

SECTION A (15 MARKS)

THIS SECTION CONTAINS QUESTIONS FROM TOPOGRAPHY MAP

ANSWER ALL QUESTIONS

Question 1

Study the extract of the survey Map of Mongar, No. **78M/3** and answer the following questions.

- a) Define index contour. [1]

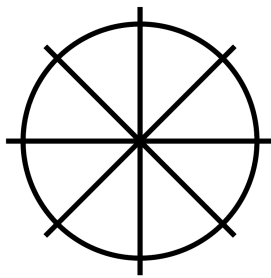
- b) Find the six-figure grid reference of the Lhakhang at Yadorabir. [1]

- c) Pem prefers to settle and start a business at grid square 8020. Why do you think so? [2]
Justify your answer with **TWO** reasons.

- d) Why are there only few settlements in the north-western part of the topographic map [1]
map? Give **TWO** reasons.

- e) What do the following conventional symbols represent? [1]

i.



ii.



- f) How is the drainage pattern in grid square 2060 different from that of the drainage [2]
pattern in grid square 4070?

g) Interpret the statement scale of the map provided to you. [1]

h) On a weekend, your parents want to go to Mongar from Kurizampa to sell the vegetables. Which mode of transport would you recommend and why? [2]

- i) Tashi, the caretaker of Serbum Gompa was called by Mongar Dzongda for a meeting pertaining to renovation of Serbum gompa. How many kilometres will he need to travel? Calculate the direct distance.

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- j) Which part of the map would be best to settle down? Give **ONE** reason. [1]

SECTION B (20 MARKS)

THIS SECTION CONTAINS **THREE** QUESTIONS FROM THE
PRINCIPLES OF GEOGRAPHY AND WORLD STUDIES.

ATTEMPT ANY **TWO** QUESTIONS

Question 2

- a) Define the term '**oblate spheroid**'.

[1]

- b) What problems would be faced if the international dateline was straight?

[2]

- c) Define the following terms with reference to the methods of lumbering. [2]
- i. Landing
 - ii. Limbing

- d) Cocoa is the main cash crop of Ghana. How has cocoa contributed towards the economic development of Ghana? Explain any **TWO** contributions. [2]

Question 3

- a) Which of the following is **NOT** the name given to the coniferous forest? Choose the correct answer and circle it. [1]

- A Cold Temperate Type
- B Siberian Type
- C Tundra Type
- D Taiga

- b) Study the diagram given below to explain that the earth is not flat. [2]



- c) Lumbering is one of the most important economic activities in the coniferous forest region. However, sustainability of the forest is a concern. What measures should lumberjacks take to maintain the sustainability of the forest? List any **FOUR** measures. [4]

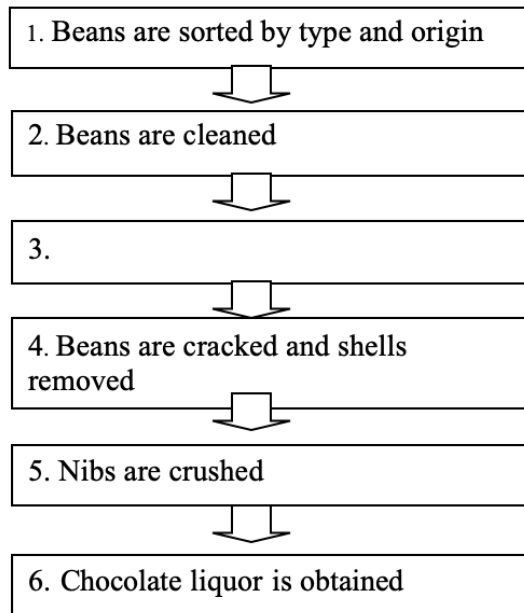
- d) Your parents living in Samtse grow oranges on a large scale but the sale of the fruits does not fetch good income. After having learnt about orchard farming in California, suggest **THREE** ways to improve the sale. [3]

Question 3

a) Why is the mixed farming important in the Prairies? [3]

- b) Complete the flow chart on cocoa processing in the factory.

[1]



- c) Kinley takes a flight from Tokyo (139°E) at 4:35 PM to Houston (95°W). She arrives in Houston at 2:35 PM. How much is the time difference between Houston and Tokyo?

[2]

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- d) Give **TWO** reasons why the new year eve is celebrated in summer in Australia while it is celebrated in winter in Japan. [2]

- e) Is cocoa cultivation feasible in Bhutan? Justify your answer with **TWO** reasons. [2]

SECTION C (30 MARKS)

THIS SECTION CONTAINS **FIVE** QUESTIONS FROM GEOGRAPHY OF BHUTAN.
ANSWER ANY **THREE** QUESTIONS

Question 5

- a) Define the term urbanization. [1]

- b) “A healthy ecology is the basis for a healthy economy”. How does a healthy environment help in the economic growth of a nation? Give any **TWO** points. [2]

- c) “About 60 youth registered with land use right system project to take up the agro farming and livestock in rural areas. Through this project a group of individuals will receive the land kidu”. How would this project benefit in achieving self-reliance? Give **TWO** benefits. [2]

- d) Which sources of energy, biogas or thermal are viable and environmental friendly for Bhutan? Justify with **TWO** reasons. [2]

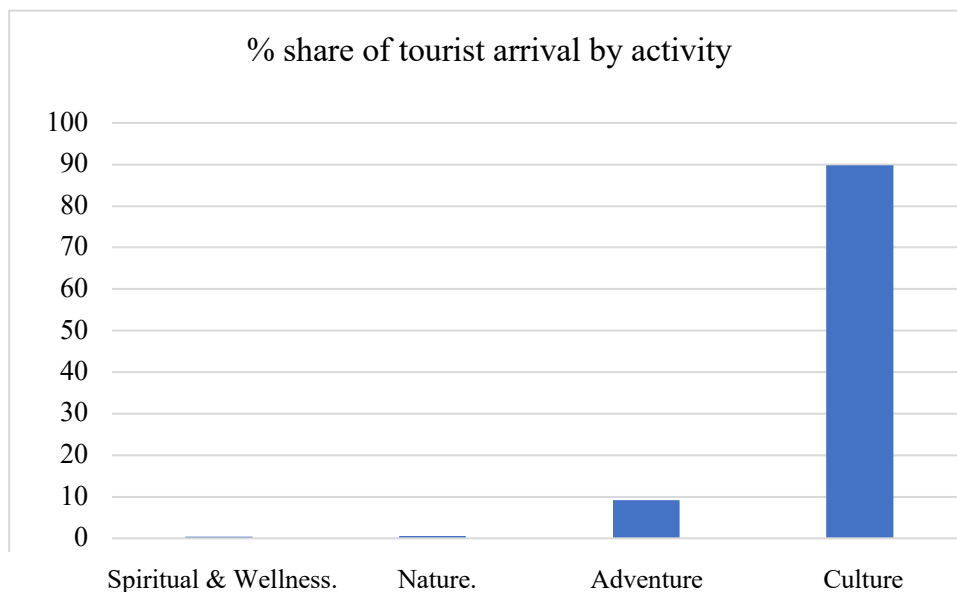
e) With modernization the number of pre-modern industries are declining. Suggest [3]
any **THREE** measures to promote the growth of pre-modern industries.

Question 6

- a) Towns and cities that develop as a result of administrative functions are called

- b) The Ministry of Information and Communication has established e-payment gateway in collaboration with Royal Monetary Authority and the banks to foster online payments or transactions. How would this make people's lives easier? Write **TWO** points. [2]

c) The following table shows the tourist arrival by activity in Bhutan.



i. Why do the tourists visit Bhutan?

[1]

ii. Suggest **TWO** measures to preserve culture and traditions of Bhutan.

[2]

- d) Naka is a wealthy dairy farmer living in Wangduephodrang. He wants to generate electricity using biogas or wind. Suggest which of these two sources of energy would be feasible for him? Justify with **TWO** reasons. [2]

- e) Population and Housing Census of Bhutan (PHCB) 2017, reveals that there is an increase in the total population of Bhutan by 100,571 persons as compared to 2005 PHCB. Explain **TWO** positive impacts of it. [2]

Question 7

- a) The table below provides information on Agro-ecological zones of Bhutan.

[3]

Agro ecological zone	Altitude range (m.a.s.l)	Annual rainfall (mm)	Air temperature		
			Max °C	Min °C	Mean °C
0. Alpine	3600-4600	<650	12.0	-0.9	5.5
1. Cool Temperate	2600-3600	650-850	22.3	0.1	9.9
2. Warm temperate	1800-2600	650-850	26.3	0.1	12.5
3. Dry Subtropical	1200-1800	850-1200	28.7	3.1	17.2
4. Humid subtropical	600-1200	1200-2500	33.0	4.6	19.5
5. Wet Subtropical	150-600	2500-5500	34.6	11.6	23.6

Which zone would be the best for the cultivation of paddy? Provide any **TWO** reasons.

b) Define spatial interaction.

[1]

c) In a nucleated settlement, ground floors were used to keep animals in the olden days. Do you think people should continue with this practice? Give any **TWO** reasons.

[2]

- d) Explain **TWO** roles of mass media in the society. [2]

- e) Do you agree that the establishment of Hydro Power Plant is a boon to Bhutan's economic growth ? Justify your answer with **TWO** reasons. [2]

Question 8

- a) Write **TRUE** or **FALSE** for the following statements in the space provided. [2]

i. Chukha Hydro Power Corporation Limited has a production capacity of 363 MW.	
ii. Bellows are used by blacksmith to produce heat from coal fire.	

- b) The transformation of food and energy from one organism to another is called [1]

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- c) Do you think the conduct of rituals to please local deities for bountiful harvest and rainfall would increase a farmer's income? Justify your answer with **TWO** reasons. [2]

- d) Mention **THREE** impacts of global warming on Bhutan if the world temperature increases in the range of 1.5 °C and 4.5 °C by the year 2030. [3]

e) Before the generation of hydroelectricity, Bhutanese people used *Mebchi* for indoor lighting at night. How would this contribute to the global warming? Give **TWO** reasons. [2]

Question 9

- a) Define Chlorofluorocarbon and name **ONE** household item responsible for its release into the atmosphere. [2]

- b) How has the shift in farming practices from traditional to modern benefitted the farmers in Bhutan? Mention **TWO** points. [2]

c) Urban centres like Thimphu is beginning to feel the heat of traffic congestion and limited parking spaces with increasing number of vehicles. If you were the Thrompon how would you address this problem? Suggest any **THREE** measures. [3]

- d) As per the Population and Housing Census of Bhutan 2017, migrant population is largely made up of people in the younger age groups. Write **THREE** consequences which villages might face as a result of it. [3]

SECTION D (15 MARKS)

THIS SECTION CONTAINS MAP WORK ON ASIA, SOUTH ASIA AND BHUTAN
ANSWER ALL QUESTIONS

Question 10

[5]

In the outline map of Asia provided:

- a) Mark with thick lines and name the mountain ranges Khingan and Altai.
- b) Mark with thick dot and name Laos and Vietnam.
- c) Mark with thick lines and name the rivers Irrawaddy and Euphrates.
- d) Shade and name Mongolian Plateau and Plateau of Arabia.
- e) Shade and name Aral Sea and Sea of Okhotsk.

Question 11

[5]

In the outline map of South Asia provided:

- a) Mark with thick dot and name Dhaka and Islamabad.
- b) Draw ▲ and name Nilgiris mountain and Garo hills.
- c) Shade and name Rann of Kutch and Thar desert.
- d) Mark with 'T' over tea producing region and 'W' over wheat producing region.
- e) Mark with thick lines and name the rivers Chenab and Mahaweli.

Question 12

[5]

In the outline map of Bhutan provided:

- a) Name the rivers Chamkhar chu and Dangme chu.
- b) Mark with (||) and name Ya la and Karchung la.
- c) Mark with thick dots and name the places Samtse and Pasakha.
- d) Mark with (Δ) and name Tsenda Gang and Masagang.
- e) Mark 'LD' over Lhuentse dzong and 'T' over Tsimalakha.

Map of Asia

This map is to be used for Question number 10



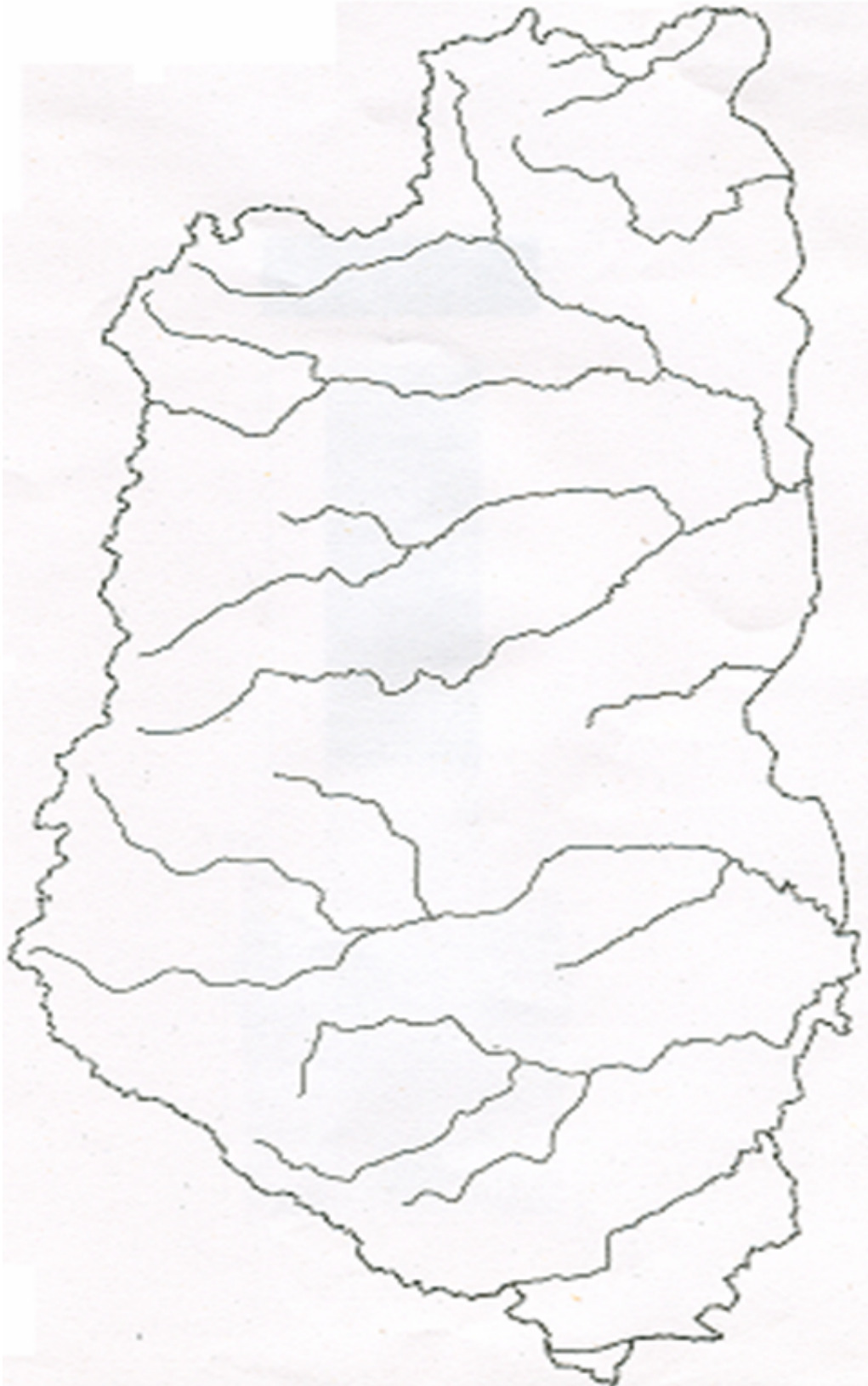
Map of South Asia

This map is to be used for Question number 11



Map of Bhutan

This map is to be used for Question number 12



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