

## BioMedical Admissions Test

Wednesday

2 November 2005

Morning

One hour

### SECTION 1      Aptitude and Skills

#### Instructions to Candidates

**Please read this page carefully, but do not open the question paper until you are told that you may do so.**

A separate answer sheet is provided for this section. Please check you have one. You also require a soft pencil and an eraser.

Please first write your name, date of birth, BioMedical Admissions Test candidate number and centre number in the spaces provided on the answer sheet. Please write very clearly.

Speed as well as accuracy is important in this section. **Work quickly, or you may not finish the paper.** There are no penalties for incorrect responses, only points for correct answers, so you should attempt all 35 questions. Unless otherwise stated, all questions are worth one mark.

Answer on the sheet provided. Many questions ask you to show your choice between options by shading a circle (or circles, if specified in the question). If questions ask you to write in words or numbers, be sure to write clearly in the spaces provided. If you make a mistake, erase thoroughly and try again.

Any rough work should be done on this question paper.

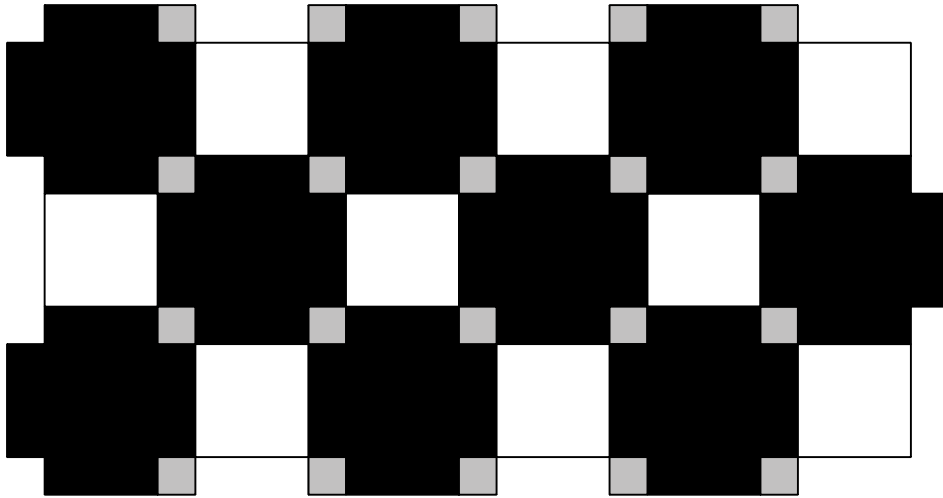
Calculators are NOT permitted.

**Please wait to be told you may begin before turning this page.**

*This paper consists of 20 printed pages and 4 blank pages.*

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- 1 The diagram below shows the tiling pattern for a club floor covering a large area. The pattern consists of three tiles: a large + shaped (shown black), a medium square (shown white) and a small square (shown grey).



Approximately what proportion of each type of tile will be needed for the large floor?

- A 1 large, 1 medium, 1 small  
 B 1 large, 2 medium, 4 small  
 C 1 large, 1 medium, 2 small  
 D 1 large, 2 medium, 1 small  
 E 1 large, 2 medium, 2 small
- 2 “The traditional school sports day – featuring races with clear winners and losers – is being replaced in some schools by “fun days” of non-competitive games. The rationale for this is that the self esteem of children who always lose in competitive races is damaged. But in adult life, competition for jobs, partners and social status is unavoidable. Schools should recognise this and revert to traditional sports days.”

Which **one** of the following is an assumption of the above argument?

- A Children are not naturally competitive.  
 B Children who lose competitive races will be unsuccessful in adulthood.  
 C Non-competitive games boost children’s self esteem.  
 D School sports should prepare children for adult life.

- 3 To pass the time on a long car journey, two children were playing a counting game.

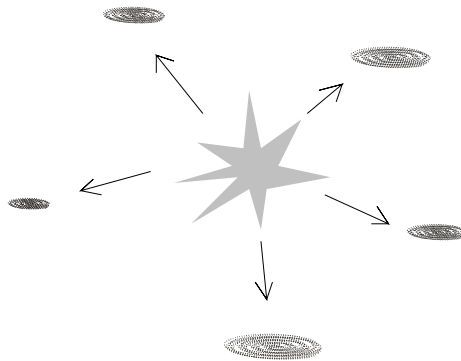
Julia counted the number of animals they saw, and Tim counted their legs.

After 15 minutes, all they had seen was birds and sheep. Julia had counted 13 animals and Tim had counted 36 legs.

How many sheep had they seen?

- A 4
- B 5
- C 6
- D 8
- E 10

- 4 If all the matter in the universe was created in the Big Bang, and if the universe has been expanding ever since, galaxies would tend to move apart, not towards each other.



However, galaxies can and do collide.

Which **one** of the following, if true, would best explain why these two statements are not incompatible?

- A Local movement is independent of overall expansion.
- B The Andromeda galaxy is moving towards our own galaxy.
- C Gravity is believed to be slowing down the universe's rate of expansion.
- D The movement of galaxies is analogous to that of spots on the surface of a balloon as it inflates.
- E The Big Bang did not occur *in* the universe, but created the universe.

- 5 The table below shows cancer deaths per million population as a function of age for England and Wales in the period 1971 to 1995.

	Cancer deaths - Male					Cancer deaths - Female				
	1971-75	1976-80	1981-85	1986-90	1991-95	1971-75	1976-80	1981-85	1986-90	1991-95
<b>All ages</b>	2721	2849	2970	3047	2968	2207	2349	2514	2661	2612
<b>0-4</b>	85	71	58	43	40	74	59	51	46	33
<b>5-9</b>	77	76	52	45	43	59	48	42	38	33
<b>10-15</b>	65	53	52	41	42	45	46	39	35	29
<b>15-19</b>	82	77	72	64	57	59	54	47	41	39
<b>20-24</b>	113	100	84	75	71	76	69	57	53	54
<b>25-29</b>	149	137	114	106	93	118	116	121	97	90
<b>30-34</b>	202	195	169	152	138	221	232	234	224	190
<b>35-39</b>	323	326	290	269	248	449	447	441	436	363
<b>40-44</b>	634	574	553	508	484	897	822	783	767	698
<b>45-49</b>	1319	1182	1074	1044	950	1633	1506	1410	1345	1223
<b>50-54</b>	2469	2458	2183	1995	1962	2468	2506	2316	2161	2027
<b>55-59</b>	4523	4332	4207	3806	3473	3428	3511	3583	3396	3036
<b>60-64</b>	7438	7315	7059	6888	6127	4492	4720	4943	5052	4623
<b>65-69</b>	11382	11183	10941	10701	10246	5786	6094	6441	6744	6619
<b>70-74</b>	15906	15749	15852	15817	14915	7351	7627	8184	8661	8768
<b>75-79</b>	19938	20960	21086	21542	20631	9478	9798	10167	10886	10891
<b>80-84</b>	22528	24442	26767	27481	26865	11725	12303	12791	13706	13661
<b>85+</b>	23695	25438	29661	31433	32902	13920	14678	16454	17610	16480

Between 1991 and 1995 the cancer death rate between ages 30 and 54 for females exceeded that for males.

Between which ages does the female cancer death rate exceed the male for all periods shown?

- 6 "We worry that the pesticides used on crops may get into our food, but few people know that plants make natural pesticides to protect them against threats to their existence. Every day we eat fruit and vegetables containing these natural pesticides. Since our consumption of natural pesticides vastly outweighs that of synthetic pesticides, our health is at greater risk from natural pesticides than from synthetic ones."

Which **one** of the following, if true, most weakens the above argument?

- A Natural pesticides in some plants can harm animals.
- B Humans have evolved to tolerate natural pesticides in food crops.
- C Every natural pesticide is toxic if consumed in sufficient quantity.
- D Traces of synthetic pesticides have been found in fruit and vegetables.

**Questions 7 to 10 refer to the following information:**

Stamp duty is a tax paid when buying a house, and varies depending on the price. Tax at the appropriate rate is paid on the *total* price of the house.

The current structure of the tax is as follows:

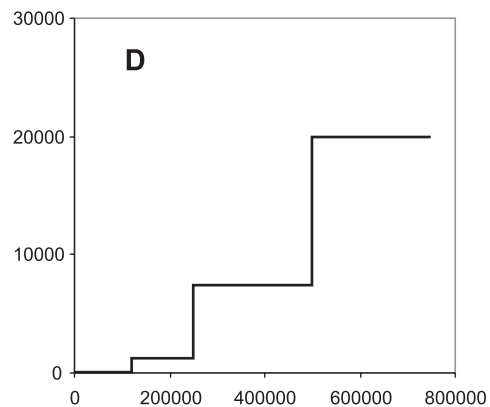
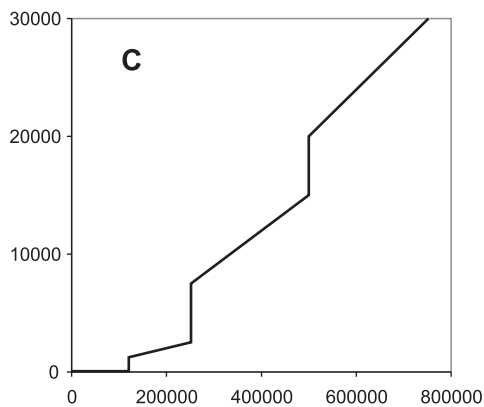
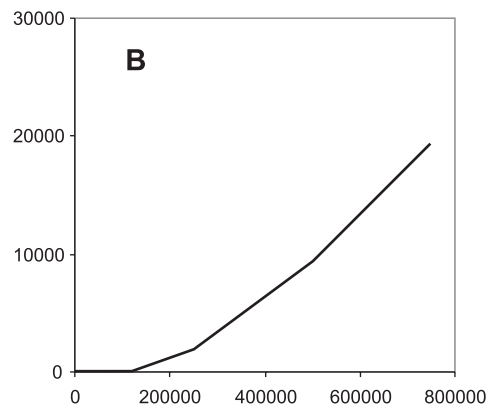
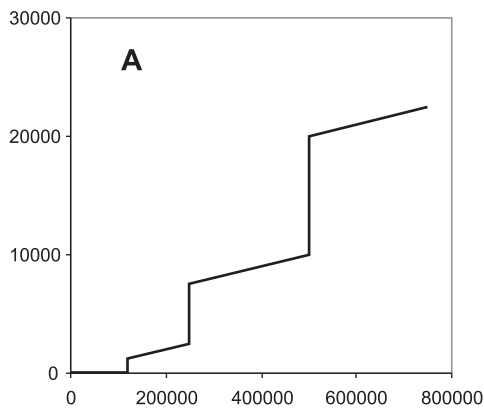
Price of house	Tax paid (as a percentage on the total price)
£0 to £119 999	0%
£120 000 to £249 999	1%
£250,000 to £499 999	3%
Over £500 000	4%

So, for example, if a house is bought at £200 000, the buyer has to pay 1% of the total price or £2 000 in stamp duty.

**Where appropriate answers should be rounded to the nearest £100.**

**7** How much stamp duty will a buyer have to pay on a house bought for £350 000?

**8** Which of the following graphs best represents the amount of tax payable on house purchases?



- 9 If, instead of the tax being on the total amount, it was levied in bands, so that the first £120000 was free, the next £130000 was taxed at 1% etc, how much stamp duty would have to be paid on a purchase of £300000?

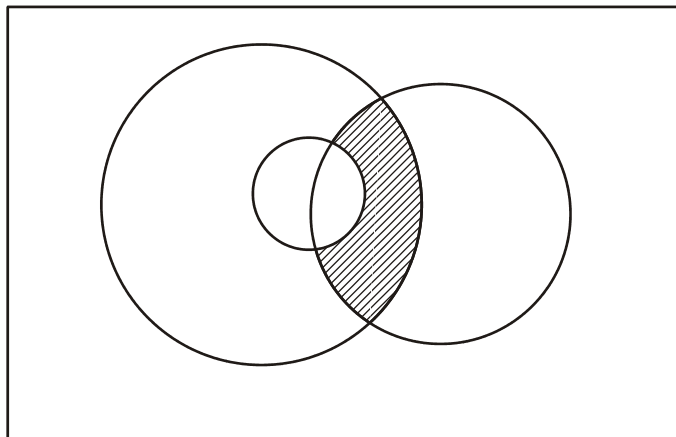
- A £1800
- B £2800
- C £4000
- D £5400
- E £9000

- 10 A buyer and vendor have agreed on a price of £260000 for a house sale. In order to cheat the taxman, they come to an agreement that the official purchase price will be disclosed as £249999 and the buyer will pay the vendor the remaining £10001 and an extra £2000 for agreeing to the arrangement in cash for 'fixtures and fittings'. How much will the buyer save by this means?

\_\_\_\_\_

- 11 At a school, all students who study Spanish also study French. Some students who study German also study Spanish.

The actual situation is represented by the Venn Diagram below. The outer rectangle represents all the students in the school.



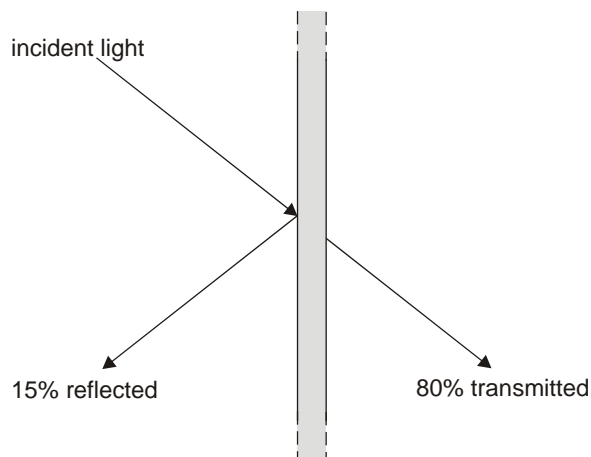
Which of the following is represented by the shaded area?

- A Those who study German and French but not Spanish.
- B Those who study German and Spanish but not French.
- C Those who study French and Spanish but not German.
- D Those who study French but not German and Spanish
- E Those who study German but not French and Spanish

- 12** “Is cannabis really as dangerous as some people have claimed? This is an important question, since the use of cannabis has increased, and even children under 15 are known to use it. It is said that smoking cannabis is just as dangerous as smoking tobacco, in that it is equally likely to lead to death from heart disease. A number of recent studies have suggested that smoking cannabis may increase the risk of developing schizophrenia, and that those who start smoking it before age 15 have a much higher risk of becoming schizophrenic in later life. Yet since the incidence of schizophrenia in the population has remained stable whilst the use of cannabis has been increasing, it cannot be true that smoking cannabis causes schizophrenia.”

Which **one** of the following, if true, weakens the above argument?

- A** Most people who use cannabis do not develop schizophrenia.
  - B** Cannabis smoke contains high levels of substances that cause cancer.
  - C** Drugs that alter one’s mood cause chemical changes in the brain.
  - D** Cannabis smokers have higher amounts of tar in the lungs than tobacco smokers.
  - E** The use of cannabis by those aged under 15 is a recent development.
- 13** A certain type of window glass allows 80% of the incident light on it to pass through. 15% is reflected back and 5% is absorbed.



If a double glazing panel is made from two sheets of this glass with a narrow gap in between, and used to glaze a window, how much of the incident light from outside will pass into the room? (to the nearest 1%)

- A** 64%
- B** 65%
- C** 79%
- D** 80%
- E** 95%



- 14** “The UK government is committed to economic growth of 2% per year. If this goal is achieved, energy consumption in the UK will have doubled by 2050. The government is also committed to a huge reduction in carbon emissions by 2050. If energy consumption has doubled, this would require a massive increase in energy from sources other than fossil fuels, i.e. from nuclear power or from renewables such as wind, tidal and solar power. At the present rate of development of wind, tidal and solar power, these sources will be unable to meet the shortfall in supply. So although nuclear power is seen as problematic because it produces dangerous waste, it will have to continue to be used in 2050.”

Which of the following identify/identifies a weakness in the above argument?

- 1 The government’s goal for economic growth may not be achieved.
- 2 By 2050 we may have discovered how to store nuclear waste safely.
- 3 It may be possible to speed up the development of renewable energy sources.

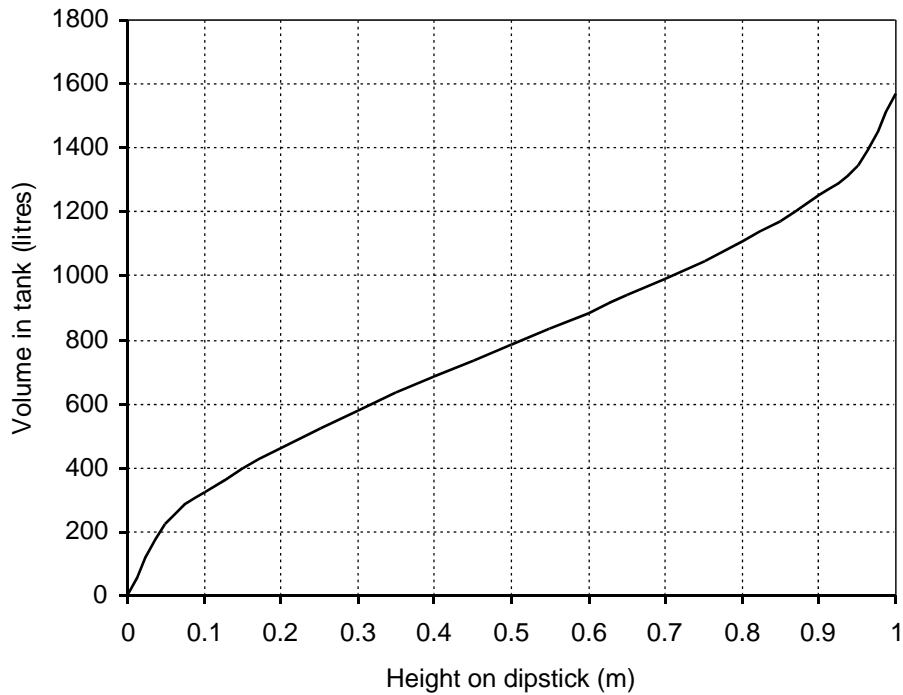
- A** 1 only  
**B** 2 only  
**C** 3 only  
**D** 1 & 2  
**E** 1 & 3  
**F** 2 & 3

- 15** A corner shop is selling biscuits at 4 packs for the normal price of 3. At this price, the shopkeeper is making 20% profit.

What percentage profit does she make when selling the biscuits at the normal price?

- A** 25%  
**B** 26.7%  
**C** 33.3%  
**D** 60%  
**E** 75%

- 16** A farmer has an irregularly shaped buried oil tank which is 1 m in height and 2 m long. In order to estimate the volume of oil in the tank he has calculated the volume in the tank as a function of the height of oil. This height is measured by a dipstick which can be inserted through the filling hole in the top of the tank.



The dipstick is measuring 0.15 m so he orders 500 litres of oil. When the delivery driver has completed the fill, he measured the height again to check that the correct amount has been delivered. What should he expect the dipstick to read?

- A** 0.25 m
- B** 0.3 m
- C** 0.4 m
- D** 0.6 m
- E** 0.7 m

- 17 “There is a fundamental error in the claim that wind farms will spoil Britain’s natural beauty. Most of the beautiful areas of Britain where wind farms may be sited are managed in some way, usually for agricultural reasons. Without sheep grazing, most hill and moorland areas would be forested. Without crop growing, the same would be true of most of the rest of Britain. In the 12<sup>th</sup> century, 90% of Britain was covered by woodland. Wind farms may be unsightly, but it is a mistake to refer to the natural beauty of our countryside, since -----  
-----.”

Which **one** of the following most logically completes the above argument?

- A some parts of Britain are heavily industrialised.
- B many of the areas where wind farms would be sited are not beautiful.
- C wind farms are necessary in order to reduce carbon emissions.
- D any form of energy production has an impact on the environment.
- E human activity has changed the British countryside over the last 800 years.

- 18 “When a judge delivers a judgement in court, dissatisfied defendants do not stand up and shout abuse at him. They turn instead to a civilised appeals procedure. However, footballers who disagree with a referee’s decision often act like thugs and scream dissent at the referee. We should not tolerate such aggressive behaviour in a civilised society. Any player acting in this way should automatically be banned from the club’s next three games. This would be to the benefit of the school community, given that children imitate their heroes and behave similarly in the classroom and the playground.”

Which **one** of the following is an assumption upon which the above argument depends?

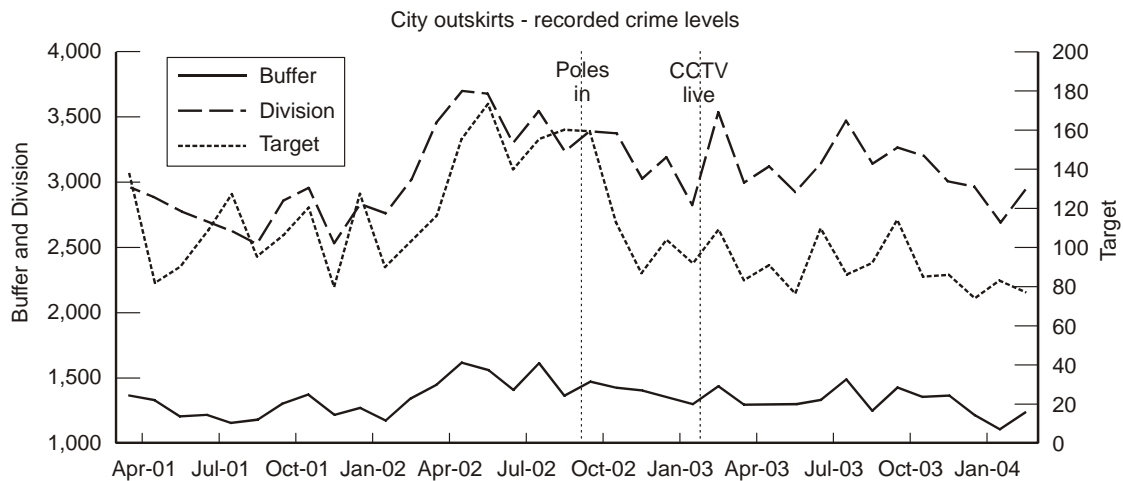
- A Football clubs do not attempt to control their players’ aggressive behaviour.
- B There is no civilised appeals procedure for footballers who disagree with a referee’s decision.
- C Banning players who protest aggressively would reduce the incidence of such behaviour on the pitch.
- D Referees are unlikely to change their minds in response to aggressive protests from players.
- E Children are more likely to imitate the aggressive behaviour than the civilised behaviour of their heroes.

**Questions 19 to 23 refer to the following information:**

The following is part of a Home Office study of the effects of installing CCTV (surveillance) cameras in 14 target areas with the object of reducing crime. Each **target** area was compared with a surrounding '**buffer**' area, and with the entire police **division**.

The data shown below is for one of the target areas described as City Outskirts. The City Outskirts system comprised 47 pan, tilt and zoom (PTZ) cameras, which provided 68% coverage of the target area. This included a residential area, an arboretum (tree park), a hospital and a light industrial estate.

**Fig. 1: City Outskirts – comparison of crime trends in the target, buffer and division**



**Table 1: Change in annual crime rates in the year following installation of CCTV cameras.**

<i>Objective: to reduce...</i>	Target area annual rate		Target area change (%)	Division annual rate		Division change (%)	Statistically significant*
	start	end		start	end		
Overall crime	1 526	1 098	-28	37 838	37 594	-1	Yes
Burglary	161	131		7 164	6 442		No
Drug offences	44	45	2	799	730	-9	No
Sexual offences	18	17	-6	374	391	5	No
Theft (not including vehicle crime)	568	329	-42	9 126	8 610	-6	Yes
Vehicle crime	279	126	-55	6 993	6 412	-8	Yes
Violence against the person	176	224	27	4 995	6 234	26	No

\* The 'Statistically significant' column indicates whether the observed difference between the Target area change and the Division change is greater than we might expect by chance variations in crime rates in the absence of any real effect.

- 19** Estimate (to the nearest 100) the average monthly level of overall crime for the division in the year up to the installation of CCTV.
- 20** The study established that: 'Following the installation of CCTV, overall crime in the target area showed a substantial fall (28%)... relative to the division as a whole (1%).' However, it also noted there were a number of 'confounding factors', meaning factors which cast some doubt on the significance of the data for determining whether the change was largely attributable to CCTV.

Which of the following, all of which are in fact true, would have to be considered as 'confounding factors'?

- 1 The new CCTV system was supported by improvements in street and precinct lighting in November 2002.
- 2 There was an anti-burglary initiative in the target area during the period of the study.
- 3 During the peak in crime levels, changes in parking regulations reduced the number of cars parked in the target area.

- A** None
- B** 1 only
- C** 2 only
- D** 1 & 3
- E** 2 & 3
- F** 1, 2 & 3

- 21** The percentage change for burglary in the Target area and in the Division are missing from the table. The difference between them was not found to be statistically significant. What was the difference? (Answer to the nearest whole number)

- 22** The category of crime showing the biggest change in the Target area was vehicle crime. This may have been a freak result.

If vehicle crime were discounted, what would be the overall percentage change in the Target area?

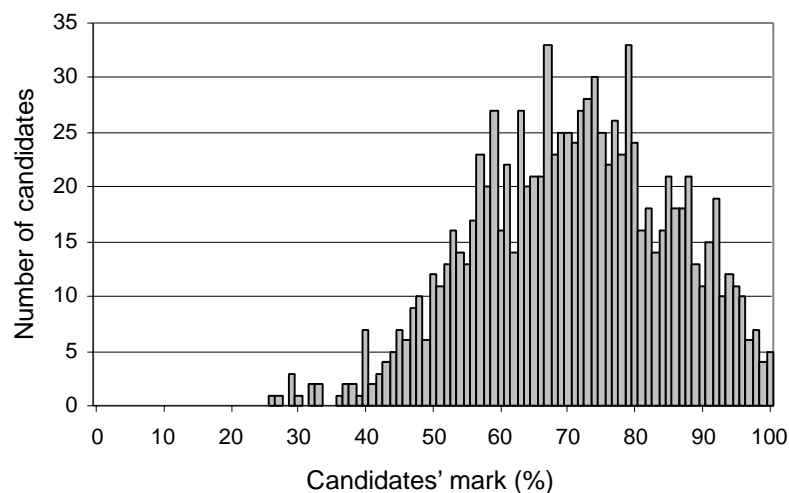
23 Which of the following explain(s) why it is important for the study to provide data for the crime trend in the buffer area?

- 1 it might indicate whether criminal activity is displaced to areas adjacent to the target area;
- 2 it explains why figures for the target area are not reflected by the division as a whole;
- 3 it gives some indication of whether falling crime in the target area is part of a more general trend in one sector of the division.

- A 1 only  
 B 2 only  
 C 3 only  
 D 1 & 2  
 E 1 & 3  
 F 2 & 3

24 In the ideal examination, in order to maximise the discrimination between candidates, there should be a range of questions such that: the more difficult questions are answered correctly by only a small number of the best candidates and the easier questions are answered correctly by all but a small number of the weaker candidates.

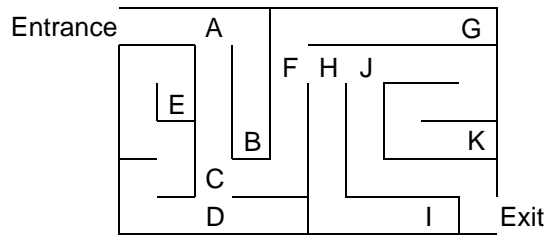
The graph below shows the distribution of results for a given examination.



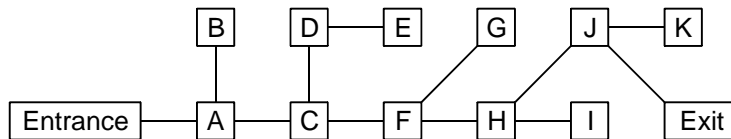
Which **two** of the following apply to the examination with results as shown?

- A The easier questions were too easy.  
 B The easier questions were too hard.  
 C The harder questions were too easy.  
 D The harder questions were too hard.

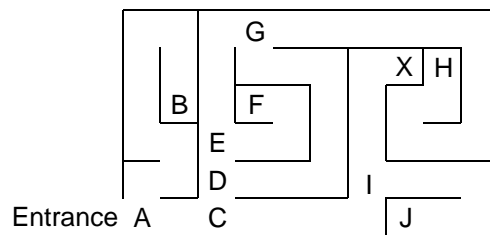
25 A maze is drawn as shown below with the lines representing 'hedges'.



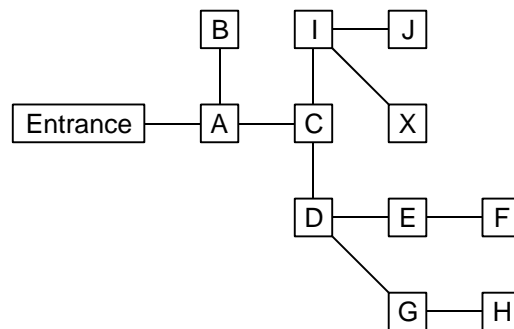
If, however, a plan is drawn showing the paths through the maze, along with the decision points and dead ends, as shown below, the best route through the maze (on paper at least) becomes more obvious.



A second maze is shown below. The objective in this maze is to reach point X.



The path plan of this maze is shown below but it has one line missing.



Where should the missing line be?

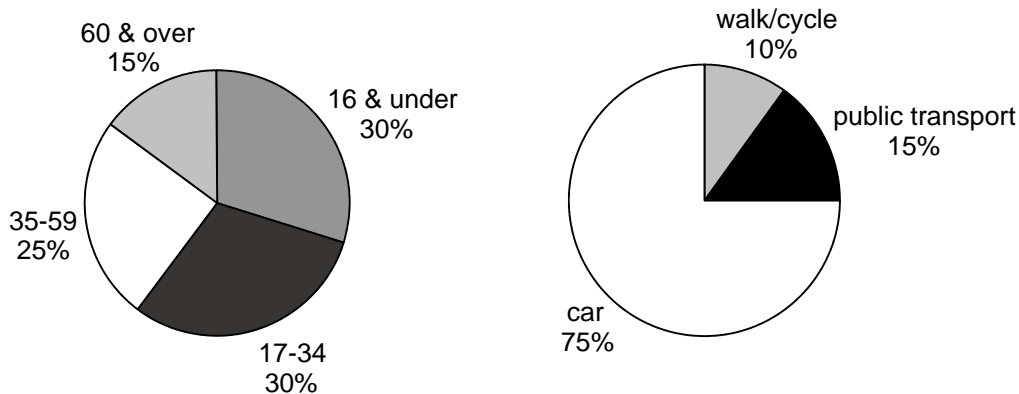
- A C to X
- B A to I
- C E to G
- D F to G
- E J to X

- 26 “So far the only foolproof way of identifying a dinosaur’s sex has been to find unlaidd eggs inside the body, and only two such fossils are known. Now a structure called medullary bone, which is otherwise found only in the bones of female birds, has been identified inside the femur of a 69 million-year-old T-Rex fossil. In birds the medullary bone is densely mineralised and rich in blood vessels. It acts as a store of calcium and without it, the calcium needed to form eggshells would have to come from the birds' normal bones, leaving them vulnerable to osteoporosis. As their eggs form, the shell formation depletes the medullary bone, which remains undetectable during brooding and until the next ovulation.”

[Source: Jeff Hecht. *New Scientist* 11 June 2005. p 9]

If you are trying to determine that a dinosaur fossil is male, then the absence of any detectable medullary bone in a complete skeleton would be:

- A a necessary but not a sufficient condition;  
 B a sufficient but not a necessary condition;  
 C both a necessary and a sufficient condition;  
 D neither a necessary nor a sufficient condition.
- 27 The pie charts below show the results of a survey of the inhabitants of a village. The chart on the left shows the age distribution. The chart on the right shows the methods normally used to travel from home to their school, place of work etc. (In the case of the very young the mode of transport is that used by their parents to take them to nursery group etc.)



Which of the following conclusions can safely be drawn from this data?

- 1 At least 1/6 of the 17-34 age group travel by car.
  - 2 No more than half of the 16 & under age group travel by public transport.
  - 3 Some of those under 60 travel by walking or cycling.
- A none  
 B 1 & 2  
 C 1 & 3  
 D 2 & 3  
 E 1, 2 & 3



- 28** I have an electronic device which, on the press of a button, generates a number between 1 and 6. It is supposed to generate numbers randomly, but I have noticed that it generates numbers in groups of four that always add up to 14, and it never generates more than five consecutive odd numbers or even numbers.

In the game I am currently playing using this device, the last fifteen numbers (in order from earliest to latest) have been:

. . . . . **3 4 4 2 4 1 5 6 2 4 2 5 3 5 5**

What number will appear next?

- A** 1  
**B** 2  
**C** 3  
**D** 4
- 29** “Despite alarming warnings about the possibility of a global epidemic of bird flu, there is no chance that bird flu will kill thousands of people in Britain. References to the 1918-1919 flu epidemic, when millions died, are misleading. In those days the economy of the country was weak, so the population was vulnerable to infections due to poor nutrition. Now we have a strong economy, therefore children can develop a strong immune system through good nutrition. We are told that increases in the amount of global travel makes it more likely that deadly diseases will spread around the world. Frequent global travellers become immune to infectious diseases simply because they have been exposed to so many of them. So global travel helps to immunise the population.”

Which of the following give(s) a reason why the conclusion of the above argument might be unsafe?

- 1 The vast majority of residents of Britain are not frequent global travellers.
  - 2 Being immune to a number of infectious diseases may not confer immunity to all infectious diseases.
  - 3 The strength of the economy is not the only influence on the quality of children’s nutrition.
- A** 1 only  
**B** 2 only  
**C** 1 & 2  
**D** 1 & 3  
**E** 2 & 3  
**F** 1, 2 & 3

- 30** I am trying to buy a particular type of car second hand. These cars are in great demand and I know that if I am not quick, they will be bought by other people.

I have bought tonight's paper as early as possible. Four such cars are advertised and I have arranged to see the owners. I know that I must make an instant decision on each as otherwise they will sell before I can return.

If I buy the first one I see, there is only a 1 in 4 chance of it being the best. Similarly, if I wait until the last one, there is only a 1 in 4 chance of it being the best. I therefore decide on the following strategy: I will look at the first one and not buy it. I will then buy the first one I see which is better than the first one. If the other two are worse than the first one, I will buy the fourth.

Using this strategy, what are the chances of my buying the best car?

- A** 1 in 4  
**B** 1 in 3  
**C** 5 in 12  
**D** 11 in 24
- 31** "Patients who have had a heart-attack or by-pass operation are advised to take a 'mini' aspirin (75mg) a day to reduce the risk of further trouble. Aspirin, it is thought, reduces the body's production of prostaglandins, which can cause platelets in the blood to clump together, increasing the risk of clots. So should we all be taking it, given that aspirin can induce internal bleeding, and carries a slight risk of cerebral haemorrhage?"

Typically doctors advise aspirin only if a patient is found to have a 3% or higher chance of a first heart attack or stroke within five years. Research showed 80% of men pass this threshold by age 50 – on average it is reached by the age of 40. Among the risks which start to add up to a first heart attack are family history, being overweight, smoking, lack of exercise, high blood fat levels and high blood pressure."

[Source: Tony Smith (Here's Health col.) Saga magazine. P56. Adapted]

Which of the following could *safely* be concluded from the passage?

- 1 Whether or not to take aspirin is a matter of balancing risks and benefits.
  - 2 Anyone over 50, in a sedentary occupation, should certainly take aspirin each day.
  - 3 Risk of heart attack in men increases by 30% between the ages of 40 and 50.
- A** 1 only  
**B** 2 only  
**C** 1 & 2  
**D** 1 & 3  
**E** 2 & 3  
**F** 1, 2 & 3

- 32 The first manned mission to Mars found relics of an extinct civilization. Marks carved on stone walls were identified as a number system using the base 5. The fundamental symbols used were deciphered as :

$$\bullet = 1 \quad | = 2 \quad \triangle = 3 \quad \square = 4 \quad \text{and} \quad \text{pentagon} = 5$$

Their rules for writing larger numbers depended on multiplying and adding as follows:

- 1 Starting from the left, elements are multiplied together, starting with the smallest element on the left hand side until a smaller number is encountered.
- 2 When a smaller number is encountered, it (or the new multiple it is starting) is added to the multiple already calculated.

So, for example: 23 is:  $(4 \times 5) + 3$ .



Larger numbers are created using powers of 5, e.g. 112 is  $(4 \times 5 \times 5) + (2 \times 5) + 2$ .



What number does the following group of symbols represent?



- A 71
- B 126
- C 259
- D 266
- E 756

**PLEASE TURN OVER**

Questions 33 to 35 refer to the following information:

***Can Mainstream Medicine and Alternative Therapies Coexist?***

There is something brewing in the world of medicine and it's a lot stronger than a cup of chamomile tea. It is a shift of thinking on the whole question of alternative medicine, not just by patients, but by many doctors as well. Not so long ago most U.S. physicians scoffed at the very idea that anything outside their strictly Western-based style of medicine could help their patients. Average consumers, too, were reluctant to experiment with forms of treatment that – in their own minds at least – were shrouded in mystery, or smacked of sorcery and hocus-pocus.

But by 1990 a landmark study by Harvard Medical School found that an astonishing one-in-three Americans (out of a population of 247 million) had visited an alternative therapist in the previous year. Shortly afterwards the National Institute of Health reported that in that same year 425 million visits by US citizens were made to alternative health practitioners, compared to 388 million visits to conventional primary care physicians. Consumers made more visits to chiropractors, acupuncturists, homeopaths, herbalists, and other alternative healers than to all primary care physicians combined.

So what has happened? Probably the most significant contribution to the popularity of non-traditional therapies has been the gnawing dissatisfaction of patients with a health care system that has become increasingly depersonalized and remote. They complain that all too often, after taking expensive pharmacological treatments, they have simply traded symptoms for side-effects. Even the best doctors are frustrated that combining the art of healing with the science of medicine is getting harder and harder to do. They point out that the time it takes to get to know their patients, to listen, counsel and reassure, is – unfortunately – at a premium. For many, this is the void that alternative medicine appears to be filling.

Increasingly there appears to be a grudging truce between the camps, although allegations are still flying. Medical doctors accuse alternative practitioners of selling unscientific and ineffective therapies, and the alternative camp hurls charges that too many physicians are insensitive and quick to promote invasive procedures as cures. One obstacle to better understanding is the lack of agreement on a central definition of 'alternative' therapies. Some define them as those that are not widely practiced in hospitals or taught in U.S. medical schools. The cornerstone of alternative medicine appears to be the unwavering belief in the body's ability to heal itself. Another focus is on "holism," or the tenet that all aspects of a person – body, mind and spirit – are somehow interrelated and should be treated as a whole. The success of alternative techniques is often judged by the overall well-being of the patient, and does not just concentrate on the disease itself.

Source: [http://www.yourfamilyhealth.com/alternative\\_medicine/first\\_do\\_no\\_harm/](http://www.yourfamilyhealth.com/alternative_medicine/first_do_no_harm/) Adapted and shortened.

**33** Of those Americans who took alternative treatments in the year of the Harvard study, what was the average number of visits per patient to an alternative therapist? (Select the best estimate based on the figures given.)

- A 3
- B 5
- C 7
- D 9
- E 11

- 34** If the observations and claims made in paragraphs 3 and 4 are correct, which one of the following can most reliably be inferred?
- A** Conventional doctors are not sufficiently concerned about the overall well-being of patients.
  - B** Alternative medicine does not claim to treat or cure any individual diseases.
  - C** Time pressure on the medical practitioners has contributed to the increased popularity of alternative therapies.
  - D** Doctors do not subscribe to the view that the body can heal itself.
  - E** Alternative therapies score over conventional medicine because they have no side effects.
- 35** Which of the following is implied by what the author claims in paragraph 3?
- A** Invasive procedures do not cure diseases but only treat symptoms.
  - B** The best doctors recognise that the right approach would be a mix of alternative and traditional techniques.
  - C** Conventional medicine is too much influenced by the interests of the pharmaceutical companies.
  - D** Doctors' behaviour has influenced the change of attitude towards alternative therapies.

**END OF SECTION 1**

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