

General Certificate of Education
January 2005
Advanced Subsidiary Examination



GENERAL STUDIES (SPECIFICATION B)
Unit 3 Space

GSB3

Wednesday 19 January 2005 Afternoon Session

In addition to this paper you will require:

- an 8-page answer book;
- a data booklet enclosed as an insert;
- graph paper;
- a calculator;
- drawing instruments.

Time allowed: 1 hour 15 minutes

Instructions

- Use blue or black ink or ball-point pen.
- Write the information required on the front of your answer book. The *Examining Body* for this paper is AQA. The *Paper Reference* is GSB3.
- Answer **all** questions.
- Do all rough work in your answer book. Cross through any work you do not want marked.

Information

- The maximum mark for this paper is 60.
- Mark allocations are shown in brackets.

Advice

- You will be assessed on your ability to:
 - select and use a form and style of writing appropriate to purpose and complex subject matter;
 - organise relevant information clearly and coherently, using specialist vocabulary when appropriate;
 - ensure text is legible, and spelling, grammar and punctuation are accurate, so that meaning is clear.

NO QUESTIONS APPEAR ON THIS PAGE

Study **Sources 1 to 4** provided in the separate data booklet and then answer the following questions.

1 **Total for this paper : 60 marks**

Look carefully at **Sources 1, 2, 3** and **4**.

Source 1 shows miles travelled per person per year on various forms of transport.

Source 2 shows weekly total household expenditure on transport in 2001.

Source 3 shows average number of days of moderate or higher air pollution in the UK for 1993-2002.

Source 4 shows road lengths by region in 2000.

Having studied the sources answer **all** of the following questions.

- (a) Using **Source 1** draw a bar chart showing the **difference** in miles travelled per person by mode of transport between 1992-1994 and 1999-2001. *(6 marks)*
- (b) Using **Source 1** and your bar chart comment on the differences and suggest reasons why they have happened. *(6 marks)*
- (c) (i) What percentage of the total weekly transport expenditure for households in the North East is spent on Insurance and taxation? (**Source 2**) *(2 marks)*
- (ii) The weekly expenditure on fuel in the West Midlands in 2000 was £14.20. Work out the percentage increase for this expenditure from 2000 to 2001. (**Source 2**) *(2 marks)*
- (iii) What is the mean weekly expenditure on total weekly transport costs in East England, South East, London and the South West? (**Source 2**) *(2 marks)*
- (d) Suggest and explain reasons for the generally decreasing trends shown in the graph in **Source 3**. *(9 marks)*
- (e) Why might the data in **Source 3** be of limited value? *(9 marks)*
- (f) The introduction of tolls on motorways may help to reduce many of our transport and pollution problems. How far do you agree with this view? *(12 marks)*
- (g) Industry and business should only be located in or near major towns and cities. To what extent do you agree with this assertion? *(12 marks)*

END OF QUESTIONS

General Certificate of Education
January 2005
Advanced Subsidiary Examination



GENERAL STUDIES (SPECIFICATION B)
Unit 3 Space

GSB3

Wednesday 19 January 2005 Afternoon Session

DATA BOOKLET

These sources are to be read in conjunction with Question 1 Unit GSB3

AVERAGE DISTANCE TRAVELLED PER PERSON PER YEAR BY MODE OF TRANSPORT
(Miles per person per year)

Mode of Transport	1992-1994	1996-1998	1999-2001
Walking	199	193	189
Private hire bus	110	103	95
Car	4954	5292	5354
Van/Lorry	281	244	211
Bus	355	344	342
Rail	298	290	368

Source: National Travel Survey 2001

Source 1

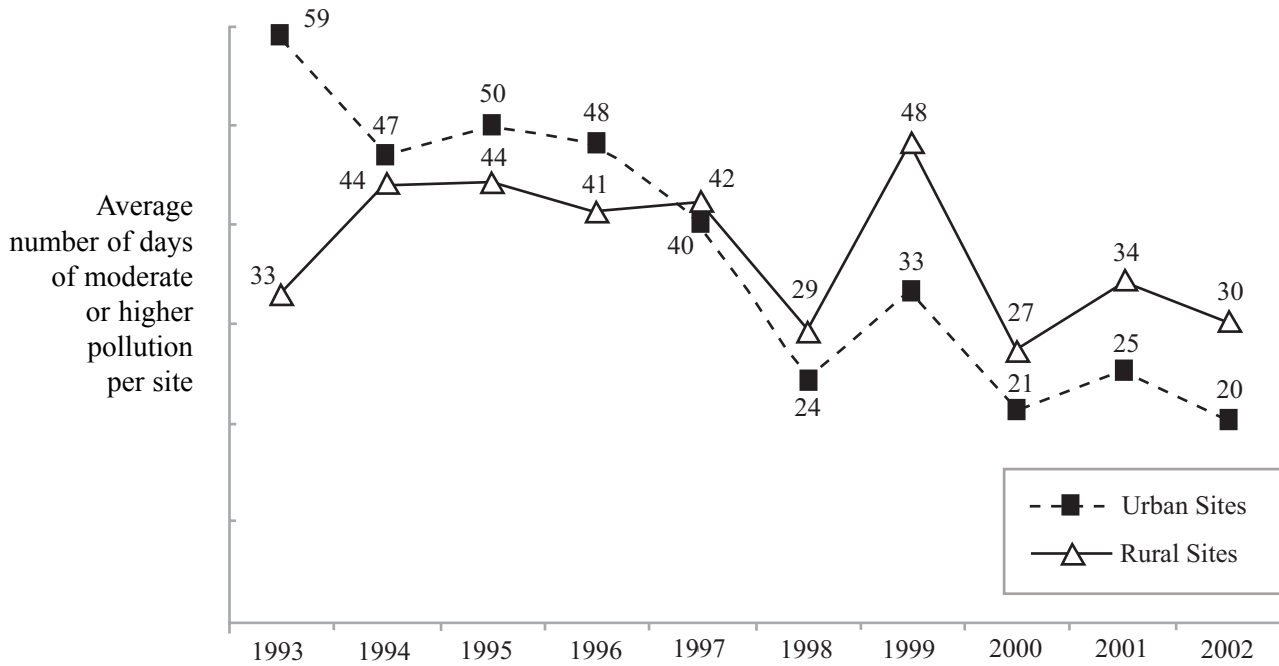
WEEKLY HOUSEHOLD EXPENDITURE ON TRANSPORT IN 2001
(Figures given in £)

REGION	Cars				Bus, tube, rail and coach fares	Total weekly transport costs per household
	Initial purchase & repairs	Spares and accessories	Insurance and taxation	Fuel costs		
North East	17.20	1.30	5.70	11.60	3.10	38.90
North West	26.60	1.90	7.30	13.80	2.30	51.90
Yorkshire & Humber	28.60	1.90	7.20	13.30	2.60	53.60
East Midlands	28.80	1.50	7.30	14.90	1.80	54.30
West Midlands	28.50	2.00	8.00	15.90	2.10	56.50
East England	34.20	1.90	8.60	16.80	4.50	66.00
London	26.30	1.40	7.50	11.00	6.10	52.30
South East (Exc. London)	31.80	2.40	8.50	17.10	4.50	64.30
South West	29.20	2.10	7.80	15.49	1.90	56.49

Source: adapted from Family Expenditure Survey, Department for Transport

Source 2

**AVERAGE NUMBER OF DAYS OF MODERATE OR HIGHER AIR POLLUTION, UK
1993-2002**



Source: Department for Environment, Food & Rural Affairs © Crown copyright 2003

Source 3

ROAD LENGTHS BY REGION 2000

(Lengths in km)

REGION	Motorways	NON BUILT UP AREAS		BUILT UP AREAS		Total
		Major roads	Minor roads	Major roads	Minor roads	
North East	60	1 250	5 530	510	8 650	16 000
North West	630	2 110	10 660	1 890	21 970	37 260
Yorkshire & Humber	360	2 010	11 880	1 290	16 670	32 210
East Midlands	190	2 840	14 450	990	12 530	31 000
West Midlands	390	2 260	13 890	1 260	14 820	32 620
East England	270	2 780	17 580	1 110	17 420	39 160
London	70	180	190	1 530	12 620	14 590
South East (Exc. London)	660	3 370	17 470	1 830	23 960	47 290
South West	330	3 670	29 070	1 270	15 370	49 710
TOTAL	2 960	20 470	120 720	11 680	144 010	299 840

Source: adapted from Department for Transport, 2000

Source 4

END OF DATA

THERE ARE NO DATA PRINTED ON THIS PAGE

ACKNOWLEDGEMENT OF COPYRIGHT-HOLDERS AND PUBLISHERS

Permission to reproduce all copyright material has been applied for. In some cases efforts to contact copyright holders have been unsuccessful and AQA will be happy to rectify any omissions of acknowledgements in future if notified.

Copyright © 2005 AQA and its licensors. All rights reserved.