these standards.

Access to finance

Around 50 percent of the surveyed enterprises reported experiencing difficulties in obtaining bank loans for business expansion, owing to the prohibitive interest rates (Figure 7.4). The remaining said that they are simply discouraged from approaching the banks. Only one owner reported obtaining bank loans for business expansion, and this was only possible because she partnered with an international producer. Others, another 30 percent, obtained bank loans for covering running expenses associated with participating in international trade fairs. These loans were granted at a high interest rate (over 5 percent), with an extended repayment period spanning over 24 or 60 months.

The enterprises' difficult access to external sources of funds carries consequences for their households, with 70 percent reporting use of personal and household savings over the past 12 months to finance running expenses, including marketing activities.

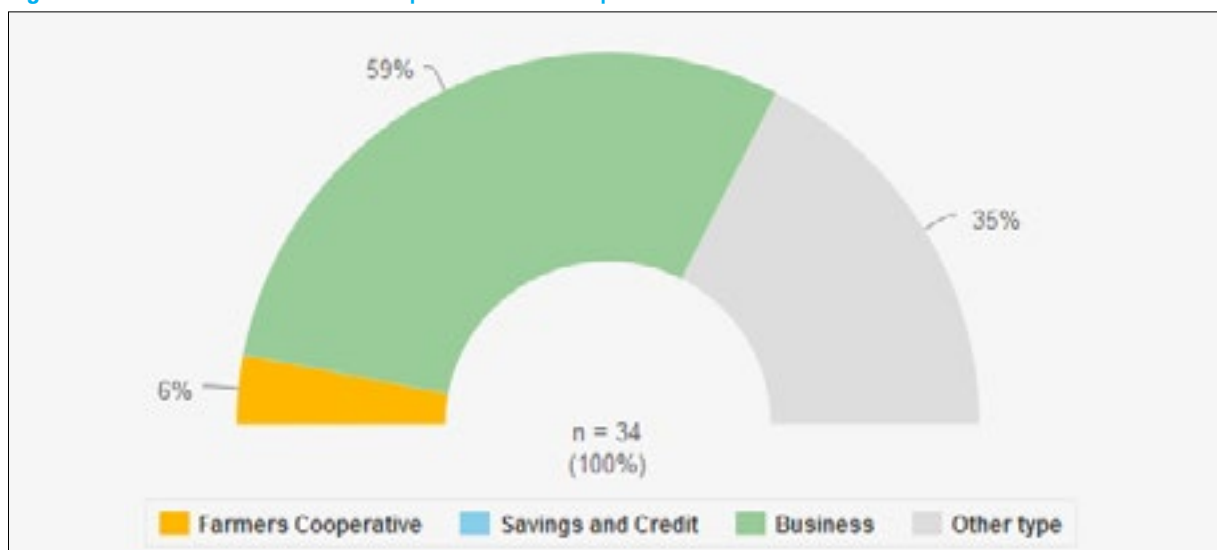
Figure 7.4 Access to finance impediments reported by female-owned enterprises



Cooperation and networking

Just like their male counterparts, the owners singled out cooperation and networking as an important element in the development of their enterprises. However, the owners lamented the lack of support, which they compensate through joining business associations and community organizations, such as farmer cooperatives (Figure 7.5).

Figure 7.5 Female-owned enterprises' memberships in associations



Indeed, most of the interviewed owners had multiple memberships and around 21 percent held leadership positions in the associations' board of directors. These memberships, noted the owners, are important since unlike their male counterparts, they have limited networking opportunities outside of their daily work.¹⁰⁴

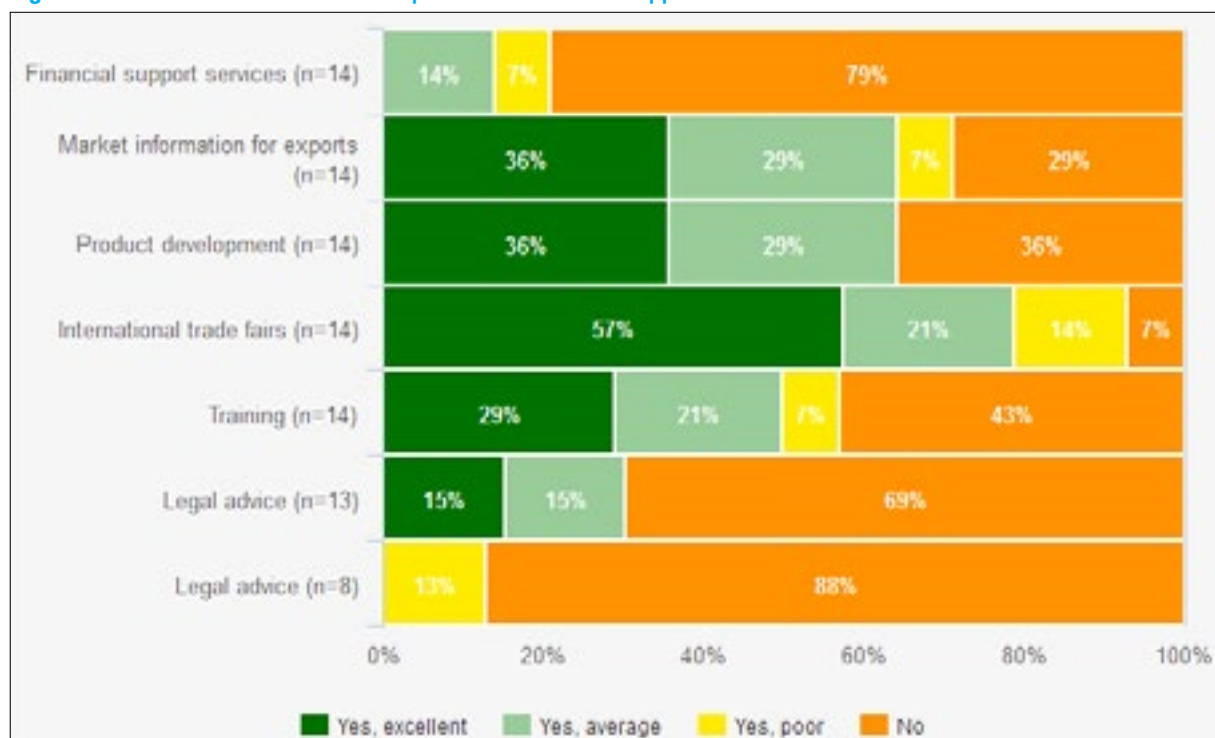
The owners' efforts seem to have been met with some success, with 50 percent reporting established partnerships in the form of sub-contracting arrangements. While the owners attach significant emphasis on cooperation with regional and international partners, the subcontracting arrangements were predominantly with national enterprises that were assigned part of the production process.

Arrangements with regional and international companies were the exception, and involved assigning the entire production process to the surveyed enterprises, which came with such benefits as machinery and equipment, raw material and access to markets. Only one enterprise assumed the role of the contracting party. The enterprise belonged to the fashion industry and used subcontracting to outsource the entire production process to an international partner (a Chinese enterprise) to cut down on production costs.

Enterprise support service

The female-owned enterprises reported receiving a broad range of support services over the past two years, including financial support, market information, product development, participation in international trade fairs, training and legal advice (Figure 7.6). However, the owners were not fully satisfied with the quality of the services, except for those pertaining to product development.

Figure 7.6 Female-owned enterprises' evaluation of support services received



104 It is worth noting that only 38 percent of the male-owned enterprise reported holding memberships in business associations.

The owners explained that they need assistance in developing marketing strategies, engaging in e-commerce, finding potential partners, identifying export opportunities and appropriate technologies. Thus far, they have been able to maintain operations in the face of competition. However, the acquired skills are insufficient and do not enable them to take the businesses to new levels. Setting out strategic visions, choosing appropriate machinery and equipment, identifying the required skill sets were among the decisions that owners were trying to take with much difficulty.

E-commerce

The surveyed enterprises do not seem to attach great importance to using the virtual world for extending their market outreach. Only 70 percent have an institutional website, which they use for advertising purposes.¹⁰⁵ The owners explained that engaging in e-commerce is complicated by not only financial constraints, but also by the lack of skilled staff. Others considered such an engagement as a financial burden, noting that they are not confident that their products will attract customers.

Other factors

All the owners lamented the high VAT rates, which eat into their profits. They also drew attention to the underdeveloped road networks and the safety risks they generate; the poor quality of electricity supply; and the shortage of skilled workers in Armenia.

105 Of the 21 enterprises with institutional websites, only 8 reported using their website for trade transaction.

Chapter Eight

Conclusion and Recommendations

This study assessed regulatory and procedural barriers to trade in Armenia. The study drew on an examination of official policy documents, legislation and the results of face-to-face interviews with relevant State agencies, service providers and 91 traders using UNECE actor-oriented questionnaires. The traders represented enterprises belonging to priority sectors, which were identified in consultation with the Government. The enterprises comprised 61 male-owned and 30 female-owned businesses, with the latter group approached with a view to ascertain the reasons behind their limited participation in export activities.

The assessment shows that trade expansion is undermined by several regulatory and procedural barriers, which were common among male and female-owned enterprises. Most of these barriers stem from the multi-faceted reforms underway to fulfil the country's commitments under the regional agreements with the EAEU and the EU. Most notable among these barriers is the lack of clarity amongst traders over the implications of regional harmonization, particularly those associated with the country's commitments under the EU.

The barriers operate throughout the international supply chain, with the lack of clarity over applied rules and procedures the exploratory costs facing traders. The preparation of trade documents for proving compliance with national and destination countries' regulatory requirements pose yet another set of constraints. Traders singled out several trade documents as difficult to obtain due to the demanding support documents and/or long wait time. The difficulties described by traders point to the strict rules and requirements applicable in target markets; the inherent complexities of striking a balance between trade facilitation and other national concerns (e.g., dual use certificates and other import permits); repetitive submission of documents (e.g., support documents submitted in several copies for obtaining trade documents); and, weaknesses in the conformity assessment system.

Electronic documents are yet to be widely used by traders. Traders tend to rely heavily on customs brokers for submitting the electronic customs declaration. Electronic permits are widely used by traders, but the system is not accessible to brokers, so that the preparation of trade documents is burdened by coordination challenges. Moreover, traders have to still present the customs declaration in hard copy at the main BCPs. These issues, along with the imperative of streamlining the administrative procedures associated with document issuance should be considered as the country forges ahead in developing its single window facility.

Passing customs tends to be complicated by disagreements over valuation and, at certain BCPs, overreliance on physical inspection. These issues point to the necessity of reviewing existing approaches to risk management, including rules and risk parameters underpinning customs automated risk management system. In addition, traders accrue prohibitive transport costs, given the limited range of transit routes available. Enterprises are left with no choice but to use longer routes with considerable costs in the form of fees for forwarders and transport operators. These fees reflect at once the longer routes and the significant risks that these actors face owing to the poor condition of road networks, some of which are inaccessible in winter.

The above barriers inflate transaction costs assumed by traders, who allocate at least 20 percent of their monthly expenditures to cover the costs associated with obtaining documentary requirements, passing customs and shipping their goods. These allocations come in addition to the VAT and income tax which traders find too high. Yet, these costs do not act as an investment disincentive, with most of the male and female owned traders were planning to expand their production processes.

These plans were driven not by an imperative to intensify exports, but by a keen interest in developing existing production capacities. This inward-looking perspective reflect the enterprises' awareness of their limitations,

both in terms of the quality of their products and the volume of exports. The enterprises expressed the view that international buyers do not trust the quality of Armenian products. This view seems to reflect more the difficulties that these enterprises face in reaching out to new buyers, since evidence shows that most of Armenian products enjoy RCA in destination countries. Indeed, without the assistance of Armenian Diaspora communities, the enterprises' engagement in export activities would have been limited.

This means that the removal of regulatory and procedural trade barriers should be supported by targeted efforts to increase the enterprises' outreach, which is a main growth dynamic for both female and male-owned enterprises. The emphasis should be on helping the enterprises forge ahead with their expansion plans in a manner that allows for building the required technological capability for achieving increased specialization in activities with high value-added. The emphasis should be also on stimulating the creation of technology intensive enterprises and, as shown below, trade facilitation reforms could be used to provide impetus for such enterprises.

Bolstering the enterprises growth dynamics is all the more important to mitigate the trade diversion effects set in motion by the changes introduced to the country's tariff structure under the agreement with the EAEU. The owners' strong sense of community means that nurturing these dynamics will also strengthen backward and forward linkages within the economy, and contribute to job creation.

The assessment shows that female and male owned enterprises share common growth dynamics. Most notable is their powerful entrepreneurial spirit. The interviewed owners have proven to be resourceful in overcoming growth challenges, including those stemming from the country's limited connectivity to international transport routes. They also demonstrated keen interest in capitalizing on emerging opportunities.

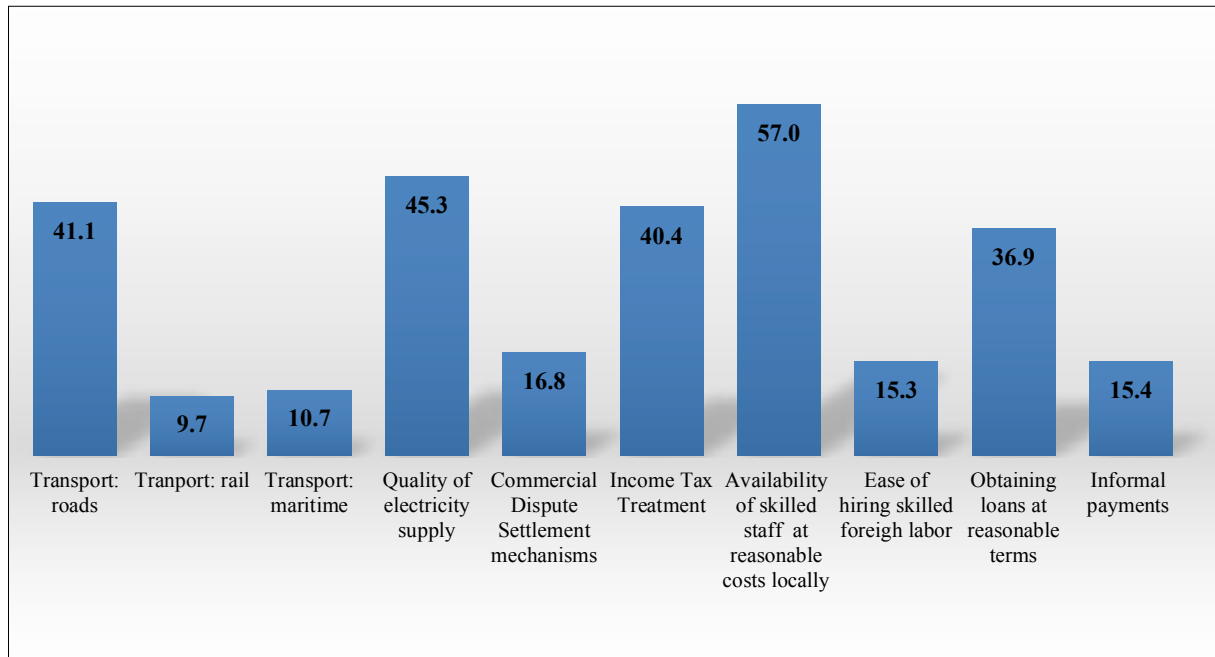
However, only enterprises with a good track record of implementing standards were able to export. These used retained earnings and, in some cases personal savings, to acquire the required equipment and skills or entered into sub-contracting arrangements with foreign enterprises. These arrangements enabled them to overcome many obstacles, including the lack of finance and enterprise development support services.

If quality standards and networking are positive dynamics, size is a negative factor. Smallness is considered as a strength, in that it accords owners with flexibility to adapt to emerging needs. This was clearly revealed from the interviews with female traders. The owners explained that they need assistance in developing marketing strategies, engaging in e-commerce, finding potential partners, identifying export opportunities and appropriate technologies.

Setting out strategic visions, choosing appropriate machinery and equipment, identifying the required skill sets were among the issues that owners were trying to address with much difficulty. These areas, along with networking and improved access to finance should be taken into account when considering the expansion of enterprise support services. The last two areas are of particular importance for female-owned enterprises. Owners lamented the limited opportunities and time to network outside of work. They also tend to use personal savings to finance running expenses, which, needless to say, carry negative consequence for their households income.

Beyond the above, female and male-owned enterprises noted that their development prospects are undermined by a few challenges, which stem from the business environment. As shown in figure 8.1, most notable among these is the lack of skilled staff at reasonable costs locally (reported by 57 percent of the traders); poor quality of electricity supply (45 percent); the underdeveloped road network (41 percent) and the high income tax levels (40 percent). The table also show that only 15 percent reported resorting to informal payments to speed up trade processes, and these instances are isolated.

These factors reflect the financial constraints that the Government labour under. The Government lacks the required resources to invest in transport infrastructure and basic utilities, and the high level of taxes, which is important for offsetting the budget deficit, is burdening the enterprises that are already accruing significant transaction costs. However, unless resolved, these factors will continue to undermine the enterprises' ability to reap the expected benefits from reforms and regional integration effort.

Figure 8.1 Business environment challenges (% of total respondents, 91 traders)

In short, the study shows that recent reforms have generated significant benefits for traders in the form of reduced transaction costs and increased export opportunities, with female-owned enterprises accorded priority treatment through targeted initiatives to support their market entry and engagement in export activities.

The challenge facing the Government relates to bolstering trade creation effects throughout the supply chain. The recommendations are geared to support targeted initiatives to stimulate such effects and carry direct contributions to SDGs 7 (affordable and clean energy), 16 (peace, justice and strong institutions) and 17 (partnerships for the goals). The recommendations also carry indirect contributions to SDGs 8 (decent work and economic growth) and 9 (industry, innovation and infrastructure).

Table 8.1 provides a number of recommendations for the Government's consideration.

Table 8.1 Recommendations for the Government's consideration

<i>Outstanding needs</i>	<i>Recommendations</i>	<i>Contribution to SDGs</i>
Transparency		
Consolidate existing public private sector consultative mechanisms	<ul style="list-style-type: none"> – Traders reported participating in several public-private consultations, organized by relevant State agencies. While these consultations tend to be held on a regular basis, the traders' participation appear to be on an ad hoc basis, and the discussions seem to be as diverse as the scope of the reforms. To ensure continuous discussions on trade reforms and their implications, the Government may wish to consolidate these discussions under one institutional mechanism, as stipulated under article 23.2 of the Agreement on Trade Facilitation – In so doing, and following ECE recommendation 4,¹⁰⁶ the Government should avoid establishing a new body from scratch. Rather, the emphasis should be on assigning consultations over trade reforms to one of the existing mechanisms that are supported by State agencies. This is more conducive to ensuring policy coherence. Moreover, development experiences suggest that upscaling the mandates of existing institutional mechanisms is a natural path to follow to ensure sustainability. – To this end, consider tasking an existing coordinating body with the responsibility of facilitating domestic coordination and implementation of trade reforms associated with delivering on Armenia's commitments under the Agreement on Trade Facilitation. This will allow for ensuring complementarity between trade facilitation and broader economic development efforts and for increasing the contribution of trade to the 2030 Agenda 	<p>SDG 17.17 (Encourage and promote effective public, public-private and civil society partnerships, building on the experience and resourcing strategies of partnerships)</p> <p>SDG 17.14 (Enhance policy coherence for sustainable development)</p>
Further develop the advance rulings system	<ul style="list-style-type: none"> – Educate traders on the information requirements that need to be included in the requests for advance rulings. This could be done through guidance documents and awareness raising workshops – Establish a law on binding advance rulings. Drawing on international best practices, the law should specify, among others: the party with the right to request advance ruling; questions that may be asked; the treatment the applicant is entitled to; the procedure to be followed to request a ruling; procedure for nonconforming requests; and situations in which no ruling will be issued. – Consolidate the national advance rulings facility with the required expertise knowledge and ICT systems. – Establish an online system for managing advance rulings. The system should allow for generating a national compendium that is accessible (via a search engine) and for issuing advance rulings in electronic format. 	SDG 16.10 (Ensure public access to information and protect fundamental freedoms, in accordance with national legislation and international agreements)
Consolidate information dissemination activities	<ul style="list-style-type: none"> – The State Revenue Committee Customs Service publishes up-to-date information on cross border trade legislation and procedures in more than one language on its website, which also features a hotline and online information request forms. Line Ministries and State agencies also publish up to date information on sanitary, phytosanitary and safety regulatory and procedural requirements. It would be useful to consolidate the information in an online help desk facility, which could be maintained by one State agency. The facility could also feature explanatory brochures on the new/ revised legislation and their implication for export/import activities, particularly in relation to documentary requirements and rules of origin under the European Union (EU) and the Eurasian Economic Union (EAEU) (SDG 16.10). – State agencies need to intensify, in cooperation with market support institutions, awareness raising activities (including workshops, press releases and training material) to alert traders on the new/revised legislation (SDG 16.10). 	SDG 16.10

Table 8.1 Recommendations for the Government's consideration (continued)

<i>Outstanding needs</i>	<i>Recommendations</i>	<i>Contribution to SDGs</i>
Documentary requirements and the use of electronic documents		
Reduce red tape	<ul style="list-style-type: none"> – Consider issuing trade documents in Armenian and other languages (e.g., English; most widely used in international trade). – Products accompanied by certificates issued by authorized State agencies and internationally recognized conformity assessment bodies in source countries should not be subjected to additional testing. The said certificates should be recognized – Review existing internal procedures and processes associated with issuing export/import licenses (namely, "Notification" – cryptographic certificate; import permit; dual use certificate for imports and Convention for International Trade in Endangered Species export permit) to shorten the wait time. 	These measures will reduce transaction costs facing the enterprises. The resulting savings could be used for covering modest investments (e.g., marketing), which, in turn, carries positive bearing on SDG 9.2 (Promote inclusive and sustainable industrialization and, by 2030, significantly raise industry's share of employment and gross domestic product, in line with national circumstances, and double its share in least developed countries)
Refine the Single Window (SW) System	<ul style="list-style-type: none"> – Continue the expansion of the national single window by ensuring the involvement and integration of all the state bodies involved in issuing trade documents into the SW platform that is being developed until 2021. – Implement the innovation technology tools (e.g., Machine Learning, Big Data Analysis.) for collecting, analysing and monitoring trade information 	<p>SDG 9.5b (Support domestic technology development, research and innovation in developing countries, including by ensuring a conducive policy environment for, inter alia, industrial diversification and value addition to commodities)</p> <p>The development of the SW should be used as a vehicle for further developing the national ICT sector. This will support the achievement of SDG 8.2 (Achieve higher levels of economic productivity through diversification, technological upgrading and innovation, including through a focus on high-value added and labour-intensive sectors)</p>
At the border control		
Consolidate risk management		
Refine risk assessment parameters	<ul style="list-style-type: none"> – The Customs Service should fully implement the Customs Service policy for reducing the percentage of cargo subjected to physical inspection. This strategic goal can be reached by using innovative approaches and smart ICT tools for refining risk analysis, taking into consideration the Joint Board of Customs Service of EAEU Decree No. 23/18 on the "List of Factors and Signs Used for Management of Local Risks". The list, which was approved on 22 June 2017, stipulates that individual customs control points should continue to use local risk profiles and take steps, to the extent possible, to implement automated systems for establishing local profiles. – Strengthen customs with an electronic system which consolidates all information sources (e.g., electronic system for processing declaration, internal detailed records from different related units within Customs Administration, information from external governmental institutions, international customs cooperation) for supporting: risk identification; risk evaluation (i.e., whether the identified risks are acceptable); the preparation of risk indicators (e.g., kinds of goods; traders; tariff lines; prices; currencies; values, country of origin; country of destination); and, the creation of risk profiles (containing risk area, risk indicators, risk assessment and sources of information, parameters of selectivity, treatment and feedback). Such a system will enable Customs to continuously update and improve risk management and exchange information with its counterparts in partner countries 	These measures will generate immediate savings for the enterprises, which carry positive bearing on SDG 9.2

Table 8.1 Recommendations for the Government's consideration (continued)

Outstanding needs	Recommendations	Contribution to SDGs
Post-clearance audit	<ul style="list-style-type: none"> – The post-clearance audit function should be developed to be capable of undertaking systems-based trader audits that allow the considered examination of the commercial processes and systems which lie behind the customs duty declared at importation; and then to use the findings to adjust the parameters in the risk management system. This is a more holistic approach than that which is applied now, which relies mainly on the transaction-based checking of individual import entries. To this end, consider further develop customs post clearance audit so that it covers: <ul style="list-style-type: none"> – Case-by-case audit – Planned audit – Comprehensive self-assessment audit. 	These measures will generate immediate savings for the enterprises, which carry positive bearing on SDG 9.2
Authorized Economic Operators (AEO) schemes	<ul style="list-style-type: none"> – Develop support services to assist enterprises, especially small and medium enterprises, in ensuring complete and full compliance with the AEO criteria. Most notable in this respect are: (i) training programmes (and guidelines) for enabling enterprises to conduct self-assessment and self-policing; and (ii) financial assistance to encourage them to invest in security. 	These measures will generate immediate savings for the enterprises, which carry positive bearing on SDG 9.2
Strengthen border control agencies		
Equip the Food Safety Inspection Body with the required equipment	<ul style="list-style-type: none"> – Equip testing laboratories under the Food Safety Inspection Body with the required equipment and expertise skills in order to: <ul style="list-style-type: none"> – enable measuring alpha, beta and gamma radiations and, thereof, determine levels of radioactive Cesium and Strontium content in raw material, animal feed and food. – achieve compliance with international standards in the field of veterinary testing, including the introduction of new validation methods, verification and random testing (PT-test). – conduct isotope analysis (hydrogen, carbon, nitrogen, and oxygen) – Equip the Food Safety Inspection Body with refrigerated trucks for transporting samples 	<p>SDG 9.1 (Develop quality, reliable, sustainable and resilient infrastructure, including regional and transborder infrastructure, to support economic development and human well-being, with a focus on affordable and equitable access for all).</p> <p>These measures will generate immediate savings for the enterprises, which carry positive bearing on SDG 9.2</p>
Storage facilities	<ul style="list-style-type: none"> – Explore avenues for increasing storage facilities to allow for a wider application of separate release from clearance 	SDGs 9.1 and 9.2
Reconsider customs valuation practices		
Ensure compliance with the WTO Agreement on Customs valuation	<ul style="list-style-type: none"> – The Customs Service should continue to ensure the strict application of the WTO Customs Valuation Agreement to its control of customs value. This requires that, in every case, the customs value of imported goods be calculated using Method 1 (the transaction value method) first, with the other methods being applied in sequence only if a value cannot be determined under the first method.¹⁰⁷ Where Customs uses the price list, the list should be published. 	<p>SDG 17.10 (Promote a universal, rules-based, open, non-discriminatory and equitable multilateral trading system under the World Trade Organization, including through the conclusion of negotiations under its Doha Development Agenda)</p> <p>These measures will generate immediate savings for the enterprises, which carry positive bearing on SDG 9.2</p>

107 The only exception is that the sequence of Methods 4 and 5 may be reversed at the request of the importer.

Table 8.1 Recommendations for the Government's consideration (continued)

<i>Outstanding needs</i>	<i>Recommendations</i>	<i>Contribution to SDGs</i>
Regional cooperation and transit trade		
Consolidate regional cooperation with additional initiatives and joint actions to facilitate cross-border control processes and transit trade	<ul style="list-style-type: none"> – Publish detailed information on Georgia's environmental requirements applicable to transit trade – Launch information dissemination and training workshops for enterprises subject to Dangerous Goods (DG) regulations, including the UNECE convention on transporting DG by road (ADR); the Intergovernmental Organisation for International Carriage by Rail (OTIF) the treaty for transports of DG by rail (RID) and the International Maritime Organisation (IMO) treaty for transports of DG by sea (IMDG). As these regulations are extensive, complex and technical, the aim should be to equip the enterprises with practical knowledge by focusing on common areas covered by these regulations such as classification of goods, packaging, labelling and document requirements. This service can be provided by relevant State agencies and/or enterprise support institutions – Consider providing Armenian traders, brokers and forwarders with operational support, such as digital guides to the DG regulations and adapted written instructions. This service can be provided by relevant State agencies and/or enterprise support institutions 	SDG 16.10
Transport infrastructure and logistical services		
Improve road safety	<ul style="list-style-type: none"> – Consider joining the ECE protocols and conventions on road traffic and road safety, including: <ul style="list-style-type: none"> – Convention on Road Traffic – Protocol on Road Markings – European Agreement supplementing the Convention on Road Signs and Signals (1968) 	SDG 9.1; SDG 3.6 (By 2020, halve the number of global deaths and injuries from road traffic accidents)
Strengthen the brokerage industry	<ul style="list-style-type: none"> – Encouraging the establishment a new customs brokers association, since brokers are central to the MSMEs participation in international trade. 	This will generate immediate savings for the enterprises, which carry positive bearing on SDG 9.2
Technical regulations		
Strengthen line ministries with additional skills	<ul style="list-style-type: none"> – Accord priority in reform initiatives to creating pools of national experts within line ministries capable of assessing the impact of EU Directives under approximation (for low voltage electrical equipment safety, fuel, tobacco and vehicle safety and in field of water quality and resources management) and of ensuring proper harmonization with national and secondary laws. The emphasis should be on developing in cooperation with international experts training material (in Armenian language) for future use. Special emphasis should be made to include case studies (drawing on development experiences elsewhere) that are tailored to Armenia's context. – Accord priority to equipping line Ministries with the expertise skills and knowledge to approximate EU Directives on conformity assessment 	Technical regulations reference international standards. Standards help enterprises create roadmaps for upgrading of production capacity and, thereof, enable them to achieve increased specialization in high value-added activities (SDG 8.2)

Table 8.1 Recommendations for the Government's consideration (continued)

<i>Outstanding needs</i>	<i>Recommendations</i>	<i>Contribution to SDGs</i>
Standardization		
<i>Strengthen SARM (Armenia National Institute of Standards)</i>	<ul style="list-style-type: none"> – Accord priority to enabling SARM to enter into twinning projects tailored to support preparations for joining the European Telecommunications Standards Institute and International Electro-technical Commission. – Accord priority to building SARM's in-house training services. The emphasis should be on developing in cooperation with international experts training material in Armenian language for future use, which is tailored to Armenia's context (through case studies). – Accord priority to assisting SARM in developing training material on the use of standards (in Armenian language). Special emphasis should be accorded to tailor the material to Armenia's context (through case studies). This will go a long way in supporting SARM's efforts to familiarise traders with the implementation and benefits of standards. 	SDG 8.2
Conformity assessment		
<i>Accord priority to enabling ARMNAB (Armenia National Accreditation Body) to achieve international recognition</i>	<ul style="list-style-type: none"> – Strengthen ARMNAB with the advanced knowledge and expertise skills, especially in the areas of calibration and medical laboratories. – Equip ARMNAB with ICT systems, including hardware (e.g. servers, Uninterruptible power supply) – Accord priority to enabling ARMNAB to enter into twinning projects tailored to support its preparations to join the EA Multilateral Recognition Arrangement (MLA) and International Laboratory Accreditation Cooperation (ILAC) mutual recognition agreement (MRA). 	SDG 8.2
Metrology		
<i>National Institute of Metrology</i>	<ul style="list-style-type: none"> – Strengthen the National Institute of Metrology with expertise knowledge and skills – Further develop legal metrology <ul style="list-style-type: none"> – Consolidating the legal requirements for measurement instruments in all areas (industries, health and safety, environmental protection, etc.) – International metrological harmonization – Supervision of regulated products and activities – Traceability of regulated measurements and measuring instruments – In addressing the above, accord priority to obtaining membership in the International organisation of legal metrology (OIML) 	SDG 8.2
Enterprise development: promote the diversification of services provided by market support institutions		
<i>Marketing and strategic planning support services</i>	<ul style="list-style-type: none"> – Accord priority to establishing sector specific market intelligence services to help enterprises identify export opportunities and efficient supply sources. – Accord priority to equipping existing enterprise support organizations with training facilities, which offer practical support in the areas marketing, strategic planning, choices of appropriate embodied technologies for scaling up productivity 	SDGs 8.2 and 9.2
<i>Promote networking with regional and international companies</i>	<ul style="list-style-type: none"> – Consider leveraging on existing networking efforts into an online help desk facility aimed at facilitating the integration of Armenian enterprises into regional and global supply chains drawing on experiences elsewhere such as the Global Entrepreneurship Network and Enterprise Europe Network, 	SDG 8.2

Table 8.1 Recommendations for the Government's consideration (continued)

<i>Outstanding needs</i>	<i>Recommendations</i>	<i>Contribution to SDGs</i>
<i>Improve the enterprises' access to finance</i>	<ul style="list-style-type: none"> – Consider establishing credit guarantee schemes that would allow micro-finance institutions and non-banking financial institutions to tap the banking system's deposit base for financing credit lines to help business enterprises implement business development plans and cover advance value added tax (VAT) payments. These schemes could be designed in a manner that assigns such institutions the role of intermediaries between potential borrowers and the banks. The institutions would screen borrowers, monitor their performance and assume responsibility vis-à-vis the banks in case of default. – Another mechanism for facilitating the enterprises' access to finance would be the establishment of loan insurance schemes. Such schemes safeguard the borrowers' loan against default risks through imposing an insurance premium that is co-shared between the borrowing enterprise and the government. 	SDG 8.3 (Promote development-oriented policies that support productive activities, decent job creation, entrepreneurship, creativity and innovation, and encourage the formalization and growth of micro-, small- and medium-sized enterprises, including through access to financial services)
<i>Improve access to electricity and transport infrastructure</i>	<ul style="list-style-type: none"> – Priority should be given to addressing the electricity shortcuts in rural and remote areas. – Priority should be given to rehabilitating and repairing secondary roads to ensure geographic continuity. 	SDG 7.1 (Ensure universal access to affordable, reliable and modern energy services) SDG 9.1
<i>Address the skills mismatch</i>	<ul style="list-style-type: none"> – Training activities and programmes (including those provided by vocational centres) should be aligned around critical skill shortages identified by business enterprises, with a view to enhance the technological capabilities of business enterprises. 	SDG 8.2
<i>Improve forwarders bargaining power vis-à-vis international shipping companies</i>	<ul style="list-style-type: none"> – Consider the establishment of a national shippers' council to help enterprises obtain favourable terms and enter into cooperation arrangements with the European Shippers' Council and Global Shippers Alliance. 	This will generate immediate savings for the enterprises, which carry positive bearing on SDGs 8.2 and 9.2.

Annexes

Annex 1. Armenia's Trade Patterns

Table A1.1 Armenia's top 20 exports to the world

Product		Exports in millions of USD				Share in total exports (%)			
		1997	2003	2013	2017	1997	2003	2013	2017
260300	Copper ores and concentrates.	6.5	17.0	279.9	571.5	3.0	3.0	20.6	28.5
240220	Cigarettes containing tobacco	-	2.0	68.0	236.4	-	0.4	5.0	11.8
220820	Spirits obtained by distilling grap	18.6	56.8	181.3	199.5	8.6	10.2	13.3	10.0
710813	Non-monetary :-- Other semi-manufac	-	21.8	73.6	144.5	-	3.9	5.4	7.2
760711	Not backed :-- Rolled but not furth	0.4	18.4	80.4	96.4	0.2	3.3	5.9	4.8
720270	Ferro-molybdenum	2.3	13.7	102.4	84.4	1.1	2.5	7.5	4.2
271600	Electrical energy. (optional headin	1.6	11.0	78.0	71.0	0.7	2.0	5.7	3.5
740200	Unrefined copper; copper anodes for	0.9	11.7	90.2	70.7	0.4	2.1	6.6	3.5
940540	Other electric lamps and lighting f	0.1	0.0	0.3	35.6	0.1	0.0	0.0	1.8
710239	Non-industrial :-- Other	45.5	230.2	43.9	27.9	21.1	41.2	3.2	1.4
260800	Zinc ores and concentrates.	0.3	0.9	17.0	16.6	0.1	0.2	1.3	0.8
020410	Carcasses and half-carcasses of lam	-	-	-	14.2	-	-	-	0.7
070200	Tomatoes, fresh or chilled.	-	-	0.6	13.4	-	-	0.0	0.7
710231	Non-industrial :-- Unworked or simp	0.0	49.6	-	13.4	0.0	8.9	-	0.7
030211	Salmonidae, excluding livers and ro	-	0.0	5.4	11.1	-	0.0	0.4	0.6
180690	Other	-	0.1	1.5	10.0	-	0.0	0.1	0.5
220421	Other wine; grape must with ferment	0.3	0.3	4.1	9.8	0.1	0.0	0.3	0.5
040690	Other cheese	-	1.0	3.6	9.6	-	0.2	0.3	0.5
300490	Other	0.8	0.8	4.8	9.6	0.4	0.1	0.4	0.5
060310	Fresh	0.0	0.0	2.1	8.8	0.0	0.0	0.2	0.4
Total		77	435	1,037	1,654	35.9	77.9	76.3	82.5

Source: Calculations based on UN Comtrade

Table A1.2 Armenia's top 20 imports from the world

Products		In millions of USD				In % of total imports			
		1997	2003	2013	2017	1997	2003	2013	2017
271121	In gaseous state :-- Natural gas	0.0	65.8	571.8	355.9	-	5.7	13.5	9.2
271000	Petroleum oils and oils obtained	91.7	9.8	341.6	242.6	12.2	0.9	8.1	6.2
300490	Other	22.5	32.8	94.3	146.7	3.0	2.9	2.2	3.8
710239	Non-industrial :-- Other	1.2	30.4	75.3	89.3	0.2	2.7	1.8	2.3
852520	Transmission apparatus	0.4	3.9	14.3	83.0	0.1	0.3	0.3	2.1
760110	Aluminium, not alloyed	0.0	0.0	45.4	66.6	-	-	1.1	1.7
100190	Other	6.3	1.1	60.5	58.4	0.8	0.1	1.4	1.5
710812	Non-monetary :-- Other unwrought	1.0	0.0	103.8	54.3	0.1	0.0	2.4	1.4
240220	Cigarettes containing tobacco	11.8	29.4	59.5	37.6	1.6	2.6	1.4	1.0
020714	Of fowls of the species Gallus dome	1.5	7.8	40.1	35.7	0.2	0.7	0.9	0.9
710231	Non-industrial	43.7	251.3	40.1	35.1	5.8	21.9	0.9	0.9
240120	Tobacco, partly or wholly stemmed/s	0.0	5.4	44.9	34.2	0.0	0.5	1.1	0.9
940600	Prefabricated buildings.	1.2	0.0	4.2	33.1	0.2	0.0	0.1	0.9
870410	Dumpers designed for off-highway	0.1	2.6	12.7	30.9	0.0	0.2	0.3	0.8
170111	Raw sugar not containing added	0.0	0.0	36.9	30.4	0.0	0.0	0.9	0.8
870323	Other vehicles, with spark-ignition	5.3	21.6	35.7	28.0	0.7	1.9	0.8	0.7
180690	Other	2.5	4.0	26.5	24.9	0.3	0.3	0.6	0.6
730890	Other	5.4	0.7	6.8	24.3	0.7	0.1	0.2	0.6
090111	Coffee, not roasted	0.5	0.3	26.3	24.1	0.1	0.0	0.6	0.6
310230	Ammonium nitrate	3.9	1.9	21.4	23.6	0.5	0.2	0.5	0.6
Total		199.0	468.8	1662.1	1458.6	26.4	40.9	39.2	37.5

Source: Calculations based on UN Comtrade

Table A1.3 Armenia's top 20 exports by main partners 2017 (USD million)

	Description	Bulgaria	China	Georgia	Germany	Russian Federation	Switzerland	EU	EAEU
260300	Copper ores and concentrates.	281.2	115.9	86.8	-	-	84.1	284.7	-
240220	Cigarettes containing tobacco	0.0	0.0	13.8	0.0	4.1	-	1.3	5.1
220820	Spirits obtained by distilling grapes	0.1	0.3	1.0	1.5	173.0	0.0	6.6	179.4
710813	Non-monetary	-	-	-	-	-	144.5	-	-
760711	Not backed	-	-	-	28.3	-	-	48.9	-
720270	Ferro-molybdenum	-	-	-	3.7	5.4	-	79.0	5.4
271600	Electrical energy	-	-	6.4	-	-	-	-	-
740200	Unrefined copper; copper anodes for	-	-	-	70.7	-	-	70.7	-
940540	Other electric lamps and lighting f	-	-	0.0	-	35.6	-	-	35.6
710239	Non-industrial	-	-	0.0	0.1	26.2	-	0.2	26.2
260800	Zinc ores and concentrates.	-	0.0	-	-	-	-	15.1	-
020410	Carcasses and half-carcasses of lam	-	-	-	-	-	-	-	-
070200	Tomatoes, fresh or chilled.	-	-	-	-	13.4	-	-	13.4
710231	Non-industrial	-	-	-	-	-	-	10.9	-
030211	Salmonidae, excluding livers	-	-	-	-	11.1	-	-	11.1
180690	Other	-	0.0	1.6	0.0	6.9	0.0	0.0	7.1
220421	Other wine; grape must with ferment	0.0	0.1	0.0	0.1	7.8	0.0	0.7	7.9
040690	Other cheese	-	-	0.0	-	9.6	-	-	9.6
300490	Other	-	0.0	2.3	0.0	4.4	-	0.0	5.0
060310	Fresh	-	-	0.4	-	8.1	-	-	8.4
TOTAL		281.3	116.4	112.3	104.3	305.6	228.6	518.1	314.3
Share in total exports (%)		99.9	98.8	81.3	95.7	56.6	97.2	95.5	56.7

Source: Calculations based on UN Comtrade

Table A1.4 Armenia's top 20 imports by main partners 2017 (USD million)

	Description	China	Georgia	Germany	Iran	Italy	Russia	EU	EAEU
271121	In gaseous state	-	-	-	56.5	-	299.4	-	299.4
271000	Petroleum oils and oils	0.0	5.0	1.9	1.5	2.0	156.6	64.6	156.7
300490	Other	0.1	1.4	14.6	0.0	4.1	5.5	59.3	6.6
710239	Non-industrial	-	-	0.1	-	-	0.0	12.4	0.0
852520	Transmission apparatus	49.3	0.0	0.1	-	0.2	4.7	3.9	4.7
760110	Aluminium, not alloyed	-	-	-	-	-	66.6	-	66.6
100190	Other	-	0.7	-	-	-	57.7	0.0	57.7
710812	Non-monetary	-	-	-	-	-	1.0	-	1.0
240220	Cigarettes containing tobacco	0.0	-	0.5	-	-	14.1	2.3	14.1
020714	Of fowls of the species Gallus dome	-	-	0.0	-	-	5.9	3.3	6.1
710231	Non-industrial	-	-	-	-	-	15.0	0.6	15.0
240120	Tobacco, partly or wholly stemmed/s	-	-	0.1	-	0.0	-	0.8	-
940600	Prefabricated buildings.	0.6	-	-	0.1	4.9	2.7	29.6	2.7
870410	Dumpers designed for off-highway us	1.7	-	0.7	-	-	1.7	4.7	3.8
170111	Raw sugar	-	-	0.0	-	0.0	0.0	0.0	0.0
870323	Other vehicles, with spark-ignition	0.0	0.1	4.5	0.2	0.0	5.5	9.2	5.5
180690	Other	0.1	-	0.6	0.0	3.4	10.7	7.9	10.8
730890	Other	0.3	0.1	0.5	6.8	1.6	3.9	5.8	3.9
090111	Coffee, not roasted	-	-	-	-	-	0.1	0.0	0.1
310230	Ammonium nitrate	-	15.0	-	3.0	-	5.6	0.0	5.6
Total		52.1	22.2	23.7	68.2	16.4	656.5	204.4	660.2
Share in total imports		11.2	25.5	14.4	39.1	13.2	56.4	25.0	54.7

Source: Calculations based on UN Comtrade

Table A1.5 Armenia's top 20 exports to the EU

HS Code and product	Exports to the EU (USD thousands)				Exports to the EU as a share of global exports			
	1997	2003	2013	2017	1997	2003	2013	2017
260300 Copper ores and concentrates.		8,617	159,890	284,699	0.0%	50.6%	57.1%	49.8%
720270 Ferro-molybdenum	2,199	12,490	102,386	79,040	93.6%	91.0%	100.0%	93.7%
740200 Unrefined copper; copper anodes for		10,462	90,239	70,711	0.0%	89.1%	100.0%	100.0%
760711 Aluminium (foil); Not backed		13,472	2,545	48,900	0.0%	73.3%	3.2%	50.7%
260800 Zinc ores and concentrates.		343	15,275	15,055	0.0%	38.8%	89.6%	90.8%
710231 Diamonds; Non-industrial	26	4,033	-	10,852	100.0%	8.1%		81.1%
261390 Molybdenum ores and concentrates; other than roasted		6,500	6,651	7,756		59.5%	100.0%	100.0%
220820 Spirits obtained by distilling grape	395	874	3,693	6,571	2.1%	1.5%	2.0%	3.3%
847420 Crushing or grinding machines				1,438	0.0%	0.0%	0.0%	100.0%
240220 Cigarettes containing tobacco		45	489	1,348		2.2%	0.7%	0.6%
870323 Vehicles, with spark-ignition		10		1,147	0.0%	100.0%		80.9%
903210 Thermostats			244	1,007	0.0%	0.0%	26.6%	68.2%
220600 Beverages, fermented; Other fermented beverages			481	976		0.0%	12.8%	12.5%
220421 Other wine; grape must with ferment	10	3	226	661	4.0%	1.0%	5.5%	6.7%
852520 Transmission apparatus		4	40	564	0.0%	100.0%	100.0%	62.4%
900190 Optical elements; lenses; Other	1	30	549	556	4.9%	22.8%	76.9%	51.4%
740400 Copper waste and scrap.	1,236	80		547	9.3%	3.0%	0.0%	8.7%
710812 Gold, Non-monetary				485				97.7%
251200 Siliceous fossil meals			556	475		0.0%	28.1%	25.5%
843041 Other boring or sinking machinery				470		0.0%		81.2%

Source: Calculations based on UN Comtrade

Table A1.6 EU's imports from Armenia by trade regime (Euro thousands)

Year	ONLY GSP					GSP utilisation rate (6)	ONLY MFN			UNKNOWN		Total import (11)	GSP as % of total import (12)
	GSP ZERO (1)	GSP NON ZERO (2)	MFN ZERO (3)	MFN NON ZERO (4)	UNKNOWN (5)		MFN ZERO (7)	MFN NON ZERO (8)	UNKNOWN (9)	UNKNOWN (10)			
2003	13,585	9,275		6,639		77%	113,586	2,357	766	330	146,538	16%	
2004	44,096	1,574		5,731		89%	158,796	11,780	342	237	222,557	21%	
2005	180,733	1,147		11,871	41	94%	266,824	4,203	10	1,085	465,874	39%	
2006	121,542	1,165		4,415	605	96%	176,824	6,442	9	1,460	311,857	39%	
2007	153,874	2,259		19,623		89%	158,528	134		1,021	335,439	47%	
2008	157,865	2,917	225,991	9,331		41%	132,359	298		4,844	307,840	52%	
2009	58,096	142		4,615		93%	90,638	49		1,108	154,648	38%	
2010	101,872	157	132,846	4,130		43%	142,903	182		321	249,698	41%	
2011	107,907	155	5,070	3,847		92%	189,719	637		988	303,257	36%	
2012	78,247	91		3,662		96%	172,244	669		994	255,907	31%	
2013	45,640	104		7,371		86%	137,305	284		895	191,598	24%	
2014	42,382	53		4,908		90%	131,429	14,160		619	193,551	22%	
2015	103,514	74		11,620		90%	138,035	14,627		1,979	269,849	38%	
2016	107,722	51		8,658		93%	185,293	8,303		532	310,559	35%	
2017	130,285	34		5,166		96%	214,735	912		445	351,577	37%	

Source: EU Comext

Table A1.7 Armenia's exports to the EU by trade regime (average 2015-17 in EUR thousands)

PERIOD	Average 2015-2017		
	GSP ZERO	GSP NON ZERO	MFN NON ZERO
030629 CRUSTACEANS, EVEN SMOKED, FIT FOR HUMAN CONSUMPTION	484,179		26,338
040900 NATURAL HONEY	4,788		1,441
070690 FRESH OR CHILLED SALAD BEETROOT, SALSIFY,	40,519		
071290 DRIED VEGETABLES AND MIXTURES OF VEGETABLES,	492		204
080420 FRESH OR DRIED FIGS	1,649		
081120 FROZEN RASPBERRIES, BLACKBERRIES, MULBERRIES,	3,191		
081190 FROZEN FRUIT AND NUTS, UNCOOKED OR COOKED BY	30,053		
081310 DRIED APRICOTS	7,173		709
081320 DRIED PRUNES	10,144		712
081330 DRIED APPLES	813		298
081340 DRIED PEACHES, PEARS, PAPAWS "PAPAYAS", TAMARINDS	18,728		1,759
081350 MIXTURES OF NUTS OR DRIED FRUITS	3,632		3,107
090121 ROASTED COFFEE (EXCL. DECAFFEINATED)	9,069		143
090210 GREEN TEA IN IMMEDIATE PACKINGS OF <= 3 KG	2,091		
091099 SPICES (EXCL. PEPPER OF THE GENUS PIPER, FRUIT OF	657		
151590 FIXED VEGETABLE FATS AND OILS AND THEIR FRACTIONS,	187		2,176
170490 SUGAR CONFECTIONERY NOT CONTAINING COCOA, INCL.		152	323
180690 CHOCOLATE AND OTHER PREPARATIONS CONTAINING		870	1,548
190430 BULGUR WHEAT IN THE FORM OF WORKED GRAINS,		410	
190490 CEREALS (EXCL. MAIZE [CORN]) IN GRAIN OR FLAKE FORM		4,443	
190590 BREAD, PASTRY, CAKES, BISCUITS AND OTHER BAKERS')		566	1
200110 CUCUMBERS AND GHERKINS, PREPARED OR PRESERVED	6,246		487
200190 VEGETABLES, FRUIT, NUTS AND OTHER EDIBLE PARTS OF	110,773		4,813
200210 TOMATOES, WHOLE OR IN PIECES, PREPARED OR	4,267		87
200290 TOMATOES, PREPARED OR PRESERVED OTHERWISE THAN	7,401		173
200510 HOMOGENISED VEGETABLES PUT UP FOR RETAIL SALE AS	11,381		
200559 UNSHELLED BEANS 'VIGNA SPP., PHASEOLUS SPP.',	436		
200599 VEGETABLES AND MIXTURES OF VEGETABLES, PREPARED	146,531		5,485
200710 HOMOGENISED PREPARATIONS OF JAMS, JELLIES,		3,443	211
200799 JAMS, JELLIES, MARMALADES, PURÉES OR PASTES OF	100,131	45,162	63,402
200819 NUTS AND OTHER SEEDS, INCL. MIXTURES, PREPARED OR	11,239		23,796
200830 CITRUS FRUIT, PREPARED OR PRESERVED, WHETHER OR.	1,354		
200840 PEARS, PREPARED OR PRESERVED, WHETHER OR NOT	2,040		250
200850 APRICOTS, PREPARED OR PRESERVED, WHETHER OR NOT	158,289	79	1,730
200860 CHERRIES, PREPARED OR PRESERVED, WHETHER OR NOT	33,746		5,889
200870 PEACHES, INCL. NECTARINES, PREPARED OR PRESERVED,	11,343		485
200880 STRAWBERRIES, PREPARED OR PRESERVED, WHETHER	1,080		236
200893 CRANBERRIES "VACCINIUM MACROCARPON, VACCINIUM	593		74
200897 MIXTURES OF FRUITS, NUTS AND OTHER EDIBLE PARTS OF	1,360		499
200899 FRUIT AND OTHER EDIBLE PARTS OF PLANTS, PREPARED	132,178		40,055
200921 GRAPEFRUIT JUICE, UNFERMENTED, BRIX VALUE <= 20 AT	122		1
200941 PINEAPPLE JUICE, UNFERMENTED, BRIX VALUE <= 20 AT	168		1

Table A1.7 Armenia's exports to the EU by trade regime (average 2015-17 in EUR thousands) (continued)

PERIOD	Average 2015-2017		
	GSP ZERO	GSP NON ZERO	MFN NON ZERO
200950 TOMATO JUICE, UNFERMENTED, WHETHER OR NOT	6,723		1,141
200971 APPLE JUICE, UNFERMENTED, BRIX VALUE <= 20 AT 20°C,	1,293		545
200989 JUICE OF FRUIT OR VEGETABLES, UNFERMENTED,	144,129		1,445
200990 MIXTURES OF FRUIT JUICES, INCL. GRAPE MUST, AND	22,938		2,678
210320 TOMATO KETCHUP AND OTHER TOMATO SAUCES	1,324		1,223
210390 PREPARATIONS FOR SAUCES AND PREPARED SAUCES;	27,250		2,093
210690 FOOD PREPARATIONS, N.E.S.	2,951	2,163	4,543
220210 WATERS, INCL. MINERAL AND AERATED, WITH ADDED	136,522		2,684
220290 NON-ALCOHOLIC BEVERAGES (EXCL. WATER, FRUIT OR	74,213		553
220299 NON-ALCOHOLIC BEVERAGES (EXCL. WATER, FRUIT OR	42,893	7,705	
220430 GRAPE MUST, OF AN ACTUAL ALCOHOLIC STRENGTH OF >		243	213
220600 CIDER, PERRY, MEAD AND OTHER FERMENTED	614,253		60,793
240210 CIGARS, CHEROOTS AND CIGARILLOS CONTAINING	1,384		
240220 CIGARETTES, CONTAINING TOBACCO			5,949
290319 SATURATED CHLORINATED DERIVATIVES OF ACYCLIC	822		821
290389 HALOGENATED DERIVATIVES OF CYCLANIC, CYCLENIC OR	1,517		
291090 EPOXIDES, EPOXYALCOHOLS, EPOXYPHENOLS AND	7,638		
291229 CYCLIC ALDEHYDES, WITHOUT OTHER OXYGEN FUNCTION	1,408		
291300 HALOGENATED, SULPHONATED, NITRATED OR	3,561		
291429 CYCLANIC, CYCLENIC OR CYCLOTERPENIC KETONES,	1,010		
291450 KETONE-PHENOLS AND KETONES WITH OTHER OXYGEN	1,198		
291540 MONO- DI- OR TRICHLOROACETIC ACIDS, THEIR SALTS	2,252		
291590 SATURATED ACYCLIC MONOCARBOXYLIC ACIDS, THEIR	2,589		
291619 UNSATURATED ACYCLIC MONOCARBOXYLIC ACIDS, THEIR	4,495		
291639 AROMATIC MONOCARBOXYLIC ACIDS, THEIR ANHYDRIDES,	1,561		978
291719 ACYCLIC POLYCARBOXYLIC ACIDS, THEIR ANHYDRIDES,	823		1,464
292090 ESTERS OF OTHER INORGANIC ACIDS OF NON-METALS	956		
292151 O-PHENYLENEDIAMINE, M-PHENYLENEDIAMINE, P-	1,303		
292249 AMINO-ACIDS AND THEIR ESTERS; SALTS THEREOF (EXCL.	2,319		3,920
292250 AMINO-ALCOHOL-PHENOLS, AMINO-ACID-PHENOLS AND	3,341		
292419 ACYCLIC AMIDES, INCL. ACYCLIC CARBAMATES, AND THEIR	2,218		883
292421 UREINES AND THEIR DERIVATIVES; SALTS THEREOF	453		
292529 IMINES AND THEIR DERIVATIVES; SALTS THEREOF (EXCL.	2,308		
292690 NITRILE-FUNCTION COMPOUNDS (EXCL. ACRYLONITRILE,	4,070		2,202
293090 ORGANO-SULPHUR COMPOUNDS (EXCL.	13,192		9,304
293299 HETEROCYCLIC COMPOUNDS WITH OXYGEN HETERO-	3,284		
293339 HETEROCYCLIC COMPOUNDS WITH NITROGEN HETERO-	1,405		601
293349 HETEROCYCLIC COMPOUNDS WITH NITROGEN HETERO-	2,793		
293359 HETEROCYCLIC COMPOUNDS WITH NITROGEN HETERO-	1,008		
293399 HETEROCYCLIC COMPOUNDS WITH NITROGEN HETERO-	3,220		1,502
320910 PAINTS AND VARNISHES, INCL. ENAMELS AND LACQUERS,	17,696		2,183
382490 CHEMICAL PRODUCTS AND PREPARATIONS OF THE	101,875		

Table A1.7 Armenia's exports to the EU by trade regime (average 2015-17 in EUR thousands) (continued)

PERIOD	Average 2015-2017		
	GSP ZERO	GSP NON ZERO	MFN NON ZERO
382499 CHEMICAL PRODUCTS AND PREPARATIONS OF THE	172,210		17,092
390512 POLY'VINYL ACETATE', IN AQUEOUS DISPERSION	202		
390760 POLY"ETHYLENE TEREPHTHALATE", IN PRIMARY FORMS	117,100		
392330 CARBOYS, BOTTLES, FLASKS AND SIMILAR ARTICLES FOR	1,681		10
440799 WOOD, SAWN OR CHIPPED LENGTHWISE, SLICED OR	38,572		5,499
540741 WOVEN FABRICS OF YARN CONTAINING >= 85% BY WEIGHT	4,015		2,924
540742 WOVEN FABRICS OF FILAMENT YARN CONTAINING >= 85%	1,002		1,695
560122 WADDING OF MAN-MADE FIBRES AND ARTICLES THEREOF	68,712		20,073
610431 WOMEN'S OR GIRLS' JACKETS AND BLAZERS OF WOOL OR	3,934		1,404
610462 WOMEN'S OR GIRLS' TROUSERS, BIB AND BRACE	79,990		2
610510 MEN'S OR BOYS' SHIRTS OF COTTON, KNITTED OR	6,329		1,665
610821 WOMEN'S OR GIRLS' BRIEFS AND PANTIES OF COTTON,	32,535		
610822 WOMEN'S OR GIRLS' BRIEFS AND PANTIES OF MAN-MADE	8,487		
610910 T-SHIRTS, SINGLETs AND OTHER VESTS OF COTTON,	53,781		3,142
610990 T-SHIRTS, SINGLETs AND OTHER VESTS OF TEXTILE	12,722		188
611011 JERSEYS, PULLOVERS, CARDIGANS, WAISTCOATS AND	53,658		25,489
611020 JERSEYS, PULLOVERS, CARDIGANS, WAISTCOATS AND	19,258		76
611120 BABIES' GARMENTS AND CLOTHING ACCESSORIES OF	39,879		53
611594 FULL-LENGTH OR KNEE-LENGTH STOCKINGS, SOCKS AND	28,811		6,801
611790 PARTS OF GARMENTS OR CLOTHING ACCESSORIES,	8,028		2,117
620112 MEN'S OR BOYS' OVERCOATS, RAINCOATS, CAR COATS,	2,076		
620113 MEN'S OR BOYS' OVERCOATS, RAINCOATS, CAR COATS,	110,363		21,577
620193 MEN'S OR BOYS' ANORAKS, WINDCHEATERS, WIND	152,893		83,104
620213 WOMEN'S OR GIRLS' OVERCOATS, RAINCOATS, CAR	54,109		24,684
620293 WOMEN'S OR GIRLS' ANORAKS, WINDCHEATERS, WIND	72,869		252,495
620332 MEN'S OR BOYS' JACKETS AND BLAZERS OF COTTON	70,990		2,899
620333 MEN'S OR BOYS' JACKETS AND BLAZERS OF SYNTHETIC	23,217		1,141
620342 MEN'S OR BOYS' TROUSERS, BIB AND BRACE OVERALLS,	7,018		1,601
620343 MEN'S OR BOYS' TROUSERS, BIB AND BRACE OVERALLS,	117,283		8,306
620930 BABIES' GARMENTS AND CLOTHING ACCESSORIES OF	2,408		
620990 BABIES' GARMENTS AND CLOTHING ACCESSORIES OF	11,459		463
621132 MEN'S OR BOYS' TRACKSUITS AND OTHER GARMENTS,	212,518		2,434
621133 MEN'S OR BOYS' TRACKSUITS AND OTHER GARMENTS,	172,741		7,167
621143 WOMEN'S OR GIRLS' TRACKSUITS AND OTHER GARMENTS	8,195		539
621210 BRASSIERES OF ALL TYPES OF TEXTILE MATERIALS,	33,650		486
621290 CORSETS, BRACES, GARTERS, SUSPENDERS AND SIMILAR	4,720		
630120 BLANKETS AND TRAVELLING RUGS OF WOOL OR FINE	867		
630491 ARTICLES FOR INTERIOR FURNISHING, KNITTED OR	1,194		
630499 ARTICLES FOR INTERIOR FURNISHING, OF TEXTILE	15,190		1,508
630790 MADE-UP ARTICLES OF TEXTILE MATERIALS, INCL. DRESS	58,583		20,735
640391 FOOTWEAR WITH OUTER SOLES OF RUBBER, PLASTICS OR	2,011		602
640399 FOOTWEAR WITH OUTER SOLES OF RUBBER, PLASTICS OR	28,602		5,430

Table A1.7 Armenia's exports to the EU by trade regime (average 2015-17 in EUR thousands) (continued)

PERIOD	Average 2015-2017		
	GSP ZERO	GSP NON ZERO	MFN NON ZERO
640690 PARTS OF FOOTWEAR; REMOVABLE IN-SOLES, HEEL	6,398		151
650500 HATS AND OTHER HEADGEAR, KNITTED OR CROCHETED,	131		1,479
680221 MARBLE, TRAVERTINE AND ALABASTER ARTICLES	20,040		
680229 MONUMENTAL OR BUILDING STONE AND ARTICLES	10,959		16,130
680291 MARBLE, TRAVERTINE AND ALABASTER, IN ANY FORM,	103,657		54,184
680292 CALCAREOUS STONE, IN ANY FORM, POLISHED,	14,059		517
680293 GRANITE, IN ANY FORM, POLISHED, DECORATED OR	123		3,610
680299 MONUMENTAL OR BUILDING STONE, IN ANY FORM,	140,401		27,844
680919 BOARDS, SHEETS, PANELS, TILES AND SIMILAR ARTICLES,	1,068		
691200 TABLEWARE, KITCHENWARE, OTHER HOUSEHOLD	22,110		17,860
691490 CERAMIC ARTICLES, N.E.S. (EXCL. OF PORCELAIN OR	13,052		5,931
701090 CARBOYS, BOTTLES, FLASKS, JARS, POTS, PHIALS AND	45,710		21,985
711311 ARTICLES OF JEWELLERY AND PARTS THEREOF, OF	58,429		4,448
711319 ARTICLES OF JEWELLERY AND PARTS THEREOF, OF	60,852		36,034
711620 ARTICLES OF PRECIOUS OR SEMI-PRECIOUS STONES	3,624		3,911
720270 FERRO-MOLYBDENUM	59,981,292		3,992,195
760711 ALUMINIUM FOIL, NOT BACKED, ROLLED BUT NOT	48,426,601		492,175
760719 ALUMINIUM FOIL, NOT BACKED, ROLLED AND FURTHER	152,912		543
821599 SPOONS, FORKS, LADLES, SKIMMERS, CAKE-SERVERS,	121		2,049
841350 RECIPROCATING POSITIVE DISPLACEMENT PUMPS FOR	9,907		2,770
846420 GRINDING OR POLISHING MACHINES, FOR WORKING	495		
848071 INJECTION OR COMPRESSION-TYPE MOULDS FOR RUBBER	9,049		533
848340 GEARS AND GEARING FOR MACHINERY (EXCL. TOOTHED	49,500		566
852910 AERIALS AND AERIAL REFLECTORS OF ALL KINDS; PARTS	102,296		
853620 AUTOMATIC CIRCUIT BREAKERS FOR A VOLTAGE <= 1.000	16,105		27,362
853630 APPARATUS FOR PROTECTING ELECTRICAL CIRCUITS FOR	37,469		16,440
853690 ELECTRICAL APPARATUS FOR SWITCHING ELECTRICAL	2,873		1,102
900190 LENSES, PRISMS, MIRRORS AND OTHER OPTICAL	3,752		373,123
903110 MACHINES FOR BALANCING MECHANICAL PARTS	455		1,377
903210 THERMOSTATS	399,070		312,483
940340 WOODEN FURNITURE FOR KITCHENS (EXCL. SEATS)	24,458		
TOTAL	113,840,314	52,864	8,481,053

Source: EU Comext

Table A1.8 EU's top 20 exports to Armenia (USD thousand)

Products	Imports (USD thousand)				Imports from EU as share of total imports			
	1997	2003	2013	2017	1997	2003	2013	2017
271000 Petroleum oils	2,180	8,085	157,821	64,630	2%	82%	46%	27%
300490 Medicaments; consisting of mixed or unmixed	5,519	7,764	57,123	59,257	25%	24%	61%	40%
940600 Prefabricated buildings.	297	3	2,929	29,583	25%	17%	70%	89%
481091 Other paper and paperboard			11,180	13,863	0%	0%	88%	79%
710239 Diamonds; Non-industrial	103	20,247	18,376	12,357	9%	67%	24%	14%
230990 Dog or cat foods	2	2,774	19,012	11,370	9%	74%	91%	78%
847810 Machinery		1,320	9,575	10,746		99%	100%	100%
843139 Of machinery of heading		15	59	9,759	0%	43%	23%	91%
870323 Other vehicles, with spark-ignition	488	1,698	8,246	9,159	9%	8%	23%	33%
841199 Turbines				8,104		0%		38%
180690 Chocolate and other food preparations...	1,589	841	9,089	7,874	64%	21%	34%	32%
481840 Sanitary towels and tampons	85	220	12,149	7,580	14%	14%	78%	60%
330300 Perfumes and toilet waters.	72	834	6,595	7,510	20%	67%	84%	82%
842952 Mechanical shovels			2,580	6,592		0%	35%	31%
840310 Boilers	51	1,523	4,272	6,568	100%	72%	82%	69%
847420 Crushing or grinding machines	3		1,310	6,209	38%	0%	3%	76%
300230 Vaccines for veterinary medicine		28	789	6,050	0%	6%	38%	81%
730890 Iron or steel; structures and parts	497	276	2,208	5,832	9%	41%	33%	24%
130219 Vegetable saps	1,584	1,856	5,480	5,725	98%	100%	100%	100%
330499 Cosmetic and toilet preparation	108	659	4,523	5,652	30%	42%	67%	59%

Source: Calculations based on UN Comtrade data

Table A1.9 Armenia's top 20 exports to the EAEU

Product	Exports to EAEU (thousand USD)				Exports to EAEU as share of total exports			
	1997	2003	2013	2017	1997	2003	2013	2017
220820 Spirits obtained by distilling grapes	17,568	51,270	160,639	179,362	94.6%	90.2%	88.6%	89.9%
940540 Other electric lamps	133	-	171	35,627	100.0%	0.0%	67.4%	100.0%
710239 Diamonds, Non-industrial	1,077	-	34,131	26,187	2.4%	0.0%	77.8%	94.0%
70200 Tomatoes, fresh or chilled.	-	-	563	13,441			100.0%	100.0%
030211 Salmonidae, excluding livers	-	35	5,417	11,143		99.4%	99.7%	100.0%
040690 Cheese; Other cheese	-	858	3,591	9,593		84.0%	99.2%	99.4%
060310 Flowers, cut; Fresh	2	2	1,941	8,355	100.0%	100.0%	94.2%	95.3%
220421 Other wine; grape must with ferment	179	157	3,355	7,924	69.4%	56.5%	81.8%	80.9%
711290 Metals, waste and scrap of precious metals;	-	-	-	7,820	0.0%		0.0%	98.9%
180690 Chocolate and other food preparations	-	5	77	7,110		5.0%	5.1%	70.8%
300230 Vaccines for veterinary medicine	-	-	-	6,699	0.0%	0.0%		82.2%
220600 Other fermented beverages (for exam	-	35	2,203	5,945		44.1%	58.6%	76.0%
620193 Anoraks, men's or boys'	-	-	22	5,906	0.0%	0.0%	1.3%	99.7%
200590 Other vegetables and mixtures	-	39	2,115	5,599		7.9%	81.2%	83.7%
30269 Other fish, excluding livers and	-	-	11,335	5,540		0.0%	99.7%	99.9%
720270 Ferro-molybdenum	-	-	-	5,352	0.0%	0.0%	0.0%	6.3%
220110 Mineral waters and aerated waters	89	394	5,443	5,238	46.0%	43.9%	89.9%	80.5%
240220 Cigarettes containing tobacco	-	643	3,334	5,143		31.8%	4.9%	2.2%
300490 Medicaments; Other	669	424	1,337	5,029	84.1%	52.3%	27.7%	52.2%
620342 Trousers, bib and brace	37	-	-	4,343	100.0%		0.0%	99.3%

Source: Calculations based on UN Comtrade data

Table A1.10 Simple average MFN tariffs applied by Armenia and the Russian Federation

Products	2014			2015			2016		
	ARMENIA	RUSSIA	DIFF.	ARMENIA	RUSSIA	DIFF.	ARMENIA	RUSSIA	DIFF.
01 LIVE ANIMALS	-	2.70	-2.70	2.70	2.70	-	2.70	2.70	-
02 MEAT AND EDIBLE MEAT OFFAL	10.00	20.68	-10.68	12.46	20.68	-8.22	15.56	20.68	-5.12
03 FISH AND CRUSTACEANS, MOLLUSCS AND OTHER AQUATIC INVERTEBRATES	10.00	8.36	1.64	7.16	7.16	-	6.29	6.33	-0.04
04 DAIRY PRODUCE; BIRDS' EGGS; NATURAL HONEY; EDIBLE PRODUCTS OF ANIMAL	9.69	14.76	-5.07	12.71	13.94	-1.23	12.22	13.17	-0.95
05 PRODUCTS OF ANIMAL ORIGIN, NOT ELSEWHERE SPECIFIED OR INCLUDED	10.00	8.29	1.71	8.25	8.12	0.13	8.10	8.21	-0.11
06 LIVE TREES AND OTHER PLANTS; BULBS, ROOTS AND THE LIKE; CUT FLOWERS	9.06	9.05	0.01	7.17	7.17	-	5.33	5.41	-0.07
07 EDIBLE VEGETABLES AND CERTAIN ROOTS AND TUBERS	9.70	13.61	-3.91	12.19	12.38	-0.18	11.32	11.50	-0.18
08 EDIBLE FRUIT AND NUTS; PEEL OF CITRUS FRUIT OR MELONS	10.00	5.33	4.67	6.03	5.00	1.03	5.95	4.91	1.03
09 COFFEE, TEA, MATE AND SPICES	10.00	4.09	5.91	4.30	3.91	0.38	4.30	3.97	0.33
10 CEREALS	-	5.77	-5.77	3.84	5.68	-1.83	3.80	5.57	-1.78
11 PRODUCTS OF THE MILLING INDUSTRY; MALT; STARCHES; INULIN; WHEAT	6.67	9.61	-2.95	7.74	9.54	-1.80	7.63	9.42	-1.79
12 OIL SEEDS AND OLEAGINOUS FRUITS; MISCELLANEOUS GRAINS, SEEDS AND FRU	0.21	3.90	-3.69	3.81	3.85	-0.04	3.81	3.86	-0.05
13 LAC; GUMS, RESINS AND OTHER VEGETABLE SAPS AND EXTRACTS	8.00	5.00	3.00	5.00	5.00	-	5.00	5.00	-
14 VEGETABLE PLAITING MATERIALS; VEGETABLE PRODUCTS NOT ELSEWHERE	-	11.55	-11.55	10.85	10.85	-	10.10	10.10	-
15 ANIMAL OR VEGETABLE FATS AND OILS AND THEIR CLEAVAGE PRODUCTS;	9.90	9.53	0.36	9.10	9.19	-0.10	8.76	8.78	-0.02
16 PREPARATIONS OF MEAT, OF FISH OR OF CRUSTACEANS, MOLLUSCS OR OTHER	10.00	12.86	-2.86	11.76	11.82	-0.06	10.79	10.85	-0.06
17 SUGARS AND SUGAR CONFECTIONERY	8.24	5.76	2.48	5.38	5.61	-0.23	5.23	5.45	-0.23
18 COCOA AND COCOA PREPARATIONS	9.09	4.85	4.24	4.82	4.82	-	4.80	4.80	-
19 PREPARATIONS OF CEREALS, FLOUR, STARCH OR MILK; PASTRYCOOKS'	7.89	12.18	-4.29	10.60	11.23	-0.63	10.06	10.69	-0.63
20 PREPARATIONS OF VEGETABLES, FRUIT, NUTS OR OTHER PARTS OF PLANTS	10.00	8.13	1.87	7.42	7.31	0.11	6.63	6.67	-0.04
21 MISCELLANEOUS EDIBLE PREPARATIONS	8.13	13.16	-5.03	11.14	11.67	-0.53	10.13	10.63	-0.49
22 BEVERAGES, SPIRITS AND VINEGAR	10.00	15.53	-5.53	13.91	13.91	-	12.42	12.42	-
23 RESIDUES AND WASTE FROM THE FOOD INDUSTRIES; PREPARED ANIMAL	0.43	4.05	-3.61	3.85	3.97	-0.12	3.85	3.98	-0.13
24 TOBACCO AND MANUFACTURED TOBACCO SUBSTITUTES	3.00	11.13	-8.13	9.53	11.34	-1.81	9.05	10.19	-1.14
25 SALT; SULPHUR; EARTHS AND STONE; PLASTERING MATERIALS, LIME AND CEME	2.24	4.66	-2.43	4.22	4.57	-0.35	4.15	4.66	-0.51
26 ORES, SLAG AND ASH	-	3.28	-3.28	3.28	3.24	0.04	3.24	3.24	-
27 MINERAL FUELS, MINERAL OILS AND PRODUCTS OF THEIR DISTILLATION;	-	4.40	-4.40	4.16	4.37	-0.21	4.16	4.38	-0.21
28 INORGANIC CHEMICALS; ORGANIC OR INORGANIC COMPOUNDS OF PRECIOUS	-	5.06	-5.06	3.81	4.92	-1.11	3.69	4.92	-1.23
29 ORGANIC CHEMICALS	-	4.40	-4.40	3.86	4.26	-0.40	3.82	4.25	-0.43
30 PHARMACEUTICAL PRODUCTS	-	5.78	-5.78	1.72	4.69	-2.97	1.55	3.66	-2.11
31 FERTILISERS	-	8.17	-8.17	2.06	6.58	-4.52	2.01	6.29	-4.29
32 TANNING OR DYEING EXTRACTS; TANNINS AND THEIR DERIVATIVES; DYES,	-	4.05	-4.05	3.56	3.96	-0.39	3.43	3.90	-0.48
33 ESSENTIAL OILS AND RESINOIDS; PERFUMERY, COSMETIC OR TOILET	-	9.91	-9.91	7.76	8.48	-0.72	6.50	7.10	-0.59

Table A1.10 Simple average MFN tariffs applied by Armenia and the Russian Federation (continued)

Products	2014			2015			2016		
	ARMENIA	RUSSIA	DIFF.	ARMENIA	RUSSIA	DIFF.	ARMENIA	RUSSIA	DIFF.
34 SOAP, ORGANIC SURFACE-ACTIVE AGENTS, WASHING PREPARATIONS,	-	11.03	- 11.03	5.08	9.58	- 4.50	4.40	8.12	- 3.72
35 ALBUMINOIDAL SUBSTANCES; MODIFIED STARCHES; GLUES; ENZYMES	-	4.79	- 4.79	3.93	4.79	- 0.86	3.93	4.79	- 0.86
36 EXPLOSIVES; PYROTECHNIC PRODUCTS; MATCHES; PYROPHORIC ALLOYS;	-	17.00	- 17.00	14.84	14.84	-	12.78	12.78	-
37 PHOTOGRAPHIC OR CINEMATOGRAPHIC GOODS	-	5.91	- 5.91	5.82	5.82	-	5.44	5.60	- 0.16
38 MISCELLANEOUS CHEMICAL PRODUCTS	-	5.37	- 5.37	4.79	5.19	- 0.40	4.56	5.02	- 0.46
39 PLASTICS AND ARTICLES THEREOF	2.38	8.70	- 6.32	6.20	7.52	- 1.31	5.32	6.54	- 1.22
40 RUBBER AND ARTICLES THEREOF	9.41	5.97	3.45	5.53	5.58	- 0.06	5.54	5.52	0.02
41 RAW HIDES AND SKINS (OTHER THAN FURSKINS) AND LEATHER	-	3.19	- 3.19	2.73	3.14	- 0.41	2.73	3.14	- 0.41
42 ARTICLES OF LEATHER; SADDLERY AND HARNESS; TRAVEL GOODS, HANDBAGS	10.00	15.08	- 5.08	13.98	13.98	-	12.58	12.58	-
43 FURSKINS AND ARTIFICIAL FUR; MANUFACTURES THEREOF	2.50	7.28	- 4.78	6.07	6.07	-	5.36	5.36	-
44 WOOD AND ARTICLES OF WOOD; WOOD CHARCOAL	-	13.22	- 13.22	10.36	11.08	- 0.71	8.85	9.47	- 0.62
45 CORK AND ARTICLES OF CORK	10.00	5.00	5.00	5.00	5.00	-	5.00	5.00	-
46 MANUFACTURES OF STRAW, OF ESPARTO OR OF OTHER PLAITING MATERIALS;	10.00	15.00	- 5.00	14.61	14.61	-	11.92	11.92	-
47 PULP OF WOOD OR OF OTHER FIBROUS CELLULOSIC MATERIAL; RECOVERED	-	7.26	- 7.26	7.44	7.26	0.18	7.27	7.27	-
48 PAPER AND PAPERBOARD; ARTICLES OF PAPER PULP; OF PAPER OR OF	1.09	11.25	- 10.17	9.68	9.96	- 0.28	8.21	8.80	- 0.59
49 PRINTED BOOKS, NEWSPAPERS, PICTURES AND OTHER PRODUCTS OF THE	0.53	4.50	- 3.97	3.67	3.67	-	3.10	3.10	-
50 SILK	3.33	4.56	- 1.22	4.25	4.25	-	4.25	4.25	-
51 WOOL, FINE OR COARSE ANIMAL HAIR; HORSEHAIR YARN AND WOVEN FABRIC	-	7.48	- 7.48	4.65	6.80	- 2.15	4.52	6.39	- 1.87
52 COTTON	-	9.51	- 9.51	6.15	8.15	- 2.00	5.82	7.74	- 1.92
53 OTHER VEGETABLE TEXTILE FIBRES; PAPER YARN AND WOVEN FABRICS OF	-	7.96	- 7.96	7.65	7.65	-	7.48	7.48	-
54 MAN-MADE FILAMENTS; STRIP AND THE LIKE OF MAN-MADE TEXTILE MATERIALS	-	8.15	- 8.15	6.44	7.24	- 0.80	5.59	6.37	- 0.79
55 MAN-MADE STAPLE FIBRES	-	7.42	- 7.42	5.77	7.14	- 1.36	5.78	7.18	- 1.40
56 WADDING, FELT AND NONWOVENS; SPECIAL YARNS; TWINE, CORDAGE, ROPES	-	7.96	- 7.96	7.40	7.56	- 0.17	6.99	7.15	- 0.17
57 CARPETS AND OTHER TEXTILE FLOOR COVERINGS	10.00		10.00			-			-
58 SPECIAL WOVEN FABRICS; TUFTED TEXTILE FABRICS; LACE; TAPESTRIES;	-	14.68	- 14.68	11.54	14.48	- 2.94	10.61	13.32	- 2.71
59 IMPREGNATED, COATED, COVERED OR LAMINATED TEXTILE FABRICS; TEXTILE	0.83	5.40	- 4.57	5.27	5.34	- 0.08	5.21	5.29	- 0.08
60 KNITTED OR CROCHETED FABRICS	-	8.39	- 8.39	5.13	7.25	- 2.12	4.93	7.04	- 2.12
61 ARTICLES OF APPAREL AND CLOTHING ACCESSORIES, KNITTED OR CROCHETED	10.00	14.61	- 4.61	13.60	13.60	-	12.78	12.91	- 0.13
62 ARTICLES OF APPAREL AND CLOTHING ACCESSORIES, NOT KNITTED OR	10.00	17.68	- 7.68	16.13	16.13	-	14.63	14.63	-
63 OTHER MADE UP TEXTILE ARTICLES; SETS; WORN CLOTHING AND WORN TEXTILE	10.00	14.52	- 4.52	13.18	13.58	- 0.40	12.40	12.70	- 0.30
64 FOOTWEAR, GAITERS AND THE LIKE; PARTS OF SUCH ARTICLES	10.00	1.25	8.75	1.25	1.25	-	-	-	-
65 HEADGEAR AND PARTS THEREOF	10.00	10.89	- 0.89	10.78	10.78	-	10.68	10.68	-
66 UMBRELLAS, SUN UMBRELLAS, WALKING-STICKS, SEAT-STICKS, WHIPS, RIDING-	10.00	15.00	- 5.00	15.00	15.00	-	15.00	15.00	-

Table A1.10 Simple average MFN tariffs applied by Armenia and the Russian Federation (continued)

Products	2014			2015			2016		
	ARMENIA	RUSSIA	DIFF.	ARMENIA	RUSSIA	DIFF.	ARMENIA	RUSSIA	DIFF.
67 PREPARED FEATHERS AND DOWN AND ARTICLES MADE OF FEATHERS OR OF	10.00	11.88	- 1.88	11.25	11.25	-	11.25	11.25	-
68 ARTICLES OF STONE, PLASTER, CEMENT, ASBESTOS, MICA OR SIMILAR	10.00	13.25	- 3.25	12.35	12.29	0.06	11.75	11.75	-
69 CERAMIC PRODUCTS	10.00	15.69	- 5.69	13.91	14.31	- 0.40	12.75	13.04	- 0.29
70 GLASS AND GLASSWARE	4.62	12.26	- 7.64	11.54	11.56	- 0.03	10.82	11.01	- 0.19
71 NATURAL OR CULTURED PEARLS, PRECIOUS OR SEMI- PRECIOUS STONES,	3.02	16.91	- 13.89	13.71	15.83	- 2.12	11.57	14.92	- 3.35
72 IRON AND STEEL	-	4.55	- 4.55	4.36	4.55	- 0.19	4.36	4.55	- 0.19
73 ARTICLES OF IRON OR STEEL	1.05	12.09	- 11.04	10.10	10.68	- 0.59	9.15	9.66	- 0.51
74 COPPER AND ARTICLES THEREOF	-	4.78	- 4.78	4.19	4.66	- 0.47	4.19	4.69	- 0.50
75 NICKEL AND ARTICLES THEREOF	-	8.09	- 8.09	7.94	7.94	-	7.62	7.62	-
76 ALUMINIUM AND ARTICLES THEREOF	-	11.06	- 11.06	8.24	10.21	- 1.96	7.68	9.45	- 1.76
78 LEAD AND ARTICLES THEREOF	-	3.98	- 3.98	2.65	3.50	- 0.85	2.65	3.58	- 0.94
79 ZINC AND ARTICLES THEREOF	-	4.06	- 4.06	3.78	3.78	-	3.78	3.78	-
80 TIN AND ARTICLES THEREOF	-	-	-	-	-	-	-	-	-
81 OTHER BASE METALS; CERMENTS; ARTICLES THEREOF	10.00	10.51	- 0.51	9.92	9.60	0.32	9.37	9.51	- 0.13
82 TOOLS, IMPLEMENTS, CUTLERY, SPOONS AND FORKS, OF BASE METAL; PARTS	10.00	8.40	1.60	7.79	7.79	-	7.36	7.36	-
83 MISCELLANEOUS ARTICLES OF BASE METAL	2.22	13.94	- 11.72	12.34	13.23	- 0.89	11.36	12.06	- 0.69
84 NUCLEAR REACTORS, BOILERS, MACHINERY AND MECHANICAL APPLIANCES;	1.60	2.98	- 1.38	2.53	2.77	- 0.24	2.33	2.56	- 0.23
85 ELECTRICAL MACHINERY AND EQUIPMENT AND PARTS THEREOF; SOUND	5.54	6.31	- 0.78	5.12	5.42	- 0.30	4.19	4.49	- 0.30
86 RAILWAY OR TRAMWAY LOCOMOTIVES, ROLLING- STOCK AND PARTS THEREOF;	-	6.93	- 6.93	7.05	6.79	0.26	6.67	6.96	- 0.29
87 VEHICLES OTHER THAN RAILWAY OR TRAMWAY ROLLING- STOCK, AND PARTS	5.45	7.59	- 2.14	6.45	7.17	- 0.72	6.19	6.91	- 0.72
88 AIRCRAFT, SPACECRAFT, AND PARTS THEREOF	-	12.20	- 12.20	11.67	11.28	0.39	9.98	10.69	- 0.71
89 SHIPS, BOATS AND FLOATING STRUCTURES	2.22	10.24	- 8.02	9.76	9.39	0.37	8.73	9.43	- 0.69
90 OPTICAL, PHOTOGRAPHIC, CINEMATOGRAPHIC, MEASURING, CHECKING,	0.76	4.79	- 4.04	4.35	4.40	- 0.05	4.02	4.11	- 0.08
91 CLOCKS AND WATCHES AND PARTS THEREOF	5.71	11.74	- 6.03	8.75	10.81	- 2.06	7.61	10.32	- 2.71
92 MUSICAL INSTRUMENTS; PARTS AND ACCESSORIES OF SUCH ARTICLES	-	6.53	- 6.53	6.30	6.38	- 0.08	6.10	6.10	-
93 ARMS AND AMMUNITION; PARTS AND ACCESSORIES THEREOF	-	18.89	- 18.89	17.79	17.78	0.01	16.37	16.69	- 0.31
94 FURNITURE; BEDDING, MATTRESSES, MATTRESS SUPPORTS, CUSHIONS AND	9.23	9.49	- 0.26	8.62	8.71	- 0.09	7.89	7.95	- 0.06
95 TOYS, GAMES AND SPORTS REQUISITES; PARTS AND ACCESSORIES THEREOF	8.71	10.87	- 2.16	9.80	9.80	0.00	8.68	8.68	-
96 MISCELLANEOUS MANUFACTURED ARTICLES	10.00	14.21	- 4.21	13.92	14.14	- 0.21	13.26	13.43	- 0.17
AVERAGE			-5.21			-0.42			-0.50

Source: Calculations based on WTO Integrated Database notifications

Annex 2. Surveyed Enterprises Manufacturing and Trade Activities

Table A2.1 List of products manufactured by male-owned enterprises

<i>Product</i>	<i>Final</i>	<i>Semi-Final</i>
Adhesive Plaster	✓	
Aluminium Alloy Ingots		✓
Apricot Dried Fruit	✓	
Baklava Dessert	✓	
Berry Vodka	✓	
Butter	✓	
Canned Olives	✓	
Canned Vegetables	✓	
Caviar	✓	
Cheese	✓	
Children's Pyjamas	✓	
Chocolate Boxes	✓	
Cognac	✓	
Cognac Vodka		✓
Concentrated Apricot Puree		✓
Concrete Blocks	✓	
Corn Remover	✓	
Cucumber Marinade	✓	
Disposable Plastic Glasses	✓	
Disposable Plastic Tray	✓	
Dolma	✓	
Dried Fruits	✓	
Dried Peach	✓	
Dried Plum	✓	
Drink Containing Juice	✓	
Dry Mixes	✓	
Fan Coil Thermostat		
Fruit Jam	✓	
Fruit Juices and Nectars	✓	
Fruit Preserves	✓	
Fruit Puree		✓
Fruit Vodka	✓	
Glass Bottles and Jars	✓	
GSP And GPRS Position Trackers	✓	
Heating Thermostat		
Inner Soles for Shoes		✓
Juice (2 Types)	✓	
Juice Nectar	✓	
Live Fish	✓	
Live Siberian Sturgeon	✓	
Live Trout	✓	
Medical Tape	✓	

Table A2.1 List of products manufactured by male-owned enterprises (continued)

<i>Product</i>	<i>Final</i>	<i>Semi-Final</i>
Medication	✓	
Membrane Bag	✓	
Shoes (Men)	✓	
T-Shirts (Men)	✓	
Military Uniform	✓	
Nougat Lokum	✓	
Oil (Butter Oil)	✓	
Paints	✓	
Pyjamas	✓	
Peach Dried Fruit	✓	
Pear Dried Fruit	✓	
Photo Albums	✓	
Plastic Bottles	✓	
Plastic Household Goods	✓	
Plastic Pipes	✓	
Plum Dried Fruit	✓	
Polyethylene Diaphragm	✓	
Pomegranate Dry Wine	✓	
Preserved Fish	✓	
Raw Chocolate for Production		✓
Red Dry Wine	✓	
Red Semi-Sweet Wine	✓	
Robe	✓	
Shorts	✓	
Siberian Sturgeon Caviar	✓	
Soap	✓	
Solid Dosages (Capsules and Tablets)	✓	
Spot Welder	✓	
Stud Welder	✓	
Taximeter	✓	
Tea	✓	
Dried tomato	✓	
T-Shirts (New-borns)	✓	
Underwear	✓	
Vegetable	✓	
Vegetable Preserve	✓	
Vegetable Puree		✓
Wall Touch Panel (Switcher)		
White Dry Wine	✓	
White Semi-Sweet Wine	✓	
Shoes (Women)	✓	
Underwear (Women)	✓	
Wooden Humming Top with Armenian Ornaments	✓	

Table A2.2 Male-owned enterprises' exports by product and destination

<i>Products</i>	<i>Destination</i>
Aluminium scrap	United Arab Emirates
Apricot dried fruit	Russian Federation
Baklava dessert	Russian Federation
Berry vodka	Czech Republic, Kazakhstan, Latvia, Lithuania, Ukraine
Brass scrap	Germany, United Kingdom of Great Britain and Northern Ireland, United States of America
Canned fruit	France
Canned olives	Georgia, Russian Federation
Canned vegetables	United States of America
Caviar	Russian Federation
Cheese	Russian Federation
Chocolate	Belarus, Russian Federation, Sweden
Cognac	Russian Federation, Ukraine
Cognac vodka	Czech Republic, Latvia, Lithuania, Russian Federation
Combined incense pot	United States of America
Computer	Holland, Czech Republic
Copper scrap	Iran (Islamic Republic)
Diesel generator	Congo (Democratic Republic), Kazakhstan
Disposable glasses	Georgia
Dried fruits	Belgium, Russian Federation, Spain
Drilling machine part	Sweden
Drilling pipe demolition tool	Sweden
Drink containing juice	Belarus, Georgia, Germany, Iraq, Kazakhstan, Kuwait, Kyrgyzstan, Lithuania, Qatar, Russian Federation, United Arab Emirates, Ukraine, United States of America
Electrical switchgear	Congo (Democratic Republic)
Exhaust fans	Congo (Democratic Republic), Kazakhstan
Fresh fish	Russian Federation
Frozen Siberian sturgeon	Russian Federation, United States of America
Fruit juice	France
Fruit nectar and juices	Russian Federation
Fruit vodka	Czech Republic, Kazakhstan, Latvia, Lithuania, Ukraine, Lithuania, Ukraine
Glass bottles and jars	Georgia
Hard disc drive	Holland
Juice drink	Belarus, France, Georgia, Germany, Iraq, Kazakhstan, Kuwait, Kyrgyzstan, Lithuania, Qatar, Russian Federation, United Arab Emirates, Ukraine, United States of America
Juice nectar	Belarus, France, Georgia, Germany, Iraq, Kazakhstan, Kuwait, Kyrgyzstan, Lithuania, Qatar, Russian Federation, United Arab Emirates, Ukraine, United States of America
Military uniform	Russian Federation
Milk packaging	Georgia, Russian Federation
Motherboard	Holland
Network Device	Holland, Czech Republic
Nougat lokum	Russian Federation
Plastic bowls	Georgia
Peach dried fruit	Russian Federation
Pear dried fruit	Russian Federation
Plum dried fruit	Russian Federation
Polystyrene for meat packaging	Georgia

Table A2.2 Male-owned enterprises' exports by product and destination (continued)

<i>Products</i>	<i>Destination</i>
Preserved fish	Russian Federation
Pyjamas (children)	Russian Federation
Pyjamas	Canada
Ram random access memory	Holland
Red dry wine	Russian Federation
Red semi-sweet wine	Russian Federation
Robe	Canada
Seasonings	Russian Federation
Servers	Czech Republic, Holland
Shoes (women)	Belgium
Shorts	Canada
Siberian sturgeon caviar	Russian Federation, United States of America
Soap	Russian Federation
Spare parts of mining equipment	Sweden
Spot welder	Malaysia, Russian Federation, United States of America
Steel structure	Congo (Democratic Republic), Kazakhstan
Stud welder	Malaysia, Russian Federation, United States of America
Switch router	Holland
Underwear (children)	Russian Federation
Underwear	Canada
White dry wine	Russian Federation
White semi-sweet wine	Russian Federation
Wine	Lithuania, Poland, Russian Federation
Women's shoes	Russian Federation, United Arab Emirates
Women's underwear (boxers)	Russian Federation
Wooden humming tops with Armenian ornaments	Argentina, Canada, France, Germany, Holland, Spain, United States of America

Table A2.3 Male-owned enterprises' imports by product and source

<i>Product</i>	<i>Country</i>
Aluminium foil	India, Russian Federation
Antifungal preservative	Netherlands
Archive racks	Iran (Islamic Republic), Turkey
Aseptic bags	United Kingdom of Great Britain and Northern Ireland
Automatic doors	Switzerland
Bag sewing machine	Saudi Arabia
Banana concentrate	India
Body care products	Poland
Bread shelves	Russian Federation
Butter	Germany
Buttons	China
Candies	Russian Federation
Car wash detergents	Russian Federation
Cellulose	Belgium
Ceramic tile slabs	China
Chains	China
Chalk	Iran (Islamic Republic)
Charger	United Arab Emirates
Cheese	Germany
Chicken breast	Brazil
Chickpeas	Lebanon
Chocolate bars	France
Coffee	Austria
Compulsation panel	Italy
Computers	Czech Republic, France, Netherlands, United Kingdom of Great Britain and Northern Ireland
Concealers	Russian Federation
Cookies	Russian Federation
Cork (stopples)	Russian Federation
Cotton fabrics	Turkey
Cotton roll	China
Craved cutlery	Portugal
Cream	Germany, Poland
Decorative candles	Italy, Netherlands
Diesel generator	Italy
Dried fish fodder	Netherlands
Dried fish food	Netherlands
Drilling machine part	Sweden
Drilling pipe demolition tool	Sweden
Dry food for pigs	Georgia
Duralite	Italy
Electric drills	China
Electric tools	Russian Federation
Electrodes	China, Germany, Malaysia, Russian Federation
External doors	Italy
External guides	Italy

Table A2.3 Male-owned enterprises' imports by product and source (continued)

<i>Product</i>	<i>Country</i>
Fabrics	Turkey
Fastening parts	China
Ferments	France, Netherlands
Fiberglass (6cm)	Italy
Fishing nets	China
Floor cleanser	Italy
Food refrigerator	Russian Federation
Food supplements	Germany, Russian Federation
Furniture parts (accessories)	Austria, Denmark
Generators	Germany
Glass bottle	Russian Federation
Glass tableware	Germany, Italy
Glassine paper	France
Glued plywood	China
Gold bracelets	Italy
Gold earrings	Italy
Gold pendants	Italy
Gold rings	Italy
Granite tiles	China, India
Gypsum	Iran (Islamic Republic)
Gypsum cardboard tiles	Iran (Islamic Republic)
Hair shampoo	Germany
Heating boilers	France, Germany
Heating pipes	Turkey
Heating radiators	Poland
Hookah coil	Indonesia
Hookah tobacco	Egypt
ITC equipment	China
Jewelry made of semi-precious stones	Italy
Juice	Russian Federation
Juice concentrate	Netherlands
Label	Russian Federation
LCD displays	China
Liquid soap	Italy
Marzipan	Germany
Medicines produced from blood plasma	Ukraine
Medicines, not produced from blood plasma	Ukraine
Metal packaging	France, Italy
Metallic lid	Russian Federation
Mobile phone chargers	Russian Federation
Mobile phones	Russian Federation
Mould	Italy
Monitors	Czech Republic, France, United Kingdom of Great Britain and Northern Ireland

Table A2.3 Male-owned enterprises' imports by product and source (continued)

<i>Product</i>	<i>Country</i>
Mosaic glass tile	China
Mp3 music player	China
Network equipment	Czech Republic, France, Netherlands, United Kingdom of Great Britain and Northern Ireland
Olives	Greece, Spain, Egypt
Orange concentrate	Spain
Packaging	Austria, Poland, Russian Federation
Packaging boxes	China
Packaging material	Russian Federation
Packaging paper tetra pack	Russian Federation
Paints dispersion	Iran (Islamic Republic)
Pyjamas for girls and women	Spain
Parts of computer equipment	Czech Republic, France, Netherlands, United Kingdom of Great Britain and Northern Ireland
Pasta (macaroni)	Russian Federation
Pe roll	China
Perfumes	Russian Federation
Phone charger	United Arab Emirates
Pineapple concentrate	Indonesia
Plaster	China
Plastic cases	China
Plastic price tags	Russian Federation
Plastic syringes	China
Players	China
Polyethylene packaging	England
Polymer raw materials	Iran (Islamic Republic)
Polymeric raw material (polystyrene)	Korea (Republic)
Polypropylene	Iran (Islamic Republic)
Porcelain	Portugal
Pork	Brazil, Canada
Printed circuit board	China
Printers	Czech Republic, France, Netherlands, United Kingdom of Great Britain and Northern Ireland
Printing Inks	Turkey
Production Beef	Brazil
PVC	Russian Federation
Radio Details	China
Raw chocolate for production	Belgium
Reference standard impurities	France, Germany
Resistors	United States of America
Ribbons	China
Rubber yarn	China
Sand	Egypt
Sanitary ware	China
School bags for girls	United Kingdom of Great Britain and Northern Ireland
Scooters micro	Switzerland
Server	Netherlands
Sewing thread	Iran (Islamic Republic)

Table A2.3 Male-owned enterprises' imports by product and source (continued)

<i>Product</i>	<i>Country</i>
Shampoo	Poland
Shank-board for footwear	Italy
Shank steel	Ukraine
Shoe polish	Germany
Shower gel	Italy
Silk roll	China
Silver items	Italy
Soda	Iran (Islamic Republic)
Spare parts for boilers	Korea (Republic)
Spare parts of mining equipment	Sweden
Spare racks	Iran (Islamic Republic), Turkey
Sports shoes for children	United Arab Emirates, Turkey
Sports shoes for men	United Arab Emirates, Turkey
Sports shoes for women	United Arab Emirates, Turkey
Steel structure	Italy
Store furniture	Russian Federation
Tape measures	China
Tea	Austria, Russian Federation, United Arab Emirates
Thread	Turkey
Tomato seeds	Netherlands
Tyres Michelin	Russian Federation
Uninterruptible Power Supplies (UPS)	United Arab Emirates
USB Plug	China
Vehicles BRP	Canada
Vitamin supplements	Russian Federation
Waffles	Russian Federation
Water soluble chlorine tablet	Italy
Welding supplies	China, Germany, Malaysia, Russian Federation
Women leather bags	China
Women leather shoes	China

Table A2.4 List of products manufactured by female-owned enterprises

<i>Product</i>	<i>Final goods</i>	<i>Semi final</i>	<i>Packaging</i>
Alani (pitted dried peaches stuffed with ground walnuts and sugar)	✓		
Anti-aging products	✓		
Apricot seed oil	✓		
Bags	✓		
Baklava	✓		
Bio-liquid in 1 and 10 l bottles	✓		
Brandy	✓		
Cardigans for women	✓		
Chakalakum	✓		
Cheese	✓		
Children's costumes (ensembles)	✓		
Curtains	✓		
Dresses (women and girls)	✓		
Dried apple	✓		
Dried figs	✓		
Dried melon	✓		
Dried peach	✓		
Dried pear	✓		
Dried plum	✓		
Dried raisins	✓		
Dried tomatoes	✓		
Dried walnut	✓		
Face creams	✓		
Face scrubs	✓		
Gata	✓		
Gourmet sweets (nougat, lokum, marzipan)	✓		
Grapes (for wine or for table)	✓		
Grapeseed oil	✓		
Hempseed oil	✓		
Humus	✓		
Jewelry from non-precious materials	✓		
Lavash	✓		
Linseed Oil	✓		
Matsone – non-sweet Armenian yogurt	✓		
Nail care products	✓		
Narine - Armenian fermented milk	✓		
Natural soaps	✓		
Pastry (cakes, desserts)	✓		
Peach seed oil	✓		
Pistachios	✓		
Rapeseed oil	✓		
Roasted almonds	✓		
Roasted nuts	✓		
Roasted peanuts with pepper	✓		

Table A2.4 List of products manufactured by female-owned enterprises (continued)

<i>Product</i>	<i>Final goods</i>	<i>Semi final</i>	<i>Packaging</i>
Roasted peanuts with salt	✓		
Scarves	✓		
Serums	✓		
Shampoo	✓		
Shirts	✓		
Shoes for women	✓		
Silk ensembles for women	✓		
Silver hand-made jewelry	✓		
Skirts	✓		
Soap bars	✓		
Spices	✓		
Suits for women	✓		
Sun-dried tomatoes preserved in oil	✓		
Sunflower oil	✓		
SUPER MIX - mixture of peat, compost, vermicompost, perlite and pumice, packed in 10l bags	✓		
Sweaters	✓		
Sweet sujuk	✓		
Tan (Armenian kefir)	✓		
Trousers	✓		
T-shirts	✓		
Vodka	✓		
Walnut oil	✓		
Whole-grain wheat lavash	✓		
Wine	✓		
Yogurt	✓		
Chia			✓
Coconut oil			✓
Quinoa			✓
Apricot dried fruits (Taparza)	✓		
Dried apricots		✓	
Dried cherries		✓	
Dried cornel		✓	
Dried persimmon		✓	
Essential oils from plants		✓	
Butter	✓		

Table A2.5 Female-owned enterprises' exports by product and destination

<i>Products</i>	<i>Country of destination</i>
Jewellery; of silver, whether or not plated or clad with other precious metal	Russian Federation and China
Women silk ensembles	United States of America
Roasted ground-nuts with salt or pepper	Russian Federation
Baklava	France
Spices	Kazakhstan, Russian Federation, United States of America
Natural soaps	Russian Federation , Switzerland
Dried apricots	Russian Federation
Silver jewelry	United Arab Emirates
Cosmetic products - skin care, cleaner, toner & moisturizer	Georgia, Hong Kong, North Korea, United Kingdom, United States of America
Wine	Belgium, Canada, Germany, Japan, Lithuania, Switzerland, United States of America

Table A2.6 Female-owned enterprises' imports by product and source

<i>Products</i>	<i>Product source</i>
Grape seed oil	United States of America
Lemongrass	Romania
Silk	China, United States of America
Preserves	Germany, Russia
Spices	Iran, Lebanon, Syrian Arab Republic
Herbs	Egypt
Bottles	France
Corks	France
Winery equipment	Italy
Yeast	Italy
Tannin	France, Italy
Textiles	United Arab Emirates, Turkey
Quinoa	Poland
Chia seeds	Poland
Coconut oil	Thailand

Table A2.7 Implementation of regional and international standards (male-owned enterprises)

<i>Manufactured products</i>	<i>Implemented Standards</i>
Berry Vodka, Fruit Vodka, Cognac Vodka, Cognac	EAEU common standards, ISO 22000 (Food safety management system)
Wine	EAEU standards, ISO 22000
Milk packaging, disposable glasses, polystyrene for meet packaging	ISO 9001:2008 (Quality management systems -Requirements)
Cheese	EAEU standard, HACCP-partly implemented, still in progress
Dried Fruits	HACCP, ISO 22000
Frozen Siberian Sturgeon, Siberian Sturgeon Caviar, Siberian Sturgeon Caviar, Frozen Siberian Sturgeon	HACCP
Fruit nectar and juices, canned vegetables	ISO 900,1 ISO 22000, HACCP, Orthodox Union Kosher Certificate
Caviar	ISO 22000
Robes, pyjamas, underwear, shorts	Walmart Standards
Spot Welder, Stud Welder	American standard
Canned Olives	EAEU standards
Glass bottles and jars	EAEU standards

Annex 3. Armenia's System of National Standards

Table A3.1 SARM's participation in ISO and CEN's standard setting activities

Membership	Participation in technical groups/committees
ISO	<p>Technical committees and subcommittees</p> <ul style="list-style-type: none"> – JTC 1- Information technology (P-Member) – JTC 1/SC 2- Coded character sets (O-Member) – JTC 1/SC 17- Cards and personal identification (P-Member) – JTC 1/SC 34- Document description and processing languages (P-Member) – TC 34- Food products (O-Member) – TC 34/SC 3- Fruit and vegetable products (O-Member) – TC 34/SC 5- Milk and milk products (O-Member) – TC 34/SC 6- Meat, poultry, fish, eggs and their products (O-Member) – TC 34/SC 14- Fresh, dry and dried fruits and vegetables (O-Member) – TC 34/SC 15- Coffee (O-Member) – TC 46- Information and documentation (P-Member) – TC 68- Financial services (P-Member) – TC 147- Water quality (O-Member) – TC 147/SC 1- Terminology (O-Member) – TC 147/SC 2- Physical, chemical and biochemical methods (O-Member) – TC 147/SC 4- Microbiological methods (O-Member) – TC 147/SC 5- Biological methods (O-Member) – TC 147/SC 6- Sampling (general methods) (O-Member) – TC 174- Jewelry (O-Member) – TC 176- Quality management and quality assurance (P-Member) – TC 176/SC 2- Quality systems (P-Member) – TC 207- Environmental management (P-Member) – TC 207/SC 1- Environmental management systems (P-Member) – TC 207/SC 2- Environmental auditing and related environmental investigations (P-Member) – TC 207/SC 3- Environmental labelling (P-Member) – TC 207/SC 4- Environmental performance evaluation (P-Member) – TC 207/SC 5- Life cycle assessment (P-Member) – TC 215- Health informatics (P-Member) – TC 216- Footwear (O-Member) – TC 228- Tourism and related services (O-Member) – TC 241- Project Committee: Road-Traffic Safety Management System (P-Member) – TC 243- Project Committee: Consumer product safety (P-Member) – TC 245- Project Committee: Cross-border trade of second-hand goods (P-Member) – TC 250- Project committee: Sustainability in event management (O-Member) <p>Policy development committees</p> <ul style="list-style-type: none"> – CASCO- Committee on conformity assessment (P-Member) – COPOLCO- Committee on consumer policy (O-Member) – DEVCO- Committee on developing countries matters (P-Member)
CEN	<ul style="list-style-type: none"> – TC 164-Watter supply, – TC 234-Gas supply, – TC 340-Anti-seismic devices.

Source: SARM

Table A3.2 Armenia's adoption of European harmonized standards (ENs)

<i>Field</i>	<i>New Approach Directive</i>	<i>Subject of regulation</i>	<i>No. of national harmonized standards</i>
Chemicals	93/15/EEC	Explosives for civil uses	2
	2007/23/EC	Pyrotechnic articles	0
	(EC) 1907/2006	Chemical substances	3
Conformity assessment and management systems	765/2008/EC, 768/2008/EC, (EC) 1221/2009	New legislative framework; Eco-management and audit scheme	6
Construction	89/106/EEC	Construction products	30
Consumers and workers protection	89/686/EEC	Personal protective equipment	6
	2009/48/EC, 88/378/EEC	Toys safety	11
	2001/95/EC	General product safety	65
Electric and electronic engineering	(EC) 1223/2009	Cosmetics	4
	94/9/EC	Equipment for explosive atmospheres	1
	2006/95/EC	Low voltage equipment	3
	2004/108/EC	Electromagnetic compatibility	9
	1999/5/EC	Radio and telecommunications terminal equipment	9
	2011/65/EU	Restriction of the use of certain hazardous substances	1
Healthcare engineering	90/385/EEC	Active implantable medical devices	0
	93/42/EEC	Medical Devices	0
	98/79/EC	In vitro diagnostic medical devices	0
Measuring technology	2004/22/EC	Measuring instruments	4
	2009/23/EC	Non-automatic weighing instruments	0
Mechanical engineering and means of transportation	2009/142/EC	Gas appliances	14
	97/23/EC	Pressure equipment	14
	2000/9/EC	Cableway installations	11
	95/16/EC	Lifts	2
	2006/42/EC	Machinery	0
	2008/57/EC	Interoperability of the rail system	0
	94/25/EC	Recreational craft	0
Services	97/67/EC	Postal services	4
Sustainability	94/62/EC	Packaging and packaging waste	

Table A3.3 Market surveillance Inspection body activity fields

<i>No.</i>	<i>Field</i>
1	Inspection of detergents and surfactants containing surface-active agents and surface-active agents
2	Pneumatic tire inspection
3	Testing of paints and varnishes with synthetic raw materials
4	Examination of mineral fertilizers
5	Safe glass used in ground vehicles
6	Testing of polymeric and polymeric products with foodstuffs
7	Testing of Radio Equipment and Telecommunication Endpoint Equipment
8	Testing of steel products for concrete reinforcement
9	Cement Testing
10	Inspection of goods from household and sanitary-hygienic paper and chemical wire
11	Installation of gas-cylinder equipment for motor vehicles for working with compressed natural or liquefied petroleum gas and periodic cylinders certification
12	Testing for minimal requirements for the construction and operation of ACF
13	Checking Ceramic Tableware
14	Checking the conditions and requirements of assaying and hallmarking of items made of precious metals
15	Check retailers for precious metals
16	Examination of requirements for lubricants, oils and special liquids (hereinafter referred to as products), for lubricants, oils and special liquids (hereinafter referred to as products)
17	Construction Glass Inspection
18	Testing of 1000 V Electrical Switchgear Electrical Appliances
19	Checking the uniformity of measurements
20	Testing Requirements for Compressed Natural Gas Fuel System in Motor Vehicles
21	Safety of furniture products
22	Electromagnetic Compatibility Test for Technical Means
23	Inspection of machinery and equipment safety
24	Light Industry Product Safety Review
25	Checking perfume and cosmetic products safety
26	Tobacco product safety checks
27	Package Security Checks
28	Low-voltage equipment safety checks
29	Toy Safety Checks
30	Product safety check for children and adolescents
31	Safety testing for automobile and aeronautical gasoline, diesel fuel and ships, jet propulsion and fuel oil
32	Safety testing of hazardous fuels
33	Safety of agricultural and forestry tractors and their attachments

Source: <http://www.prosafe.am/volortner>

Annex 4. Trade Creation and Trade Diversion Dynamics Reported by Traders

Table A4.1 Export markets won/lost by industry (2016-2017)

<i>Industry</i>	<i>Export markets Won/Lost</i>	<i>Comments</i>
Alcoholic drinks (Cognac)	Lost (Belarus)	Remains unable to regain market share, which was lost in 2010 under the weight of increased competition from other suppliers
Dried fruits (Organic)	Won (Russian Federation)	Established via the virtual market (e-commerce)
Diary products	Won (Russian Federation)	Initial contacts established in 2014 during a trade fair in Armenia
Disposable plastic tableware and packaging	Won (Georgia)	Georgia. Enterprise's own initiative to capitalize on location (geographical proximity) advantages
Dried fruits	Lost (Russian Federation)	Inability to meet quantity requirements
Wine	Lost (Russian Federation)	Devaluation of Russian ruble rendered Armenian products uncompetitive (2016)
Fish farming, caviar	Won (Russian Federation)	New buyers won through participating in exhibitions
Food	Won (Iraq, Kuwait, Qatar, UAE)	Enterprises' own initiatives
Military Uniform	Won	New buyers
Chocolate production	Won (Sweden)	Buyer was introduced to the product by a member of the Armenian Diaspora community
Cosmetics	Won (UK)	/

Table A4.2 Supply sources won/lost by industry (2016-2017)

<i>Industry</i>	<i>Sources Won/Lost</i>	<i>Comments</i>
Alcohol drinks	Lost (Spain)	Sourcing became more expensive following Armenia's accession to the EAEU
Building material	Won (India)	Contacts established during an exhibition. All necessary documents for proving compliance with regulatory requirements are provided by the buyer.
Sportswear	Won (China)	Contacts established during the owners' visit to China
Food	Won (Canada)	Contacts established during a social event
Meat	Lost (Brazil)	Difficulties in registering the supplier in the common list of establishments authorized to export to the EAEU
Food	Won (Russian Federation)	Contacts established during a food expo in the Russian Federation.
Diary products (raw material)	Lost (China)	The buyer terminated cooperation (buyer did not provide any justifications)
Machinery and raw material (production of disposable plastic tableware and packaging)	Yes (China, Germany, Russian Federation)	Contacts established during exhibitions
Kitchen equipment	Won (Russian Federation)	Contacts established upon Armenia's accession to the EAEU.
Mobile phones and accessories	Lost (Russian Federation)	The supplier elected to work with another Armenian company
Food	Won (Russian Federation and Iran)	Suppliers were chosen because they provide high quality products
Organic food	Won (Georgia)	Supplier chosen based on quality of products. Geographic proximity was also a factor
Electric appliances and small electronics.	Won (China)	Supplier chosen based on price considerations and quality of services
Car tires	Lost (Italy)	Supplier hiked up prices so that the products became uncompetitive
Home decor accessories	Won (Portugal and Italy)	Contacts established during a trade fair
Pyjamas	Won (Spain)	Contacts established with the help of suppliers from the UK
PVC	Won (Russian Federation)	Company used to import from China. Decided to start sourcing from the Russian Federation upon Armenia's accession to the EAEU to reduce transaction costs

Appendix

Contents

A1.	Introduction	112
A2.	Domain of interest	114
	A2.1 Product selection	114
	A2.2 Scope of the business process analysis	116
A3.	Core business processes	116
	A3.1 Buy.	117
	Core business process area 1.1: Negotiate and conclude sales contract.	117
	A3.2 Ship	121
	Core business process area 2.1: Obtain Phytosanitary Certificate	122
	Core business process area 2.2: Obtain Certificate of Origin	126
	Core business process area 2.3: Arrange Transportation.	129
	Core business process area 2.4: Pass customs	131
	A3.3 Pay.	135
	Core business process area 3.1: Claim payment	135
A4.	Export documents	138
A5.	Time process chart	139
A6.	Recommendations	140

Abbreviations

BPA	. . . . .	Business Process Analysis
CoO	. . . . .	Certificate of Origin
EU	. . . . .	European Union
FSIB	. . . . .	Food Safety Inspection Body
CS	. . . . .	Customs service
UNECE	. . . . .	United Nations Economic Commission for Europe
UNESCAP	. . . . .	United Nations Economic and Social Commission for Asia and the Pacific
EAEU	. . . . .	Eurasian Economic Union
CCI	. . . . .	Chamber of Commerce and Industry

A1. Introduction

Pursuant to a request by the Government of Armenia, this appendix provides the results of the UNECE's assessment of procedural and regulatory barriers facing dried fruits and vegetables exports using UNECE-UNESCAP's BPA methodology described in chapter one.

Three companies, located in Yerevan, Armavir and Ararat, were selected to serve as case studies based on the size of their exports. The three companies are specialized in processing dried fruits and vegetables, including dried apricot, plum, peach, cherry and sour cherry, tomato, eggplant and grasses. The companies have well established processing facilities that are equipped with cold storage equipment (i.e. refrigerators); own fruits orchards (planted area varying between 5 and 45 hectares, each); and, also process fruits sourced from farmers across the country. In the case of dried vegetables, the companies rely on farmers for obtaining the fresh produce. The companies provide the farmers with the seeds, and then purchase the fresh vegetables for processing purposes.

The total production volume of the interviewed companies varies between 220 and 240 tonnes per season, if weather conditions are favourable. Two companies have obtained organic certification for some of their products; one of which also has a fair-trade certificate. The companies have a rich experience in exports (two have been exporting 20 years and the third since 2014), and sell the bulk of their produce to Germany, France, the Russian Federation, the United States of America (USA) and Switzerland.

The BPA was carried out in October 2018 by a UNECE consultant, who visited the premises of all three companies and conducted extensive interviews with senior as well as middle level management. In addition, the consultant carried out interviews and consultations with freight forwarders, customs broker, Chamber of Commerce and Industry of Armenia, state bodies such as the Customs Service the Food Safety Inspection Body (FSIB). The analysis also draws on published information on regulatory and procedural requirements for exporting dried fruits and vegetables from the country, including documentary requirements and associated costs.

The analysis focuses on the core business processes associated with the export of the selected product. These processes are shown using:

- Use-case diagrams (Table A1.1)
- Business process flowcharts (using the Buy-Ship-Pay reference model)
- Time procedure charts

Table A1.1 Use case and activity diagram notations

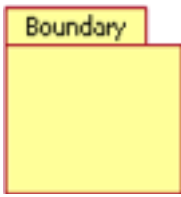






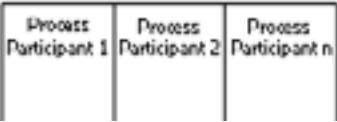




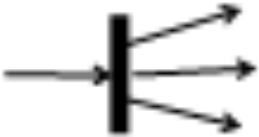

<i>Notation</i>	<i>Description and Instruction for Use</i>
Use Case Notations	
	Subject Boundary <ul style="list-style-type: none"> – Represents a process area – Includes the name of a subject boundary on top
	Actor <ul style="list-style-type: none"> – Is a person who participates in a particular business process – Is labelled with a role – Is placed outside the subject boundary which represents a process area
	Use Case <ul style="list-style-type: none"> – Represents a business process – Is labelled with a descriptive verb-noun phase – Is placed inside the subject boundary which represents a process area

Table A1.1 Use case and activity diagram notations (continued)

Notation	Description and Instruction for Use
	Association Relationship – Link actors with business processes that they participate in
Activity Diagram Notations	
	Initial State – Represents the beginning of a set of actions – There is only one initial state for each activity diagram
	Final Flow State – Is used to stop the flow of actions in an activity diagram – Indicates that further actions cannot be pursued
	Final Activity State – Is used to indicate the completion of activity i.e. no further action is needed after this point
	Swim lane – Is used to break up individual actions to individuals/ agencies that are responsible for executing their actions – Is labelled with the name of the responsible individual or agency
	Action – Represents a non-decomposable piece of behaviour – Is labelled with a name that 1) begins with a verb and ends with a noun; and 2) is short yet contain enough information for readers to comprehend
	Object – Represents a document or information that flows from one action to another action – Is labelled with a name of a document
	Decision – Represents the point where a decision, depending on the outcome of a specific prior action, has to be made – Has multiple transition lines coming out of a decision point and connecting to different actions – Attach label with the condition on each transition line that comes out of an action and connects to a decision point
	Transition line – Indicates a sequence flow of actions and information in an activity diagram
	Fork (Splitting of Control) – Is used to visualize a set of parallel or concurrent flow of actions
	Join (Synchronization of Control) – Is used to indicate the termination of a set of parallel or concurrent flow of actions

The appendix consists of six sections. The introduction is followed in section A2 by an overview of Armenia's dried fruit and vegetable sector and the scope of the BPA. Section A3 provides the analysis of the business processes associated with the export of fruits and vegetables from the country. An overview of the export documents and time process charts comes next (A4), leading to recommendations for the Government's consideration (A6).

A2. Domain of interest

A2.1 Product selection

Dried fruits and vegetables have a significant export potential, benefiting from the country's natural endowments. Armenia's favourable natural and climatic conditions with sunny days and fresh mountain waters creating ideal conditions for growing juicy fruits and vegetables, so that dried produce differ significantly in taste, aroma and even appearance from similar products originating elsewhere.

Dried fruit and vegetable processing is a growing sector with marked presence in most of the regions, mirroring the widespread fruit and vegetable-growing in more than 482 communities. The Southern regions bordering Iran are home to orchards of fig, persimmon, pomegranate and cherries, while the Northern regions are home to, among others, plums, pears, peaches, and apple orchards. Grapes, apricots, peaches, plums and pears are grown throughout the Ararat Valley (Armavir, Ararat regions), which accounts for 70 percent of the country's total production of dried fruits and vegetables.

There are more than 5,500 dried food producers across Armenia, 98 percent of which are individuals processing less than one ton annually. The number of medium-sized processors (with annual production volumes of 1 – 5 tons) was around 100 as of December 2018, while the number of large producers (with annual production of above 5 tons) was 20. Most of producers use solar dryers. Electrical or combined dryers for increasing productivity and overall quality are only used by large enterprises.

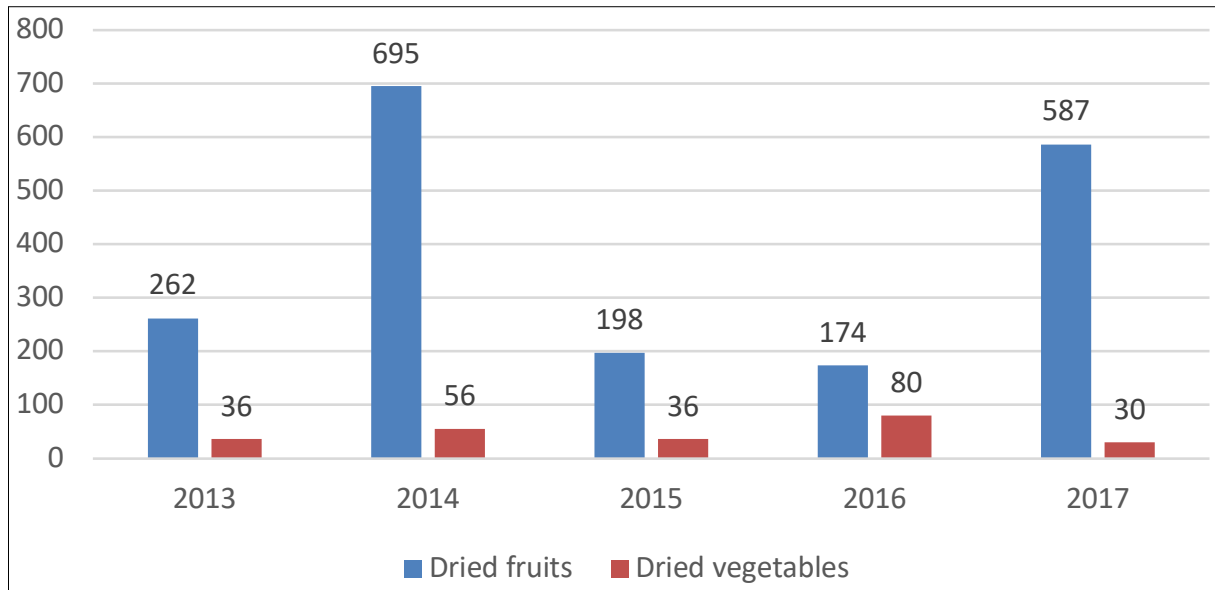
The enterprises are located close to supply sources, and produce over 1,000 tons of dried fruits and vegetables per annum. Apricots, peaches and prunes account for 80 percent of total production, with pears, apples, figs, grapes and persimmons, among other accounting for the remaining balance. Dried vegetables consist mainly of tomato, eggplant, pepper, beer, garlic, carrot, greens, with a modest share in total production. Dried fruit processing is strongly affected by climatic fluctuations. During poor harvest seasons, due to early spring frosts or heavy late spring hails, up to 90% of the yield can be lost, and this is reflected in the form of upward pressure on the prices and decreased competitiveness. In contrast, vegetable growing is less sensitive to climatic changes, so that there are no sharp decreases in supply. The enterprises remain unable to improve their export performance, generating a maximum of around USD 700,0000 per annum (Figure A2.1).

Moreover, the bulk of the produce is sold on the Russian market, which accounts for 81 percent of the country's total exports of dried fruits and vegetables (A2.2). Exports to other countries, including Germany, France, Switzerland and USA, are often facilitated by the Armenian diaspora, acting as importers or marketing agents for Armenian producers.

Interviewed exporters noted that the industry is held back by supply side weaknesses, including: the lack of modern processing facilities; weak marketing strategies; limited knowledge of current trends in global markets, sanitary and quality requirements; and, severe competition from Iranian, Turkish and Middle-Eastern imported products.

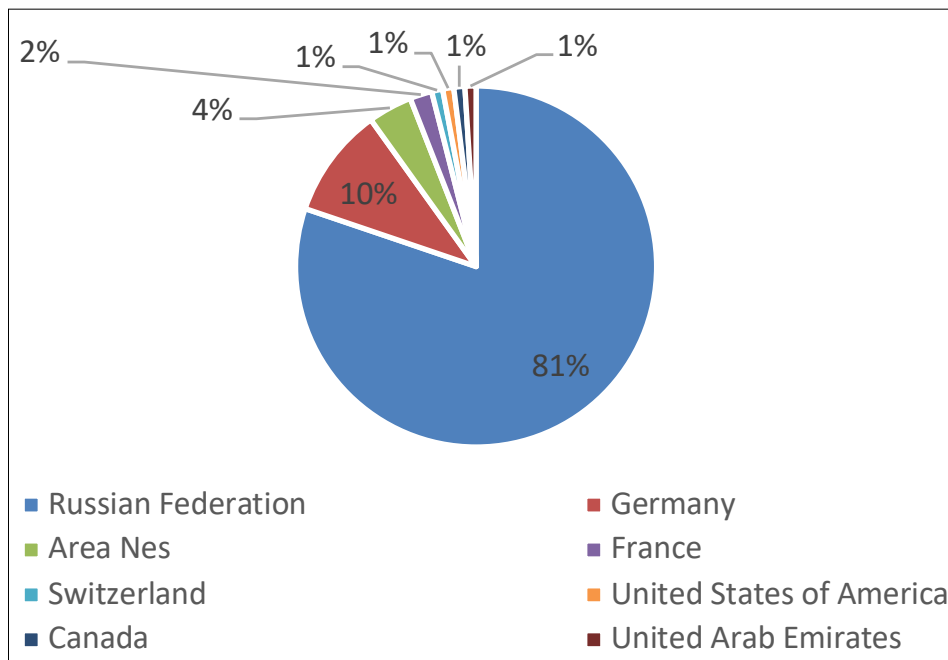
Small farms in Armenia cannot provide homogeneous products in large volumes and it is quite difficult to find a niche in the international market for small volumes. This PBA sheds light on the extent to influence of regulatory and procedural trade measures on the industry's growth potential.

Figure A2.1 Dried fruits and vegetables exports (USD thousand)



Source: UN Comtrade

Figure A2.2 Dried fruits exports by markets, 2017



Source: UN Comtrade

A2.2 Scope of the business process analysis

The analysis maps the day-to-day activities typically undertaken by exporters of dried fruits and vegetables against the core buy-ship-pay business processes, taking into account existing legislation and based on the following assumptions:

1. Dried fruits and vegetables are exported to the countries outside of the Eurasian Economic Union (EAEU).
2. Exporter is selling to an existing client.
3. Goods are transported by truck.
4. Transport is organized by the freight forwarders.
5. Goods are not shipped under CPT (Carriage paid to) delivery terms (i.e., the exporter covers the costs associated with transporting the goods to destination).
6. Exporter handles customs clearance.
7. Payment is made through wire transfer.
8. Goods are cleared at Araratyan border crossing point (BCP) which handles 80 percent of cargo traffic.

A3. Core business processes

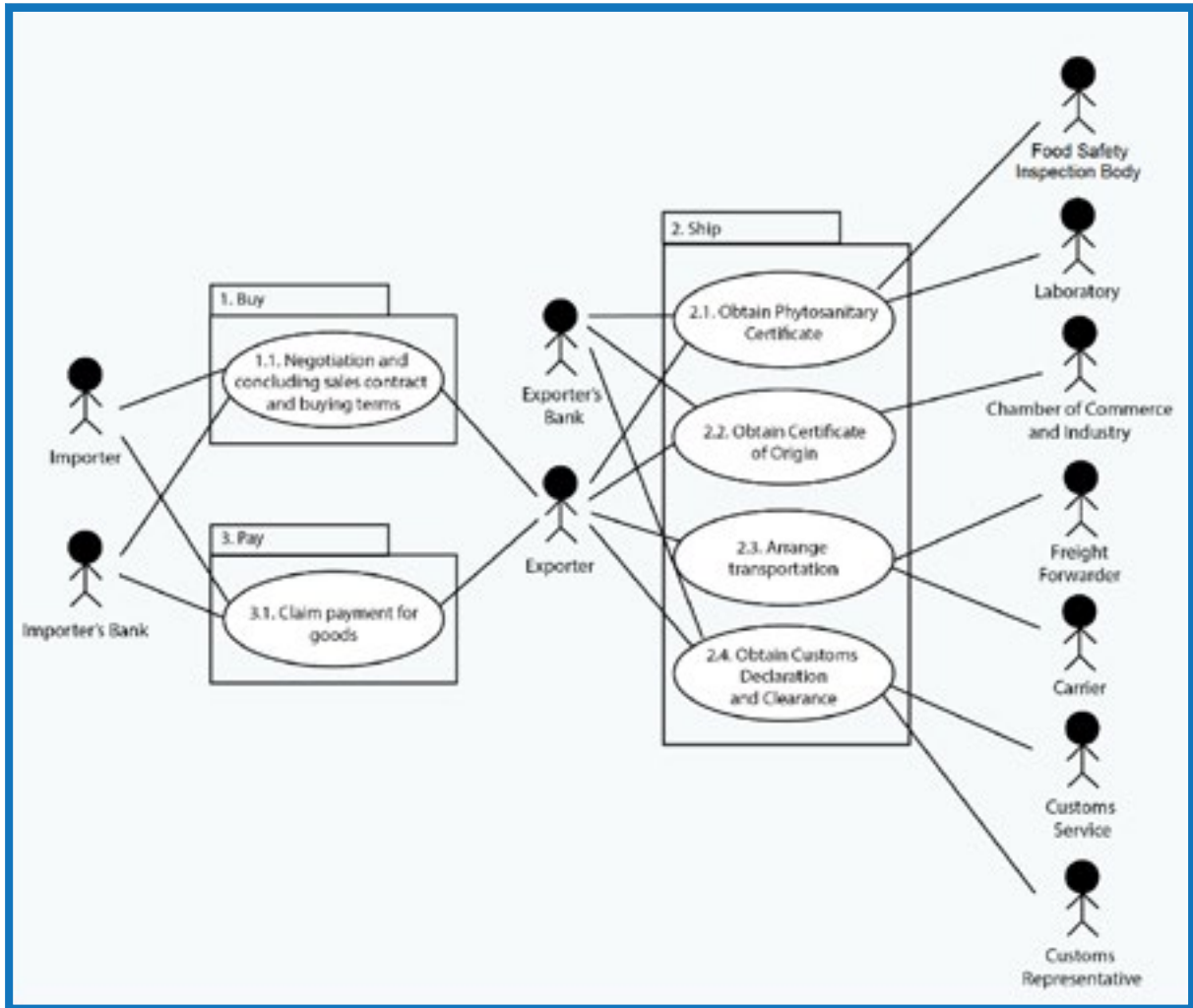
As shown in table A3.1, exporting frozen dried fruits and vegetables from Armenia involves 6 core business processes and 11 participants.

Table A3.1 Core business processes and stakeholders involved in exporting dried fruits and vegetables

Core business process	Party										
	Exporter	Exporter's Bank	Importer	Importer's Bank	Freight Forwarder	Carrier	FSIB (Previously State Service for Food safety)	Testing Laboratory	Chamber of Commerce and Industry	Customs Service	Customs Representative
1. Buy											
1.1 Negotiating and concluding sales contract and buying terms	X		X	X							
2. Ship											
2.1 Obtain the Phytosanitary Certificate	X	X					X	X			
2.2 Obtain the Certificate of Origin	X	X							X		
2.3 Arrange Transportation	X				X	X					
2.4 Obtain Customs Declaration and Clearance	X	X								X	X
3. Pay											
3.1 Claim payment for goods	X		X	X							

The 6 core business processes are mapped in a use case diagram in figure A3.1, followed by a detailed analysis of each process.

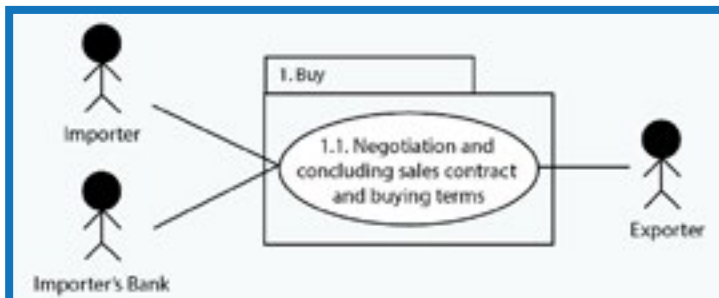
Figure A3.1 Exporting dried fruits and vegetables from Armenia: Use case diagram



A3.1 Buy

Core business process area 1.1: Negotiate and conclude sales contract

Figure A3.2 Negotiate and conclude sales contract use case diagram



As shown in figure A3.2, the negotiations over the sales contract involve:

- Importer
- Exporter
- Importer's bank

This process involves two stages: (i) reaching an agreement over the products and quantities to be purchased during the harvest year, and this stage is initiated 2-3 months before the start of the harvest season (March-May); and. (ii) reaching an agreement over the price and terms of contract based on the draft quotation provided by the exporter. The entire process, which is conducted via email and by phone, takes between 3 and 5 days to complete and the signed contract is used as a support document for obtaining the Certificate of Origin and passing customs clearance.

The buy process also involves, in the case of existing clients, advance payment (equivalent to 50 percent of the contract price), which the exporter uses to cover the costs associated with preparing the shipment for export (i.e., packaging, labels in languages of destination country). The advance payment also serves as a guarantee of the buyer's commitment to purchase. Figure A3.3 maps the activities associated with negotiating and concluding the sales contract.

Name of process area	1. Buy
Name of Business process	1.1 Negotiate and conclude sales contract
Process participants	<ul style="list-style-type: none"> – Exporter – Importer – Importer's Bank
Related laws, rules, and regulations	<ul style="list-style-type: none"> – Incoterms 2010
Input and criteria to enter/begin the business process	<ul style="list-style-type: none"> – Exporter's company is registered with the authorities. – Exporter meets the importer's eligibility criteria.
Activities and associated documentary requirements	<ul style="list-style-type: none"> 1.1.1 The importer contacts the exporter to inquire about the dried fruits and vegetables quotation. 1.1.2 The Exporter prepares a quotation. 1.1.3 The Importer reviews the quotation and either accepts the given terms, requests the exporter to revise the quotation or rejects the quotation. 1.1.4 If the quoted price and terms are accepted, the Importer continues the negotiation with the confirmation of the intend to purchase. 1.1.5 The Exporter acknowledges the intent to purchase and prepares a draft Sales Contract. 1.1.6 The Importer reviews the draft Sales Contract. 1.1.7 If the terms are agreeable, the Importer signs the contract and provides a purchase order for single or multiple shipments. 1.1.8 The Exporter acknowledges receipt of the purchase order and issues the Proforma Invoice. The Exporter also counter signs the Sales Contract. 1.1.9 The Importer receives the Proforma Invoice and makes the advanced payment equivalent to 50 percent of the contract price (or for the total value of the contract price). 1.1.10 The Importer's Bank approves the payment and issues the payment receipt. 1.1.11 The Importer sends the payment receipt to the Exporter as a confirmation of purchase intent, so that the Exporter can start the preparation of goods. 1.1.12 The Exporter acknowledges receipt of the advanced payment. 1.1.13 The Exporter prepares the goods for delivery.
Output criteria to exit the business process	<ul style="list-style-type: none"> – Importer and exporter have concluded the Sales Contract. – Exporter receives purchase order – Exporter received the advance payment.
Costs and resources	Not applicable (N/A)
Average time required to complete the business process	3-5 days

Figure A3.3 Negotiate and conclude the sales contract activity diagram

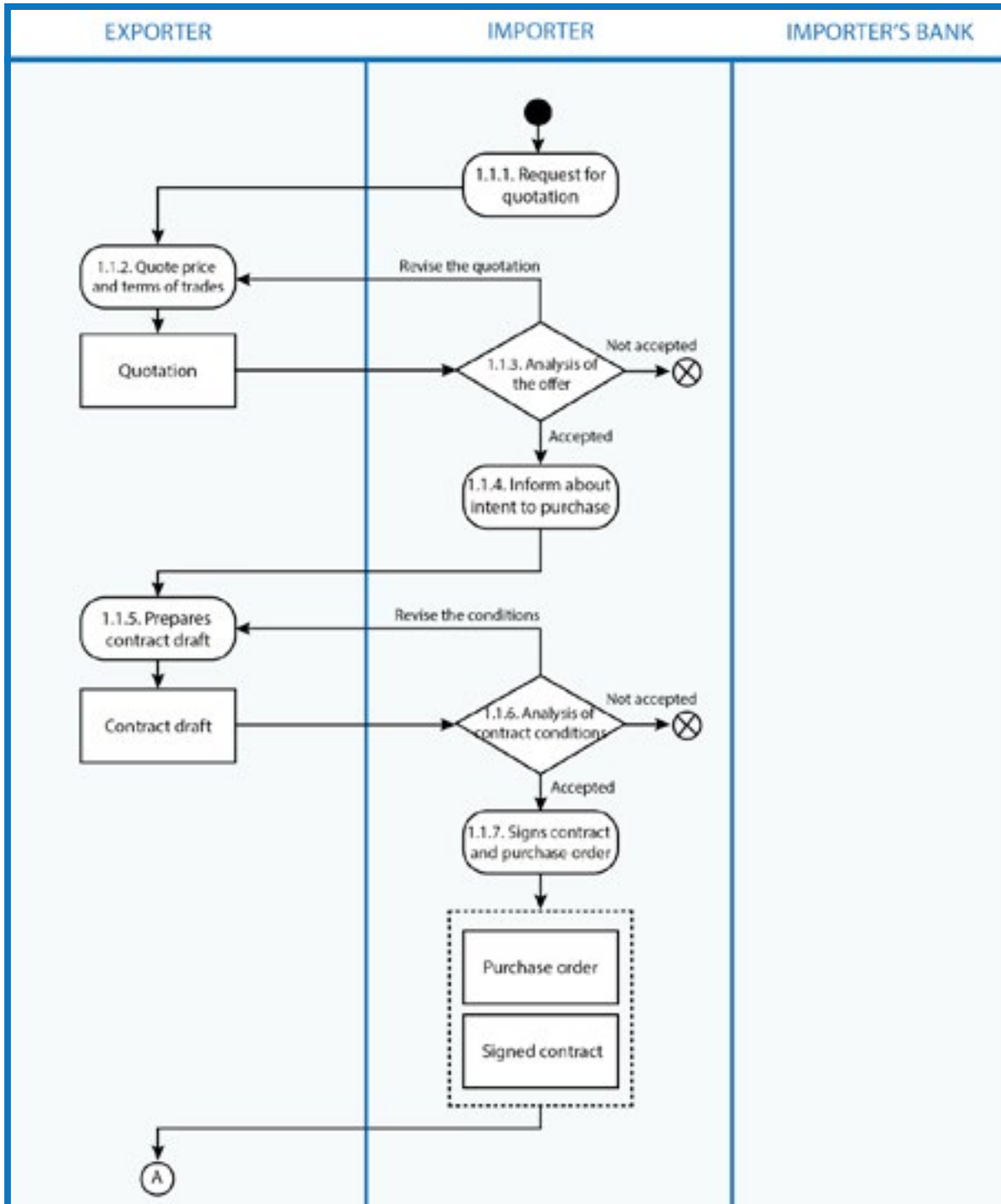
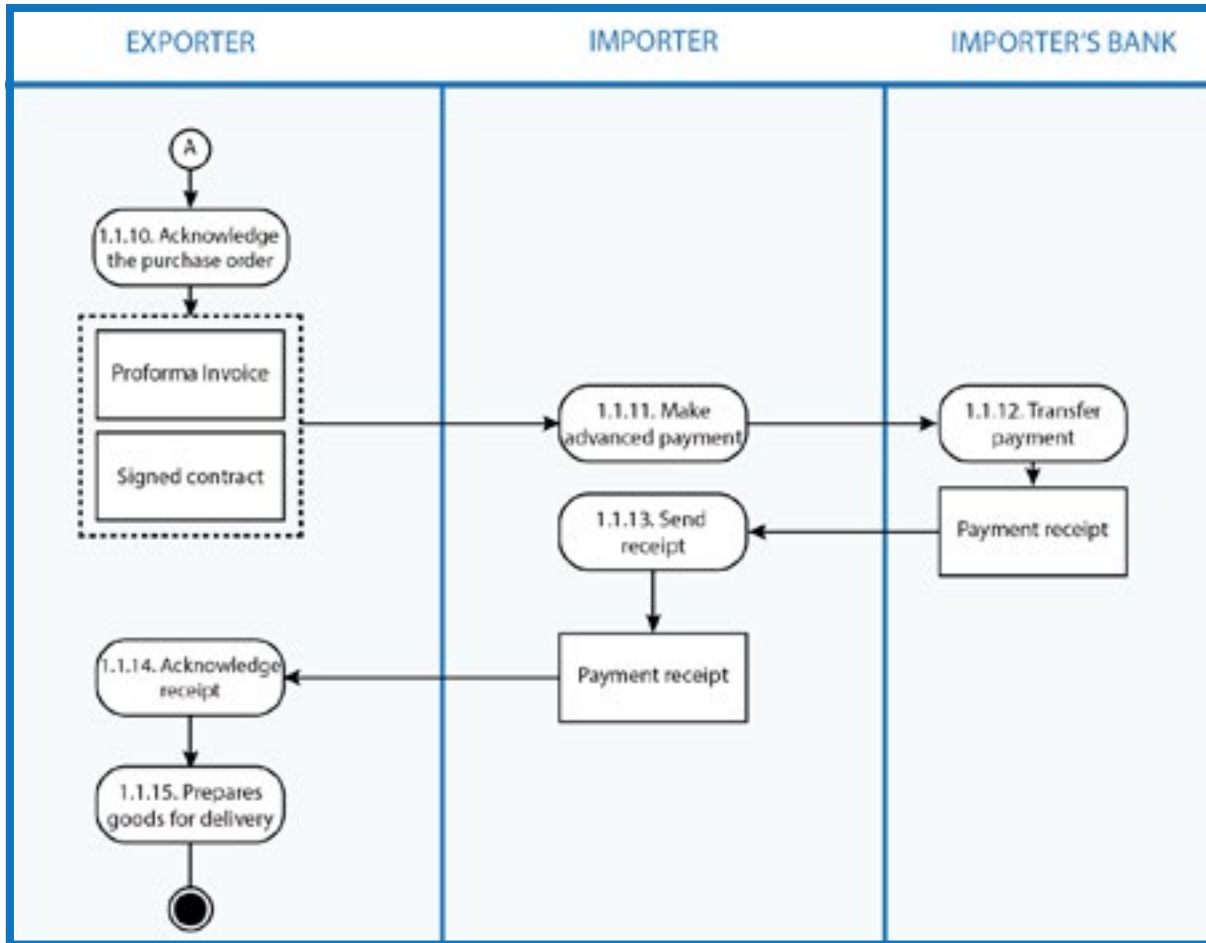


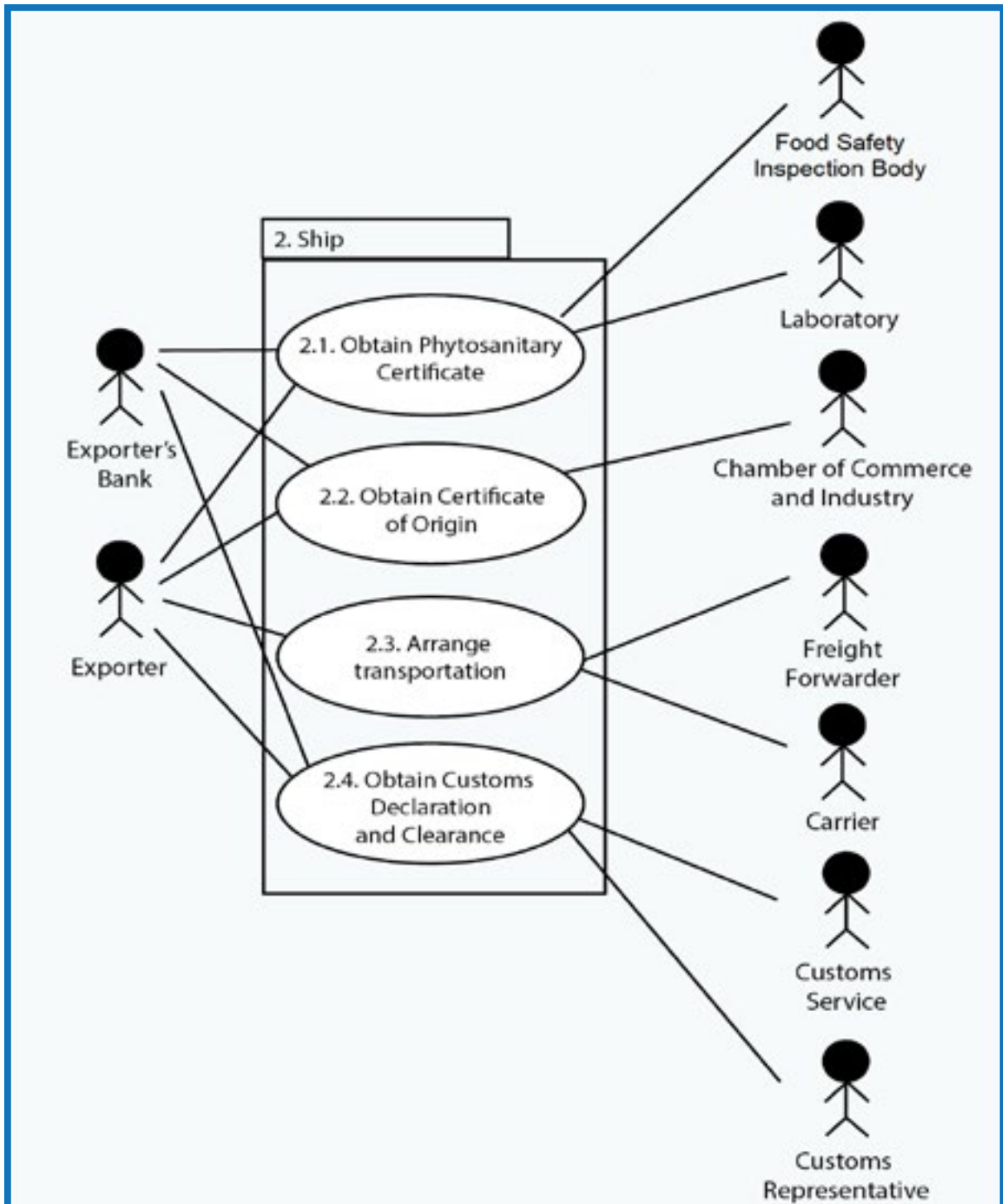
Figure A3.3 Negotiate and conclude the sales contract activity diagram (continued)



A3.2 Ship

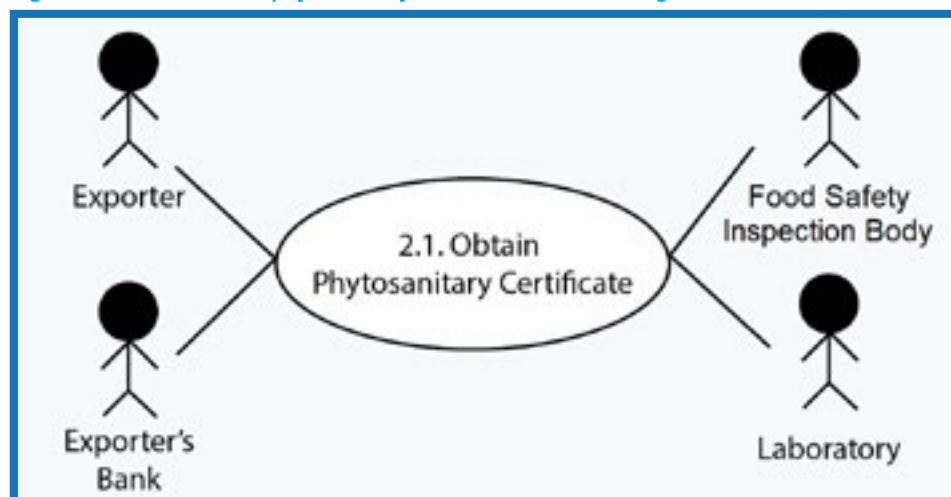
Shipping dried fruits and vegetables from Armenia involves 4 core business processes. As shown in figure A3.4, these processes are associated with organising for the transport of the goods and fulfilling export regulatory requirements.

Figure A3.4 Ship use case diagram



Core business process area 2.1: Obtain Phytosanitary Certificate

Figure A3.5 Obtain phytosanitary certificate use case diagram



As shown in figure A3.5, obtaining the phytosanitary certificate involves:

- Exporter
- Exporter's Bank
- Food Safety Inspection Body under the Government

The process commences with the exporter submitting, in person or by email, the duly filled application form to the FSIB along with copies of the commercial invoice, packing list, sales contract, laboratory test reports. Within 3 days upon receipt of the request, an assigned inspector visits the premises of the exporter to control the designated lot for exports and reviews the supporting documents. If the goods and supporting documents are in order, the certificate is issued immediately. If the inspector concludes that shipment poses health risks, he/she collects samples and organizes their delivery to testing laboratories. Tests are also conducted if raw materials are sourced from areas subject to quarantine or if the goods combine products/raw material from different suppliers.

It takes up to 10 working days to receive laboratory tests results (depending on number of indicators to be investigated) and the entire process takes up to 13 days to complete (from submission of samples and documentary requirements to receiving the certificate).

It is important to note that laboratory tests are not needed for established producers since the dried fruits and vegetables are controlled 2 to 3 times per year. Figure A3.6 maps the activities associated with obtaining the phytosanitary certificate. Officials from FSIB noted that phytosanitary certificates are issued in 30 minutes (see Chapter three, Box 3.1).

Figure A3.6 Obtain phytosanitary certificate activity diagram

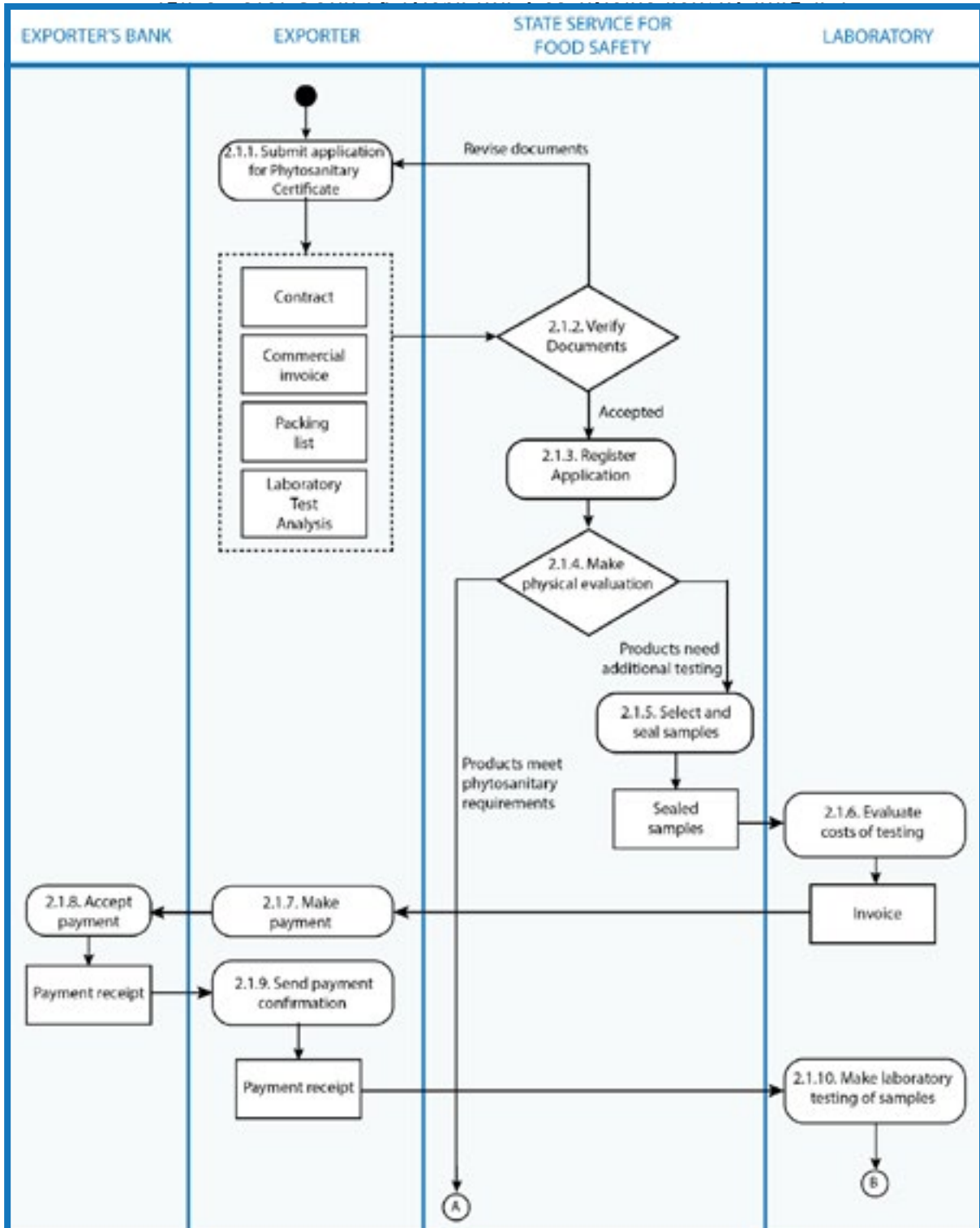
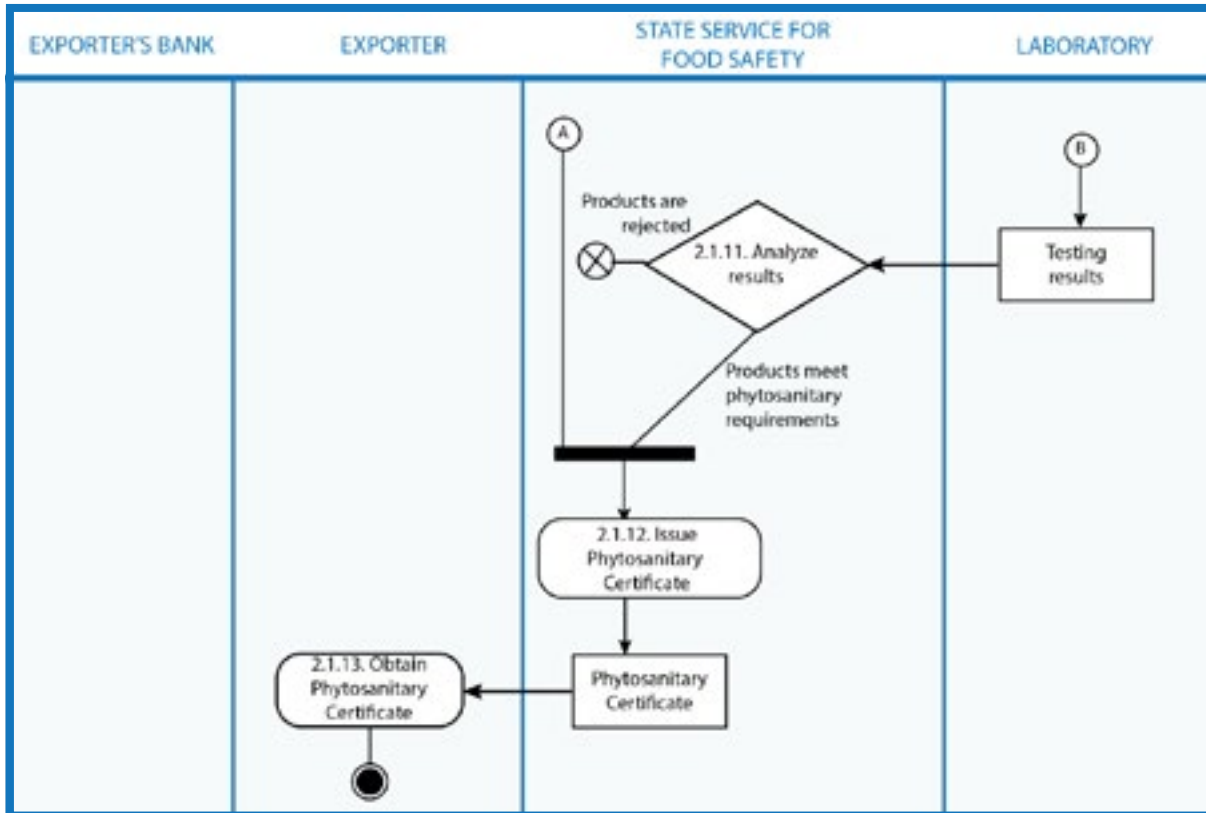


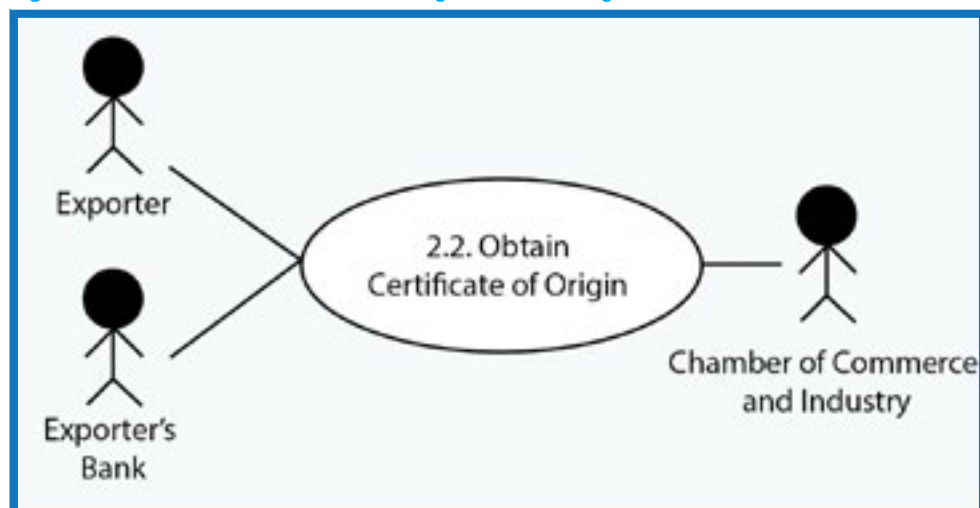
Figure A3.6 Obtain phytosanitary certificate activity diagram (continued)



Name of process area	2. Ship
Name of Business process	2.1 Obtain Phytosanitary Certificate
Process participants	<ul style="list-style-type: none"> – Exporter – Exporter's Bank – FSIB – Laboratory
Related laws, rules, and regulations	<ul style="list-style-type: none"> – Decree No. 1093-N of August 30, 2007 on rules of issuing phytosanitary certificates for import, export and transit – Law on Phytosanitary – Law in Food Security state control – Order of NSFS No. 700-N of November 22, 2013 on list of products subject to phytosanitary quarantine control
Input and criteria to enter/begin the business process	<ul style="list-style-type: none"> – The Exporter is registered with the FSIB
Name of Business process	2.1 Obtain Phytosanitary Certificate
Activities and associated documentary requirements	<p>2.1.1 The Exporter submits duly filled application form to the Food Safety Inspection Body along with the supporting documents (by e-mail or in person).</p> <ul style="list-style-type: none"> – Commercial Invoice. – Laboratory test analysis (Certificate of Analysis). – Sales Contract – Packing list <p>2.1.2 The FSIB reviews submitted application and supporting documents. If the documents are not in order, the exporter is requested to submit revised documents or provide missing documents.</p> <p>2.1.3 FSIB approves and registers the application</p> <p>2.1.4 FSIB inspector visits the Exporter's premises and inspects the shipment destined for exports and checks the supporting documents, including verification of labelling, correspondence of goods with the information written in the provided documents (lot number, weight, etc.). If the shipment and supporting documents are in order, the inspector issues the phytosanitary certificate (2.2.12). Should the inspector concludes that the shipment poses health risks, he/she proceeds to organize for laboratory tests</p> <p>2.1.5 The inspector collects the necessary samples, seals the samples in special containers and sends to the laboratory.</p> <p>2.1.6 The laboratory estimates the costs based on number of indicators to be investigated and issues an invoice.</p> <p>2.1.7 The Exporter receives the payment invoice and makes the payment through bank transfer.</p> <p>2.1.8 The Exporter's bank accepts the payment and issues the Payment Receipt.</p> <p>2.1.9 The Exporter sends the Payment Receipt to the laboratory.</p> <p>2.1.10 Laboratory acknowledges the payment, performs the analysis and provides the test results.</p> <p>2.1.11 FSIB reviews the test results and decides whether the goods can be exported.</p> <p>2.1.12 If the test results proves that the shipment does not pose health risks, the FSIB issues the phytosanitary certificate.</p> <p>2.1.13 The Exporter receives the phytosanitary certificate.</p>
Output criteria to exit the business process	<ul style="list-style-type: none"> – Exporter receives the Phytosanitary Certificate.
Costs and resources	Phytosanitary certificate - free Laboratory tests – 3000 drams per indicator (5 to 11 indicator are investigated, depends on destination market).
Average time required to complete the business process	Up to 3 days without laboratory tests Up to 10 days for receiving laboratory test results

Core business process area 2.2: Obtain Certificate of Origin

Figure A3.7 Obtain certificate of origin use case diagram



As shown in figure A3.7, obtaining the certificate of origin (CoO) involves:

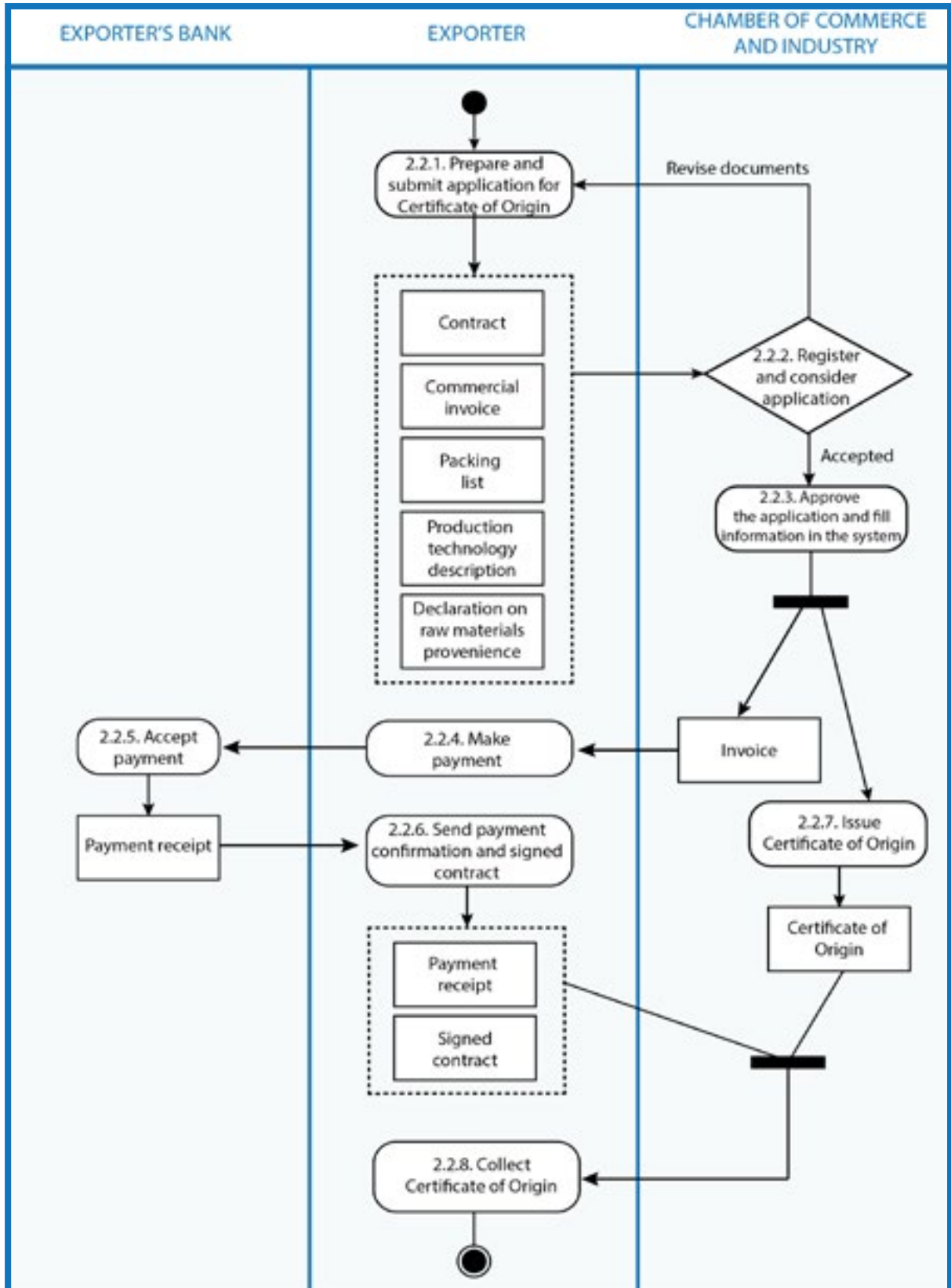
- Exporter
- Exporter's Bank
- Chamber of Commerce and Industry

The process commences with the submission of the filled-out application form along with the supporting documents by email to the Chamber of Commerce and Industry, which issues 2 forms of CoO: Form A (for exports destined to the EU) and CT-1 (for exports to Commonwealth of Independent States, CIS, countries).

The supporting documents include: the sales contract, invoice, packing list, description of the production process technical sheets and statement raw material sources. Description of the production process is presented when CoO is requested for the first time or if the changes have been introduced to the production process. The Chamber also requests a certificate of expertise to establish origin if the goods are produced using raw materials sourced from abroad. If the goods are manufactured using locally sourced raw material and/or if the lots are below 2500 kilograms, the Chamber does not request this certificate.

The CoO is issued within one day if there is no need for a certificate of expertise and within 3 days if a certificate of expertise is required. The expertise certificate is issued by Armexpertiza, which is a Limited Liability Company (LLC) under the Chamber of Commerce and Industry. The Chamber handles all the administrative procedures for issuing the act. Figure A3.8 maps the activities associated with obtaining the CoO.

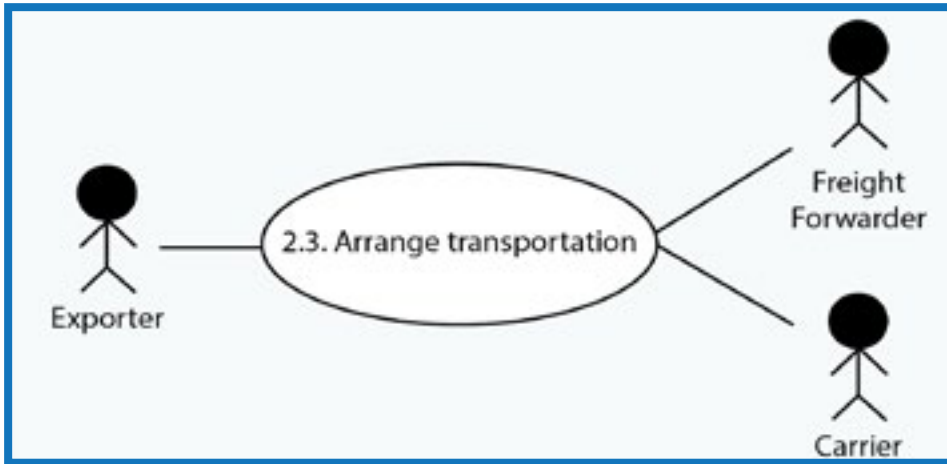
Figure A3.8 Obtain certificate of origin activity diagram



Name of process area	2. Ship
Name of Business process	2.2 Obtain Certificate of Origin
Process participants	<ul style="list-style-type: none"> – Exporter – Export's Bank – Chamber of Commerce and Industry (CCI)
Related laws, rules, and regulations	<ul style="list-style-type: none"> – Trade agreements – Decree No 1773-N, December 30, 2010 on rules for issuing certificates of origin and expertise performing – Customs Code of Armenia
Input and criteria to enter/begin the business process	<ul style="list-style-type: none"> – The Exporter has received the Phytosanitary Certificate
Activities and associated documentary requirements	<p>2.2.1 The Exporter prepares and submits the application for certificate of origin to the CCI along with the supporting documents (by e-mail).</p> <ul style="list-style-type: none"> – Sales Contract – Commercial Invoice. – Packing list – Product specifications – Description of the production process and technology – Statement on raw material provenience. <p>2.2.2 The CCI reviews the application and supporting documents.</p> <p>2.2.3 If the documents are in order, the CCI approves the application and inputs the information into the system and issues an invoice.</p> <p>2.2.4 The Exporter receives the payment invoice and makes the payment through bank transfer.</p> <p>2.2.5 The Exporter's bank accepts the payment and issues the Payment Receipt.</p> <p>2.2.6 The Exporter sends the Payment Receipt to the CCI.</p> <p>2.2.7 The CCI acknowledges the payment and issues Certificate of Origin.</p> <p>2.2.8 The Exporter collects Certificate of Origin from CCI.</p>
Output criteria to exit the business process	<ul style="list-style-type: none"> – Exporter receives the Certificate of Origin.
Costs and resources	10000 drams (without expertise) 30000 drams (including expertise).
Average time required to complete the business process	1 day if there is no need for a certificate of expertise Within 3 days if a certificate of expertise is required

Core business process area 2.3: Arrange Transportation

Figure A3.9 Arrange transportation use case diagram

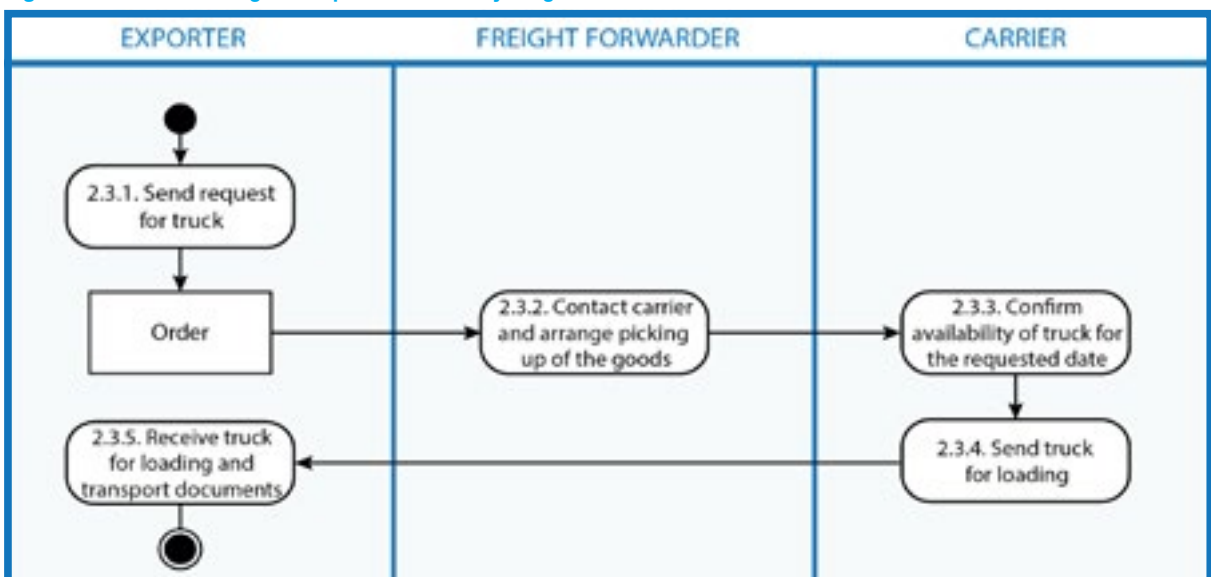


As shown in figure A3.9, arranging the transport of goods involves:

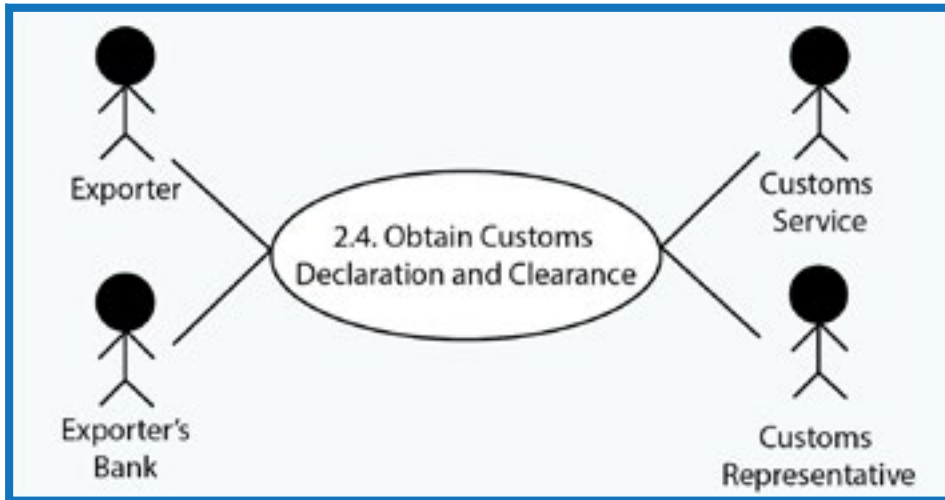
- Exporter
- Freight Forwarder
- Carrier

As previously mentioned, this business activity is outsourced to a freight forwarding company, with the importer covering all the associated costs. The Exporter acts as a facilitator. He identifies the freight forwarding company and furnishes it with the delivery terms (time frame, destination, product description and quantities). The freight forwarder then subcontracts the carriers, arranges cargo insurance and handles the payment on behalf of the importer or on behalf of the exporter (in the latter case the exporter contracts the forwarder and is reimbursed by the importer as part of the sales contract). The dried fruits and vegetables are shipped by refrigerated trucks. The entire process takes up to 2 days if goods are shipped by truck as is the case in this BPA. Figure A3.10 maps the activities associated with arranging transportation.

Figure A3.10 Arrange transportation activity diagram



Name of process area	2. Ship
Name of Business process	2.3 Arrange transportation
Process participants	<ul style="list-style-type: none"> – Exporter – Freight forwarder – Carriers
Related laws, rules, and regulations	<ul style="list-style-type: none"> – Law on transport – Law on aviation – CMR Convention – TIR Convention
Input and criteria to enter/begin the business process	<ul style="list-style-type: none"> – Exporter and importer have already agreed on the delivery terms – The freight forwarder is contracted to arrange transport on behalf of the importer or exporter.
Activities and associated documentary requirements	<p>2.3.1 The Exporter solicits the services of a freight forwarder and provides the necessary information (designated destination, the transportation deadline and the volume of the goods as well as Exporter's and Buyer's companies information) and draws a contract that is counter signed by the exporter or importer, depending on the terms of the sales contract.</p> <p>2.3.2 The Freight Forwarder subcontracts carriers and arrange to pick up the goods from the Exporter's warehouse on a specific date.</p> <p>2.3.3 The Carrier confirms availability of trucks.</p> <p>2.3.4 The Carrier sends the trucks to the Exporter's warehouse for loading.</p> <p>2.3.5 The Exporter receives the trucks; is provided with the transport documents necessary to complete the documentary requirements; and, loads the goods onto the trucks.</p>
Output criteria to exit the business process	<ul style="list-style-type: none"> – The truck is dispatched to the exporter warehouse – The transport documents have been obtained and are in order. – Goods are loaded onto the trucks
Costs and resources	0,55 -0,65 USD/per kg – for shipment by truck Covered by Importer
Average time required to complete the business process	2 days

*Core business process area 2.4: Pass customs***Figure A3.11** Pass customs use case diagram

As shown in figure A3.11, passing customs involves:

- Exporter
- Customs Representative
- Customs Service under the State Revenue Committee of Armenia.

Customs clearance commences when the truck arrives at the Customs terminal, namely Aararatyan internal regional office in Yerevan. An assigned customs officer inspects the cargo and then seals the truck. Once completed, the exporter provides the required documents (sales contract, commercial invoice, packing list, phytosanitary certificate, CMR) to the customs representative (i.e., customs broker).

The customs representative proceeds to fill out the electronic customs declaration (customs declaration can only be filed out by a customs representative authorised by Customs Service) and submits (through the system). The declaration is then validated by the customs officer. This is followed by a risk assessment, which is implemented using the electronic platform. If the shipment is in order, the export declaration is printed, signed, stamped and handed over to the exporter. Figure A3.12 maps the activities associated with passing customs, which take up to 1 day to complete.

Figure A3.12 Pass customs activity diagram

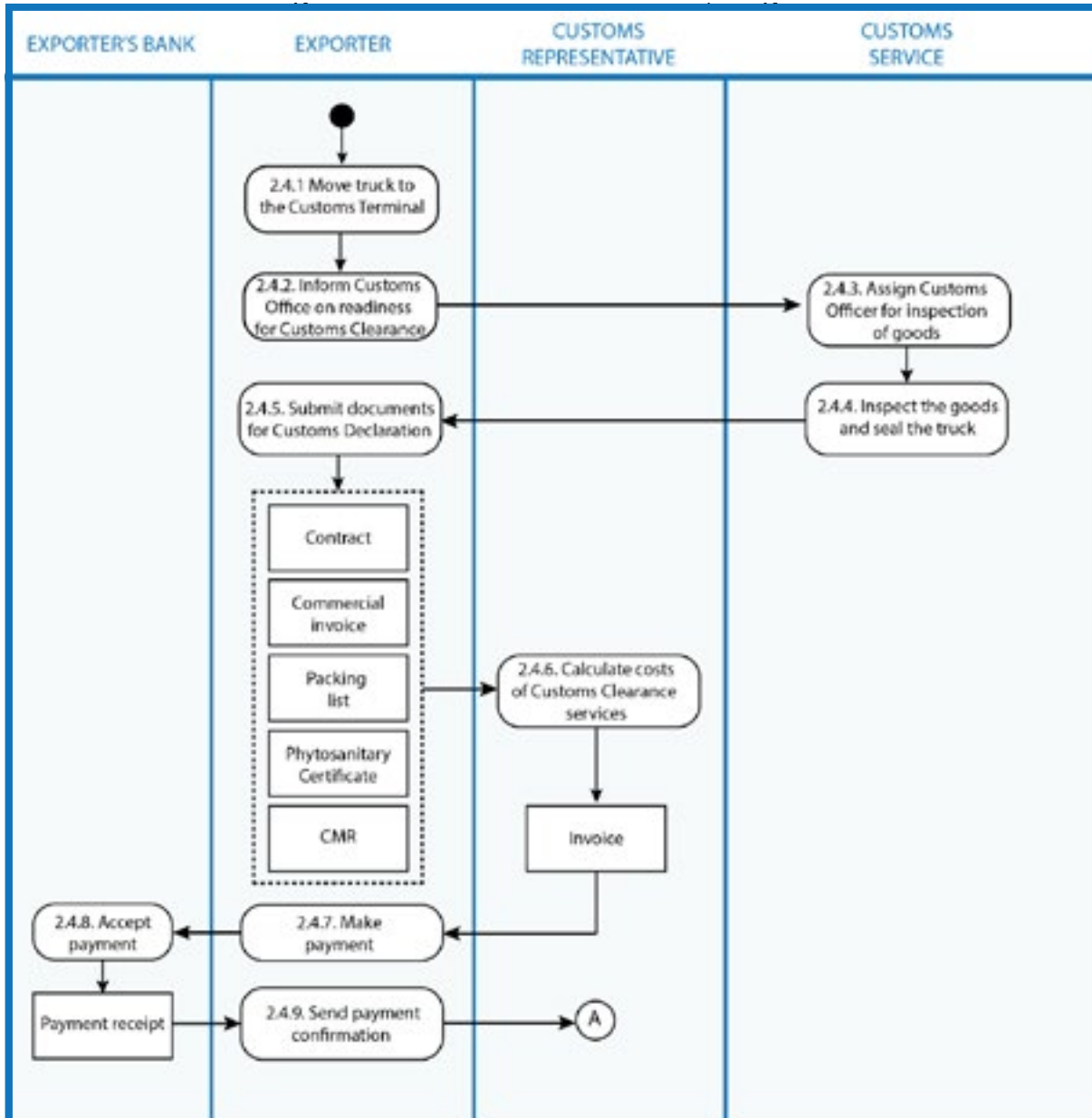
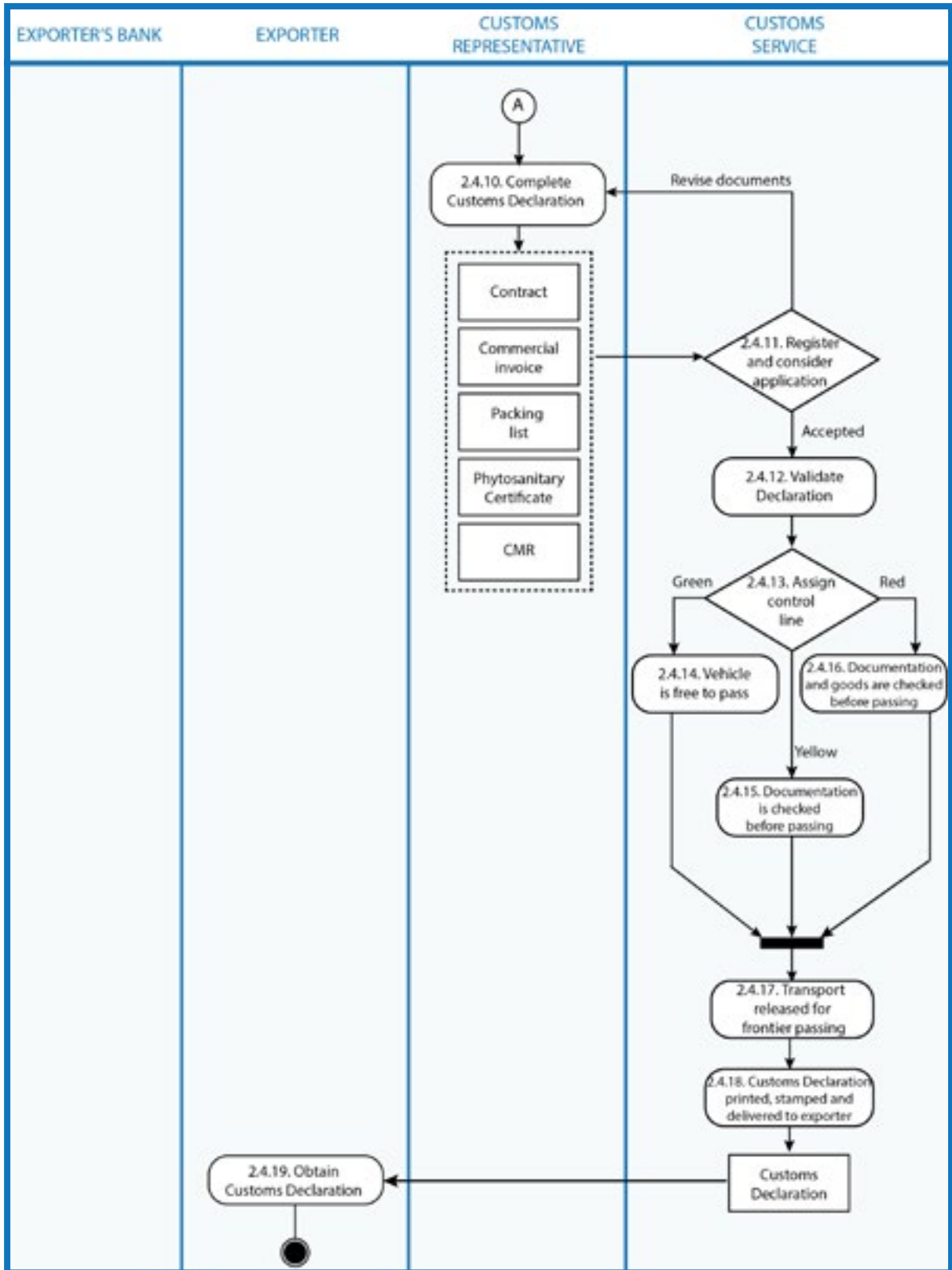


figure A3.12 Pass customs activity diagram (continued)

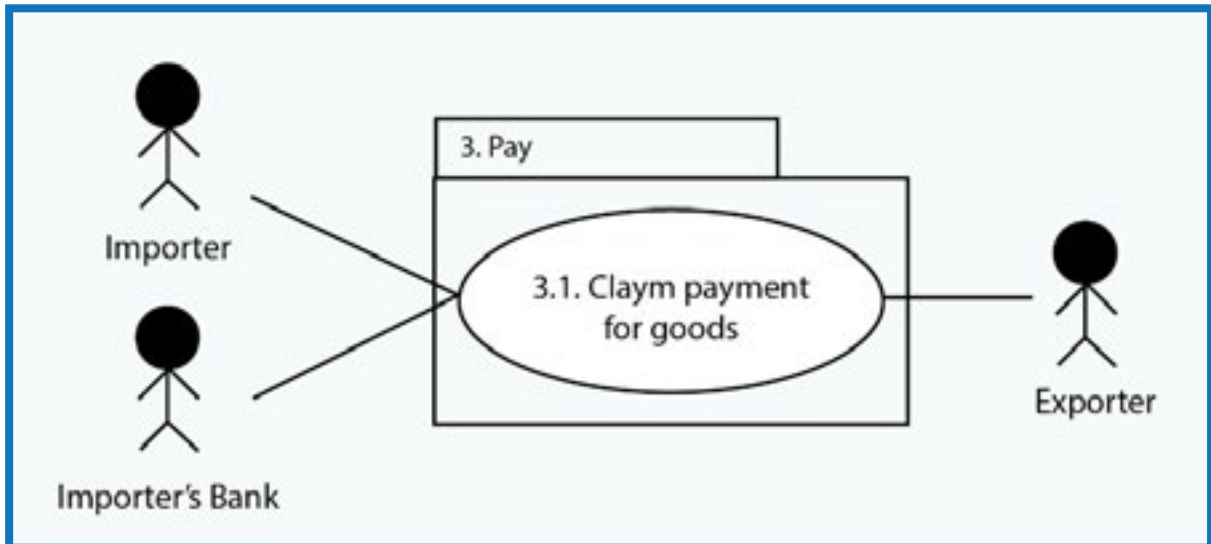


Name of process area	2. Ship
Name of Business process	2.4 Pass customs
Process participants	<ul style="list-style-type: none"> – Exporter – Exporter's Bank – Customs Representative – Customs Service
Related laws, rules, and regulations	<ul style="list-style-type: none"> – Customs code of Armenia – Law on Customs regulation – Law on Customs Service
Input and criteria to enter/begin the business process	<ul style="list-style-type: none"> – The Exporter has received the certificate of origin and phytosanitary certificate
Activities and associated documentary requirements	<p>2.4.1 The Exporter moves the truck to the custom terminal.</p> <p>2.4.2 The Exporter alerts the customs office on the arrival of the goods</p> <p>2.4.3 Customs office assigns a customs officer to inspect the goods.</p> <p>2.4.4 Custom officer inspects the goods at the terminal and seals the truck.</p> <p>2.4.5 The Exporter presents the required documents to the customs representative:</p> <ul style="list-style-type: none"> – Commercial Invoice. – Packing list. – Contract. – Phytosanitary Certificate. – CMR (and TIR carnet) – Certificate of Origin (if requested by importer) <p>2.4.6 The customs representative calculates the amount of customs duty.</p> <p>2.4.7 The Exporter receives the invoice and makes the payment through bank transfer.</p> <p>2.4.8 The Exporter's bank accepts the payment and issues the Payment Receipt.</p> <p>2.4.9 The Exporter sends the Payment Receipt to the Customs representative.</p> <p>2.4.10 The customs representative acknowledges the payment and fills out the electronic customs declaration.</p> <p>2.4.11 The Custom officer reviews submitted application and determines if it is in order. If not, the customs representative is requested to revise and/or provide missing documents.</p> <p>2.4.12 The customs officer validates the customs declaration and provides registration number.</p> <p>2.4.13 The customs risk management system assigns the cargo to one of the following lines:</p> <ul style="list-style-type: none"> – Low risk: green line, no control is required – Medium risk: yellow line, documentary control – High risk: red line, physical inspection <p>2.4.14 If no control is required, clearance proceeds to activity 2.5.17.</p> <p>2.4.15 Documentary control. The exporter provides the relevant documents to the custom officer. The customs officer checks the documents and registers the results into the system. Clearance then proceeds to activity 2.5.17</p> <p>2.4.16 Physical control. Includes always a documentary control. The Exporter informs the truck driver to move the goods to the inspection area. The customs officer performs the physical inspection. Clearance then proceeds to activity 2.5.17</p> <p>2.4.17 The goods are released from customs</p> <p>2.4.18 The custom declaration is printed, stamped and handed over to the exporter.</p> <p>2.4.19 The exporter receives the Customs Declaration.</p>
Output criteria to exit the business process	<ul style="list-style-type: none"> – Exporter receives the Customs Declaration. – The goods area released from customs
Costs and resources	20000 drams – fees customs representative services Customs duties-depending on the results of customs valuation
Average time required to complete the business process	1 day

A3.3 Pay

Core business process area 3.1: Claim payment

Figure A3.13 Claim payment use case diagram

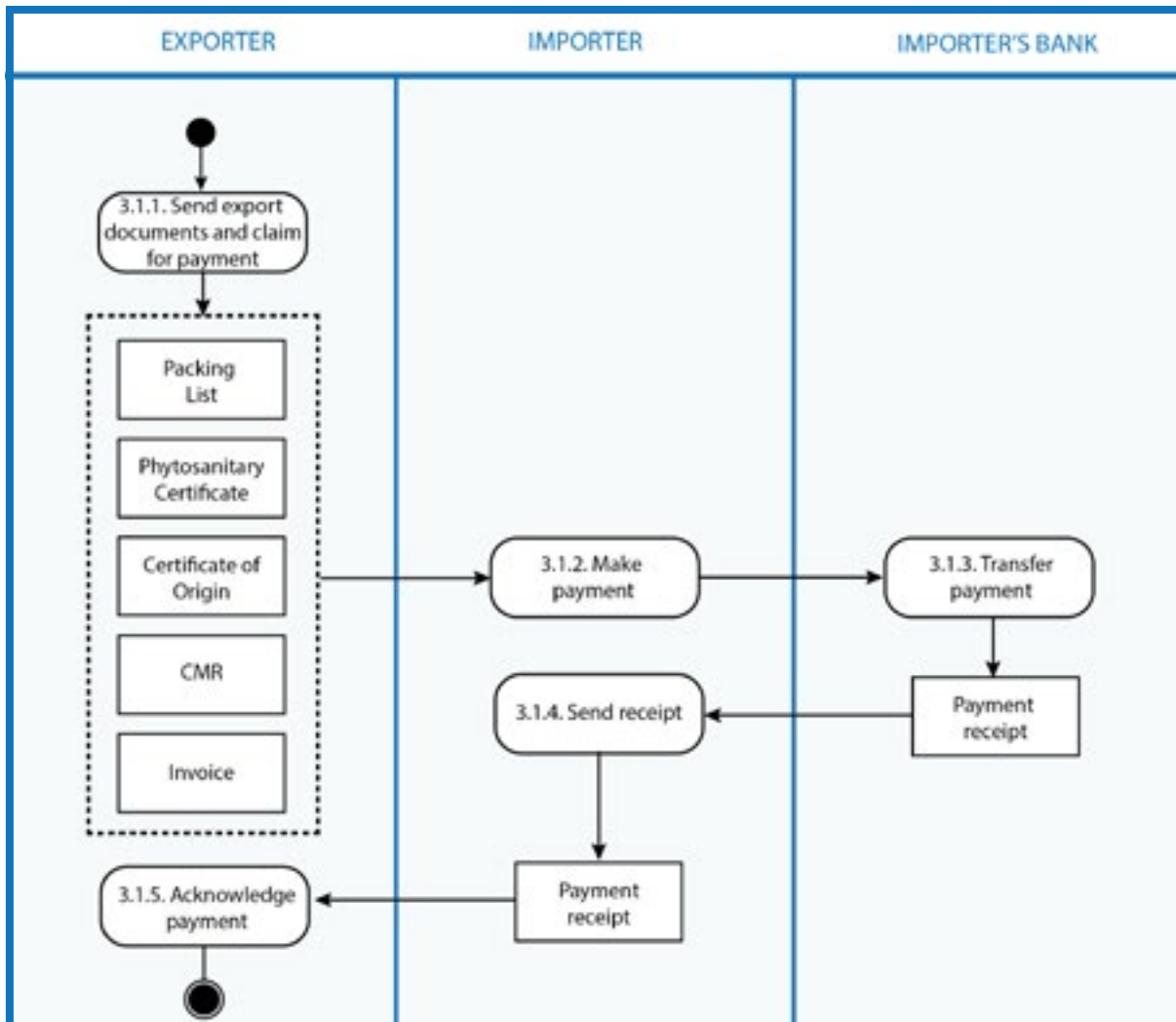


As shown in figure A3.13, claiming payment involves:

- Exporter
- Importer
- Importer's bank

The payment depends on the terms and conditions set in the sales contract. In the case of the enterprises participating in this BPA, and as previously mentioned, the payment is organized in 2 instalments, with the first disbursed upon signing the sales contract. The second instalment is disbursed upon notifying the importer about the shipment's dispatch by email. The notification message is sent along with the copies of all the trade documents. The Importer wire transfers the second instalment to Exporter's bank account. The entire process takes less than one day, and funds are deposited into the bank account within 5 days. Figure A3.14 maps the activities associated with claiming payment.

Figure A3.14 Claim payment activity diagram



Name of process area	3. Pay
Name of Business process	3.1 Claim payment
Process participants	<ul style="list-style-type: none"> – Exporter – Importer – Importer's Bank
Related laws, rules, and regulations	<ul style="list-style-type: none"> – Incoterms – Sales contract
Input and criteria to enter/begin the business process	<ul style="list-style-type: none"> – Customs clearance performed – Supporting documents collected – Goods are shipped to their final destination
Activities and associated documentary requirements	<p>3.1.1 Exporter notifies the Importer about the shipment of goods and claims the final payment. He also sends the scanned copies of the trade documents:</p> <ul style="list-style-type: none"> – Commercial Invoice. – Packing List. – Phytosanitary Certificate. – Certificate of Origin. – CMR. – Customs declaration <p>3.1.2 The Importer receives the documents and makes the final payment through bank transfer</p> <p>3.1.3 The Importer's bank accepts the payment and issues the payment receipt.</p> <p>3.1.4 The Importer sends the confirmation of the payment to the Exporter.</p> <p>3.1.5 The Exporter acknowledges the payment receipt.</p>
Output criteria to exit the business process	<ul style="list-style-type: none"> – Exporter received the final payment – Importer received documents required to complete import formalities.
Costs and resources	N/A
Average time required to complete the business process	<p>0,5 days for receiving payment receipt</p> <p>3-5 days , the time required for the funds to be deposited in the Exporters bank account</p>

A4. Export documents

As shown in table A4.1, the number of documents required for exporting dried fruits and vegetables from Armenia is limited to 7 documents. Other documents are obtained upon the request of the importer (CoO). Repetitive submission is limited the commercial invoice and sales contract, which traders have to submit three times for obtaining the phytosanitary certificate, the CoO and for passing customs.

Table A4.1 Documentary requirements for exporting dried fruits and vegetables from Armenia

<i>Document</i>	<i>Required by</i>	<i>Issued / filled by</i>	<i>Input in process</i>	<i>Comments</i>
1. Documents for goods (mandatory)				
Export Customs Declaration	Customs Service	Customs representative	SHIP process	Filled by Customs Representative
Commercial Invoice	Customs Service, CCI, FSIB	Exporter	SHIP process	Needed for customs clearance, getting CoO, phytosanitary certificate and for Importer
Packing List	Customs Service, CCI	Exporter	SHIP process	Needed for customs clearance, getting CoO, and transit
Sales Contract	Customs Service, CCI, FSIB	Exporter	SHIP process	Needed for customs clearance, getting CoO, phytosanitary certificate
Certificate of Origin	Importer	Chamber of Commerce and Industry	SHIP process	Not compulsory. Issued upon the request of the buyer.
Phytosanitary Certificate	Customs Service, Importer	Food Safety Inspection Body	SHIP process	Needed for Customs Clearance and competent authorities in the importing countries
2. Transport documents for shipping				
CMR for Road Transport	Customs Service, Transit	Carrier/Exporter	SHIP process	Needed for customs clearance in Armenia and for transit countries
TIR Carnet	Customs Service, Transit	Carrier/Exporter	SHIP process	Needed for customs clearance in Armenia and for transit countries
3. Inputs to the Getting the Phytosanitary Certificate sub-process				
Application form	FSIB	Exporter		Request for obtaining Phytosanitary Certificate
Commercial Invoice	FSIB	Exporter		Define name and quantity of goods to be introduced in the certificate and country of destination
Sales Contract	NSFS	Exporter		Define country of destination for checking importing country requirements.
Laboratory test analysis (Certificate of Analysis)	NSFS	Laboratory		For checking goods compliance with food safety regulation
4. Inputs to the Getting the Certificate of Origin sub-process				
Application form	CCI	Exporter		Request for confirmation of the goods origin
Declaration on origin of raw materials	CCI	Exporter		Confirms the origin of goods
Sales Contract	CCI	Exporter		Supports defining type of certificate to be issued
Commercial Invoice	CCI	Exporter		Supports defining type of certificate to be issued
Packing list	CCI	Exporter		Supports defining type of certificate to be issued

A5. Time process chart

The time required for exporting dried fruits and vegetables from Armenia to countries outside of the EAEU is 22 days. As shown in figure A5.1, obtaining phytosanitary certificate is the most time-consuming if laboratory tests are needed, since it takes up to 10 days to obtain the test results (depending on number of indicators investigated, obtaining the certificate of analysis may take up to 10 days). Negotiating and concluding the sales contract is the second most time-consuming, spanning over 5 days, even as it follows a standardized procedure (and, as such, cannot be further optimised).

The most optimized processes are those associated with obtaining the CoO and obtaining Customs Declaration. Each can be completed within one day. Nonetheless, obtaining Customs Declaration can be further optimised.

Transport is outsourced to a freight forwarding agency, which completes the arrangements over a period of two days and payment is claimed in two instalments and takes less than one day to complete. The final payment is claimed upon loading of goods onto the trucks and requests a confirmation of payment before dispatching the shipment to its destination. Exporters accept the SWIFT banking document as a proof of payment.

Figure A5.1 Time-procedure chart for exporting dried fruits and vegetables from Armenia

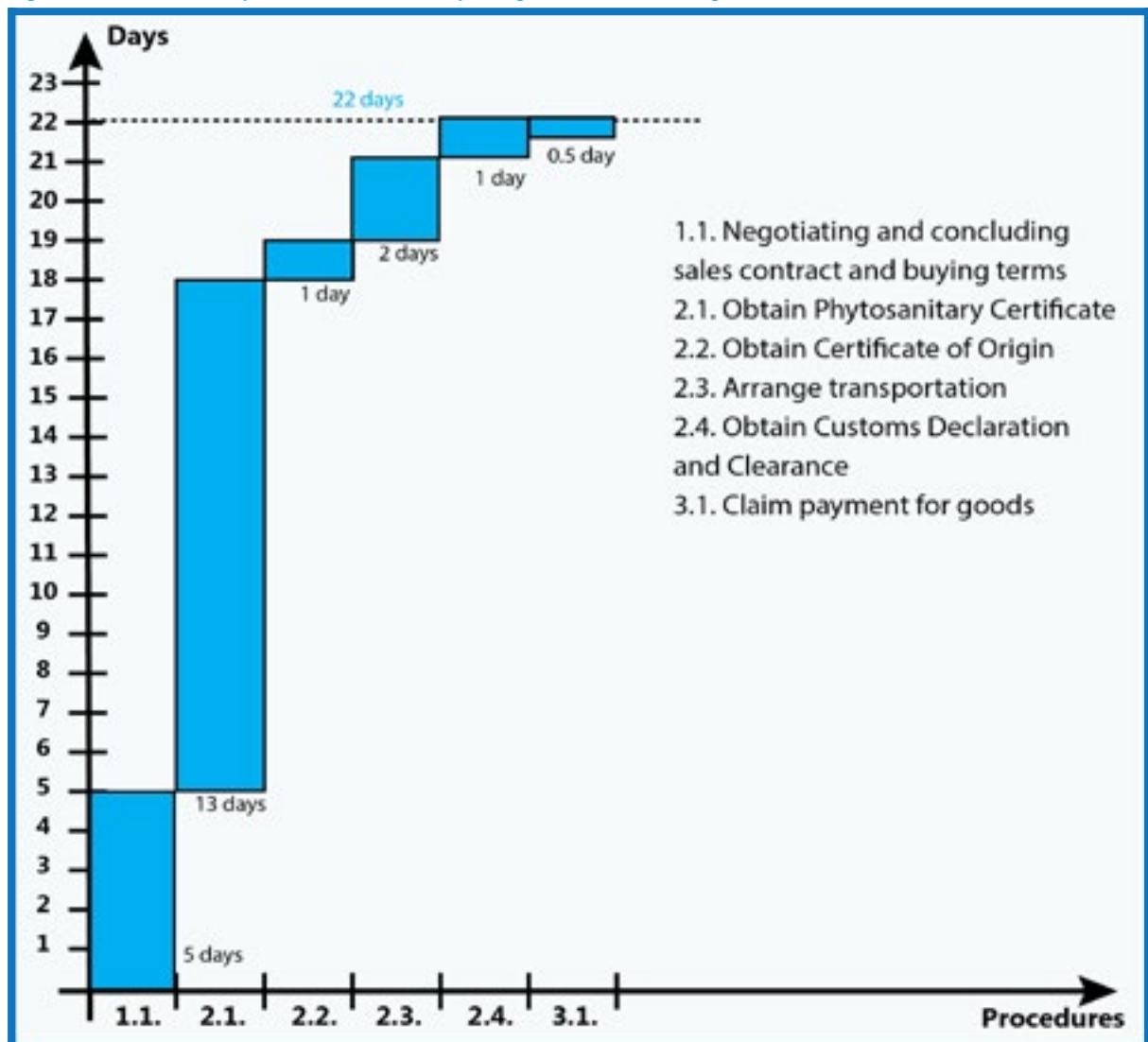


Table A5.1 shows processes that can be performed simultaneously and the relations of dependence between the 7 processes described in section A3.

Table A5.1 Duration and dependencies between businesses processes

Core business process	Duration	Previous processes	Simultaneous processes
1. Buy			
1.1 Negotiating and concluding sales contract and buying terms	5 days	N/A	N/A
2. Ship			
2.1 Obtain Phytosanitary certificate	13 days	1.1.	N/A
2.2 Obtain Certificate of Origin	1 day	1.1, 2.1	N/A
2.3 Arrange Transportation	2 days	2.2	N/A
2.4 Obtain Customs Declaration and Clearance	1 days	2.3, 3.1	N/A
3. Pay			
3.1 Claim payment for goods	0,5 days	2.3	2.4

A6. Recommendations

The BPA shows that exporting dried fruits and vegetables from Armenia follows a set of relatively smooth and efficient processes. Table A6.1 provides a number of recommendation for further simplifying these processes. The recommendations have direct contribution to the 2030 sustainable development goal (SDG) 16 (peace, justice and strong institutions) and indirect contributions to SDGs 8 (decent work and economic growth) and 9 (industry, innovation and infrastructure).

Table A6.1 Proposed recommendations

Core business process	Observation	Recommendation
Negotiate and conclude sales contract	<p>The process is simple and straight forward, but only for existing clients.</p> <p>Negotiating sales contracts with new buyers exceeds this time frame. Representatives of the interviewed companies reported that they are interested in selling their produce in the EU. However, they remain unable to do so, lacking information on export opportunities and regulatory requirements. The representatives noted that this applies to other exporters.</p> <p>These enterprises are at loss as to how to identify and approach prospective EU buyers. Moreover, EU buyers request samples, which are sent by express mail at the expense of the exporter (1,00 USD/per kilogram as opposed to 0,55 -0,65 USD/ per kilogram ; the cost of shipping by truck).</p> <p>The negotiations are complicated by the fact that buyers do not accept breaking the payments in two instalments (they insist on a single instalment upon delivery), which increases the risks assumed by the exporters. The interviewed exporters said that they accept offers that places the entire burden of risks on their companies.</p>	<ul style="list-style-type: none"> – Organize seminars to raise awareness over regulatory and documentary requirements for exporting dried fruits and vegetables to the EU. This carries direct contribution to SDG 16.10 (Ensure public access to information and protect fundamental freedoms, in accordance with national legislation and international agreements). – Organize export promotion activities to selected EU markets. This will help enterprises expand their target markets and, thereof, enable them to achieve increased specialization in high value-added activities (SDG 8.2). – Raise awareness and companies' knowledge of trade finance instruments (e.g., letters of credit and factoring) and on the requirements for accessing trade finance loans available on the market. This will contribute to SDG 8.3 (Promote development-oriented policies that support productive activities, decent job creation, entrepreneurship, creativity and innovation, and encourage the formalization and growth of micro-, small- and medium-sized enterprises, including through access to financial services).

Table A6.1 Proposed recommendations (continued)

<i>Core business process</i>	<i>Observation</i>	<i>Recommendation</i>
2.1 Obtain Phytosanitary certificate	<p>The Phytosanitary Certificate is provided by NSFS upon request of the exporter. The application can be submitted in electronic format.</p> <p>The procedure for issuing the phytosanitary certificate includes site visit by the inspector. The certificate is issued without laboratory tests for products controlled during the annual inspections and if no phytosanitary risks were identified during the physical examination. The process takes up to 3 days.</p> <p>Laboratory test analysis if the inspector finds the products as posing health risks. There are written procedures for sampling, and samples are accompanied by a form filled in by the inspector.</p> <p>All companies participated in the BPA mentioned that the laboratory test analyses are carried out only by one laboratory, which is located in Yerevan. This partly explains the long wait period for obtaining the test results</p>	<p>Consider establishing additional testing labs in major agricultural regions for supporting the certification of dried fruits and vegetables. This generate immediate savings for the enterprises, which carry positive bearing on SDG 9.2 (Promote inclusive and sustainable industrialization and, by 2030, significantly raise industry's share of employment and gross domestic product, in line with national circumstances, and double its share in least developed countries).</p>
2.2 Arrange Transportation	The process is simple and optimised	–
2.4 Obtain the Certificate of Origin	The process is simple and optimised	–
2.5 Pass customs	<p>Customs declarations are submitted to the Customs Service in electronic format by customs representatives.</p> <p>Exporters noted that the cargo is subjected to physical control before the submission of the customs declaration. It is sometimes the case that the same lot is submitted to another round of physical check if flagged out by the system.</p>	<ul style="list-style-type: none"> – Implement Authorized Operator schemes. This measures will generate immediate savings for the enterprises, which carry positive bearing on SDG 9.2 – Eliminate the first round of physical checks, since it leads to duplication of work and does not add value to risk management. This measures will generate immediate savings for the enterprises, which carry positive bearing on SDG 9.2.
3.1 Claim Payment	<p>Payment is divided in two instalments: advance payment made on the date of issuing of the invoice and final payment within the day of goods loading.</p> <p>Usually, both payments are completed in less than one day, while receiving funds in the bank account of Exporter last around 5 days.</p> <p>Payment delays may cause a delay in the delivery, as the exporter will not release the goods if final payment in not performed. However, this rule may be neglected by the exporter on his own risks if he decides to export the goods without confirmation of payment made.</p>	<ul style="list-style-type: none"> – Develop and implement export financing and risks insurance schemes. This will contribute to SDG 8.3

Regulatory and Procedural Barriers to Trade in Armenia

Needs Assessment

Information Service
United Nations Economic Commission for Europe

Palais des Nations
CH - 1211 Geneva 10, Switzerland
Telephone: +41(0)22 917 44 44
E-mail: unece_info@un.org
Website: <http://www.unece.org>

United Nations publication
Sales No. E.19.II.E.28
ISBN 978-92-1-117208-9

