

© International Baccalaureate Organization 2022

All rights reserved. No part of this product may be reproduced in any form or by any electronic or mechanical means, including information storage and retrieval systems, without the prior written permission from the IB. Additionally, the license tied with this product prohibits use of any selected files or extracts from this product. Use by third parties, including but not limited to publishers, private teachers, tutoring or study services, preparatory schools, vendors operating curriculum mapping services or teacher resource digital platforms and app developers, whether fee-covered or not, is prohibited and is a criminal offense.

More information on how to request written permission in the form of a license can be obtained from <https://ibo.org/become-an-ib-school/ib-publishing/licensing/applying-for-a-license/>.

© Organisation du Baccalauréat International 2022

Tous droits réservés. Aucune partie de ce produit ne peut être reproduite sous quelque forme ni par quelque moyen que ce soit, électronique ou mécanique, y compris des systèmes de stockage et de récupération d'informations, sans l'autorisation écrite préalable de l'IB. De plus, la licence associée à ce produit interdit toute utilisation de tout fichier ou extrait sélectionné dans ce produit. L'utilisation par des tiers, y compris, sans toutefois s'y limiter, des éditeurs, des professeurs particuliers, des services de tutorat ou d'aide aux études, des établissements de préparation à l'enseignement supérieur, des fournisseurs de services de planification des programmes d'études, des gestionnaires de plateformes pédagogiques en ligne, et des développeurs d'applications, moyennant paiement ou non, est interdite et constitue une infraction pénale.

Pour plus d'informations sur la procédure à suivre pour obtenir une autorisation écrite sous la forme d'une licence, rendez-vous à l'adresse <https://ibo.org/become-an-ib-school/ib-publishing/licensing/applying-for-a-license/>.

© Organización del Bachillerato Internacional, 2022

Todos los derechos reservados. No se podrá reproducir ninguna parte de este producto de ninguna forma ni por ningún medio electrónico o mecánico, incluidos los sistemas de almacenamiento y recuperación de información, sin la previa autorización por escrito del IB. Además, la licencia vinculada a este producto prohíbe el uso de todo archivo o fragmento seleccionado de este producto. El uso por parte de terceros —lo que incluye, a título enunciativo, editoriales, profesores particulares, servicios de apoyo académico o ayuda para el estudio, colegios preparatorios, desarrolladores de aplicaciones y entidades que presten servicios de planificación curricular u ofrezcan recursos para docentes mediante plataformas digitales—, ya sea incluido en tasas o no, está prohibido y constituye un delito.

En este enlace encontrará más información sobre cómo solicitar una autorización por escrito en forma de licencia: <https://ibo.org/become-an-ib-school/ib-publishing/licensing/applying-for-a-license/>.

Economics
Standard level
Paper 2

Tuesday 10 May 2022 (morning)

1 hour 45 minutes

Instructions to candidates

- Do not open this paper until instructed to do so.
- You are permitted access to a calculator for this paper.
- Unless otherwise stated in the question, all numerical answers must be given exactly or correct to two decimal places.
- You must show all your working.
- Answer one question.
- Use fully labelled diagrams and references to the text/data where appropriate.
- The maximum mark for this examination paper is **[40 marks]**.

Answer **one** question.

1. Read the extracts and answer the questions that follow.

Text A — Overview of North Macedonia

- 1 North Macedonia is a small, landlocked nation that shares borders with five countries, including Bulgaria and Greece. Bulgaria and Greece are members of the European Union (EU) common market, which North Macedonia hopes to join soon. Since the country began negotiating for EU membership, trade with the EU has increased rapidly and now accounts for 75 % of North Macedonia's exports and 62 % of its imports.
- 2 Despite its small market, with a population of approximately 2 million, North Macedonia's proximity to the EU, low wages and expected entry into the common market have attracted foreign investors. Greece, its richest neighbour, was its third highest source of foreign investment in 2019. The lower cost of living also appeals to Greek tourists.
- 3 EU companies have invested in the financial, telecommunication, energy and food processing industries in North Macedonia. Many of the most profitable companies are from the EU. If EU membership is granted, **foreign direct investment (FDI)** inflows may increase as firms located in North Macedonia will be allowed to bypass all custom checks and enjoy tariff-free trade within the common market. One particular challenge for North Macedonia, however, is that most of the profits of foreign companies are likely to be repatriated (sent back to the companies' home countries).
- 4 In 2018, North Macedonia's export revenue was US\$7.57 billion and its import expenditure was US\$9.56 billion. The country's main exports are iron and steel, clothing and accessories, and food products. Food, livestock and consumer goods account for 33 % of imports while the remainder are machinery, petroleum and other materials needed for the industrial production process.
- 5 The manufacturing sector, which now employs 31 % of the labour force, has gained more importance. The agricultural sector remains strong, contributes over 10 % of North Macedonia's gross domestic product (GDP) and employs about 16 % of the country's workforce.
- 6 The **unemployment rate** decreased from over 30 % in 2010 to 17.3 % in 2019. However, youth unemployment is almost 40 %. Over 20 % of the population lives below the poverty line. Unemployment and poverty contribute to high rates of emigration. More than 20 % of the North Macedonian population have emigrated since 1994, mostly to the EU. As a member of the EU, North Macedonia will enjoy free movement of labour which will make it easy for its citizens to live and work in other EU countries.

Text B — North Macedonia's economic reforms

- 1 To be considered for EU membership, North Macedonia implemented a series of supply-side policies to reform its economy. The EU imposes strict requirements for membership but provides financial assistance to countries preparing for membership. North Macedonia has received 633 million euros (the currency of the EU) to help with the reforms.
- 2 Most of the supply-side policies seek to improve the international competitiveness of North Macedonia's industries. The authorities are increasing access to education and training for workers. The expansion of the transport network and other infrastructure is also expected to increase efficiency.

(This question continues on the following page)

(Question 1 continued)

- 3** Protection of the environment is also on the list of requirements for EU membership. North Macedonia aims to reduce its dependence on coal and to instead promote the use of solar, wind and hydropower technologies. These low-carbon energy sources would help decrease its air pollution, which is among the worst in Europe.
- 4** The reforms, which started in 2014, have shown progress. Exports and manufacturing output are more diversified and more concentrated on high-value products. To attract FDI, North Macedonia maintains one of the lowest tax rates on corporate income in the region. The central bank also prevents the denar (North Macedonia’s currency) from appreciating against the euro through managing foreign reserves. However, skill shortages and a mismatch of skills with those required by companies discourage foreign firms from investing. Important investment gaps in public infrastructure also remain.

Text C — North Macedonia’s trade agreements

North Macedonia participates in five free trade agreements (FTAs), that together cover 95% of its exports and 78% of its imports. Most of its trade with the EU is already free but imports of wine, beef and fish products are still subject to quotas. North Macedonia is currently a net importer of agricultural and food products. All protectionist measures on EU products would be removed upon entry into the common market.

Table 1: Consumer Price Index (CPI) for North Macedonia (base year = 2010)

	CPI
2016	109.4
2017	110.9
2018	112.5
2019	113.4

Table 2: Economic data for North Macedonia

	2016	2017	2018	2019
GDP (real growth rate, %)	2.9	1.1	2.7	3.6
Unemployment rate (%)	23.7	22.4	20.7	17.3
Foreign reserves (US\$ billion)	2.5	2.5	3	3.3
FDI, net inflows (US\$ million)	549.4	380.7	648.7	476.9
Current account balance (% of GDP)	–2.9	–0.9	–0.2	–2.8

(This question continues on page 5)

Turn over

Blank page

(Question 1 continued)

- (a) (i) Define the term *foreign direct investment (FDI)* indicated in bold in the text (**Text A**, paragraph **3**). [2]
- (ii) Define the term *unemployment rate* indicated in bold in the text (**Text A**, paragraph **6**). [2]
- (b) (i) Using information from **Table 1**, calculate North Macedonia’s annual rates of inflation between 2016 and 2019. [2]
- (ii) Using your answer to part (b)(i), identify the year disinflation set in. [1]
- (iii) Using information from **Text A**, paragraph **4**, calculate North Macedonia’s balance of trade in 2018. [2]
- (c) Using an AD/AS diagram, explain the likely impact of North Macedonia’s supply-side policies on its full employment level of output (**Text B**, paragraph **2**). [4]
- (d) Using an externalities diagram, explain how dependence on coal could be a source of market failure (**Text B**, paragraph **3**). [4]
- (e) Using an exchange rate diagram, explain how the central bank of North Macedonia is preventing an appreciation of the denar against the euro (**Text B**, paragraph **4**). [4]
- (f) Using an international trade diagram, explain the likely impact of the removal of import quotas on North Macedonia’s production of wine (**Text C**). [4]
- (g) Using information from the texts/data and your knowledge of economics, discuss the likely economic effects on North Macedonia of its entry into the European Union (EU) Common Market. [15]

Turn over

2. Read the extracts and answer the questions that follow.

Text D — Overview of Sierra Leone

- 1 Sierra Leone is located on the west coast of Africa. Economic activity is concentrated on agriculture and mining, which together contribute 70 % of **gross domestic product (GDP)** and 77 % of export revenue.
- 2 Economic growth rates fluctuated from +20.1 % in 2013 to –21.5 % in 2015. The economic slowdown in China contributed to a significant drop in mining activities and a fall in Sierra Leone’s export revenue. China is Sierra Leone’s largest market for exported minerals.
- 3 Economic growth rates in Sierra Leone have improved in recent years due to increased activity in agriculture, mining and construction. Increased employment in these labour-intensive sectors could help reduce poverty, which remains widespread in the country. Sierra Leone’s ranking in the Inequality adjusted Human Development Index (IHDI) is very low.
- 4 The fall in export revenue has led to a 50 % depreciation of the leone (Sierra Leone’s currency) over the past five years. Even recent increases in the price of commodities have not been sufficient to offset the high import expenditure on food, medication, cars and capital equipment.
- 5 The depreciation of the leone has led to inflationary pressures. The removal of a fuel subsidy resulted in an increase in the price of fuel and pushed the inflation rate from 16.8 % in 2018 to 17.2 % in 2019.
- 6 To make matters worse, access to essential, life-saving health care services in Sierra Leone is often disrupted by regional conflicts. Healthcare in Sierra Leone is generally charged for and is provided by a mixture of government, private and non-governmental organizations (NGOs). NGOs are relied on to protect the health and wellbeing of citizens. NGOs help to achieve this by distributing medicine and teaching families about hygiene and proper sanitation.
- 7 Another area of concern is the government debt, which stood at 62 % of GDP in 2019. The government has reduced its budget deficit from 5.7 % to 3.4 % of GDP by minimizing non-payment of taxes and implementing cost-saving measures such as the automation of some government services.
- 8 The newly elected government has made good progress in its fight against corruption, but it is facing many macroeconomic challenges. Foreign aid has been reduced, infrastructure is inadequate and many economic activities remain untaxed. Youth unemployment is also high due to low literacy rates and a lack of skills required in the job market.

Text E — Sierra Leone’s new development plan

- 1 In 2019, the government of Sierra Leone introduced a new five-year development plan. The plan includes policies aimed at increasing the welfare of Sierra Leone’s citizens by working towards the Sustainable Development Goals.

(This question continues on the following page)

(Question 2 continued)

- 2** The development plan ensures access to free primary and secondary education in all public schools. The cost of education is the main reason that many households are not sending their children, particularly girls, to school. For those paying private education fees, switching to public education would allow more of their household income to be spent on other essential services and farming equipment.
- 3** The expected increase in human capital should facilitate economic activities and lead to investment. Schools now teach modern farming practices, such as those involving the use of farm machinery and fertilizers. These would benefit rice farmers and help achieve food security (ensuring people have access to enough food).
- 4** The provision of technical education should not only increase agricultural output but also allow for the diversification of the economy. The manufacturing sector contributes only 2% of the country’s GDP and could provide an alternative source of employment. The five-year plan also addresses the lack of infrastructure, in particular for electricity generation, which has so far restricted the development of the manufacturing sector.

Text F — Investment in Sierra Leone

- 1** The World Bank ranked Sierra Leone 160th among 190 countries in 2018 for the ease of doing business, citing difficulties in accessing electricity and in obtaining loans and business permits. Government borrowing from the banking sector has increased in recent years, resulting in high interest rates and limited credit availability for the private sector. Foreign investors, however, usually bring capital from abroad.
- 2** Despite the challenges, Sierra Leone offers significant opportunities for investment. Foreign investors are involved in the energy sector, infrastructure, agriculture, tourism, and natural resources. Reduced tax rates on corporate income are offered for investments in agriculture and tourism.

Table 3: Economic data for Sierra Leone

	2017	2018
Real GDP (US\$ million)	3497	3617
Exports of goods and services (US\$ million)	974	714
Imports of goods and services (US\$ million)	1796	1603
Net income (US\$ million)	-101	-112
Net current transfers (US\$ million)	400	324

(This question continues on page 9)

Turn over

Blank page

(Question 2 continued)

- (a) (i) Define the term *gross domestic product (GDP)* indicated in bold in the text (**Text D**, paragraph **1**). [2]
 - (ii) List **two** dimensions of the Inequality adjusted Human Development Index (IHDI) (**Text D**, paragraph **3**). [2]
 - (b) (i) Using the information in **Table 3**, calculate the change in Sierra Leone’s current account balance from 2017 to 2018. [3]
 - (ii) Using the information in **Table 3**, calculate Sierra Leone’s rate of economic growth between 2017 and 2018. [2]
 - (c) Using an exchange rate diagram, explain how the fall in export revenue contributed to the depreciation of the leone (**Text D**, paragraph **4**). [4]
 - (d) Using an AD/AS diagram, explain how the increase in the price of fuel might have contributed to inflation (**Text D**, paragraph **5**). [4]
 - (e) Using a poverty cycle diagram, explain how the provision of free primary and secondary education may help households break the poverty cycle (**Text E**, paragraph **2**). [4]
 - (f) Using a demand and supply diagram, explain how modern farming practices could affect the market for rice (**Text E**, paragraph **3**). [4]
 - (g) Using information from the texts/data and your knowledge of economics, evaluate the impact of government intervention in promoting economic growth and economic development in Sierra Leone. [15]
-

References:

- Text A** World Bank Data Bank, n.d. *North Macedonia economy briefing: Prospects for Macedonian-Greek Economic Relations After the Prespa Agreement* [online] Available at: <https://data.worldbank.org/country/north-macedonia> [Accessed 20 April 2021]. Source adapted.
- Text C** World Trade Organization, n.d. *WT/TPR/S/390 • The Republic of North Macedonia* [online] Available at: https://www.wto.org/english/tratop_e/tpr_e/s390_sum_e.pdf [Accessed 20 April 2021]. Source adapted.
- Table 1** Data from The World Bank [online] Available at: <https://data.worldbank.org/> [Accessed 20 April 2021]. Source adapted.
- Table 2** Data from The World Bank [online] Available at: <https://data.worldbank.org/> [Accessed 20 April 2021]. Source adapted.
- Text E** Sustainable Development Goals Knowledge Platform, n.d. [online] Available at: <https://sustainabledevelopment.un.org/memberstates/sierraleone> [Accessed 20 April 2021]. Source adapted.
- Text F** U.S. Department of State, n.d. *2018 Investment Climate Statements: Sierra Leone* [online] Available at: <https://www.state.gov/reports/2018-investment-climate-statements/sierra-leone/> [Accessed 20 April 2021]. Source adapted.
- Table 3** Data from The World Bank [online] Available at: <https://data.worldbank.org/> [Accessed 20 April 2021]. Source adapted.

All other texts, graphics and illustrations © International Baccalaureate Organization 2022