Candidate Name: .....

Academic Reading

SATURDAY 1 hour

Additional materials:

Answer sheet for Listening and Reading

Time 1 hour

INSTRUCTIONS TO CANDIDATES

Do not open this question paper until you are told to do so.

Write your name and candidate number in the spaces at the top of this page.

Read the instructions for each part of the paper carefully.

Answer all the questions.

Write your answers on the answer sheet. Use a pencil.

You **must** complete the answer sheet within the time limit.

At the end of the test, hand in both this question paper and your answer sheet.

INFORMATION FOR CANDIDATES

There are **40** questions on this question paper.

Each question carries one mark.

Globe English - 0945463900

LIVEWORKSHEETS

READING PASSAGE 1

*You should spend about 20 minutes on **Questions 1-13,** which are based on Reading Passage 1.*

How to find your way out of a food desert

Ordinary citizens have been using the internet to draw attention to the lack of healthy eating options in inner cities

Over the last few months, a survey has been carried out of over 200 greengrocers and convenience stores in Crown Heights, a neighborhood in Brooklyn, New York. As researchers from the Brooklyn Food Association enter the details, colorful dots appear on their online map, which display the specific location of each of the food stores in a handful of central Brooklyn neighborhoods. Clicking on a dot will show you the store's name and whether it carries fresh fruit and vegetables, wholegrain bread, low-fat dairy and other healthy options.

The researchers plan eventually to survey the entire borough of Brooklyn. 'We want to get to a more specific and detailed description of what that looks like', says Jeffrey Heehs, who leads the project. He hopes it will help residents find fresh food in urban areas where the stores sell mostly packaged snacks or fast food, areas otherwise known as food deserts. The aim of the project is also to assist government officials in assessing food availability, and in forming future policies about what kind of food should be sold and where.

In fact, the Brooklyn project represents the intersection of two growing trends: mapping fresh food markets in US cities, and private citizens creating online maps of local neighborhood features. According to Michael Goodchild, a geographer at the University of California at Santa Barbara, citizen map makers may make maps because there is no good government map, or to record problems such as burned-out traffic lights.

According to recent studies, people at higher risk of chronic disease and who receive minimal incomes for the work they do, frequently live in neighborhoods located in food deserts. But how did these food deserts arise? Linda Alwitt and Thomas Donley, marketing researchers at DePaul University in Chicago, found that supermarkets often can't afford the amount of land required for their stores in cities. City planning researcher Cliff Guy and colleagues at the University of Leeds in the UK found in 2004 that smaller urban groceries tend to close due to competition from suburban supermarkets.

As fresh food stores leave a neighborhood, residents find it harder to eat well and stay healthy. Food deserts are linked with lower local health outcomes, and they may be a driving force in the health disparities between lower-income and affluent people in the US. Until recently, the issue attracted little national attention, and received no ongoing funding for research.

Now, more US cities are becoming aware of their food landscapes. Last year, the United States Department of Agriculture launched a map of where food stores are located in all the US counties. Mari Gallagher, who runs a private consulting firm, says her researchers have mapped food stores and related them to health statistics for the cities of Detroit, Chicago, Cincinnati and Washington, D.C. These maps help cities

LIVEWORKSHEETS

identify where food deserts are and, occasionally, have documented that people living in food deserts have higher rates of diet-related diseases.

The Brooklyn project differs in that it's run by a local core of five volunteers who have worked on the project for the past year, rather than trained, academic researchers. To gather data, they simply go to individual stores with pre-printed surveys in hand, and once the storekeeper's permission has been obtained, check off boxes on their list against the products for sole in the store. Their approach to data collection and research has been made possible by technologies such as mapping software and GPS-related smart phones, Google Maps and OpenStreeMap, an open-source online map with a history of involvement in social issues. Like Brooklyn Food Association volunteers, many citizen online map makers use maps to bring local problems to official attention, Goodchild says. Heehs, the mapping project leader, says that after his group gathers more data, it will compare neighborhoods, come up with solutions to address local needs, and then present them to New York City officials. Their website hasn't caught them much local or official attention yet, however. It was launched only recently, but its creators haven't yet set up systems to see who's looking at it.

Experts who visited the Brooklyn group's site were optimistic but cautious. 'This kind of detailed information could be very useful' says Michele Ver Ploeg, an economist for the Department of Agriculture. To make the map more helpful to both residents and policy makers, she would like to see price data for healthy products, too. Karen Ansel, a registered dietician and a spokesperson for the American Dietetic Association, found the site confusing to navigate. 'That said, with this information in place the group has the tools to build a more user-friendly site that could be ... very helpful to consumers', she says. 'The group also should ensure their map is available to those who don't have internet access at home', she adds. In fact, a significant proportion of Brooklyn residents don't have internet access at home and 8 percent rely on dial-up service, instead of high-speed internet access, according to Gretchen Maneval, director of Brooklyn College's Center for the Study of Brooklyn. 'It's still very much a work in progress', Heehs says of the online map. They'll start advertising it online and by email to other community groups, such as urban food garden associations, next month. He also hopes warmer days in the spring will draw out fresh volunteers to spread awareness and to finish surverying, as they have about two-thirds of Brooklyn left to cover.

Globe English - 0945406900

LIVEWORKSHEETS

Questions 1-6

Complete the notes below.

*Choose **ONE WORD ONLY** from the passage for each answer.*

Write your answers In boxes 1-6 on your answer sheet.

Data on food deserts and their effects on health

The Brooklyn Food Association

- The online map provides users with a store's name, **1** ..... and details of its produce
- One goal of the mapping project is to help develop new **2**..... on food.
- Citizen maps are sometimes made when **3** .... maps are unsatisfactory.

Reasons for the development of food deserts

- New research suggests that people living in food deserts often have low **4** .....
- Some supermarkets are unable to buy enough **5** ..... inside cities for their stores
- Small grocery stores in cities often cannot cope with supermarket **6** .....

Questions 7-13

Do the following statements agree with the information given in Reading Passage 1 ?

In boxes 7-13 on your answer sheet, write

TRUE *if the statement agrees with the information*

FALSE *if the statement contradicts the information*

NOT GIVEN *if there Is no Information on this*

7 A group of professional researchers are in charge of the Brooklyn project.

8 The Brooklyn project team carries out their assessment of stores without the owner's knowledge

9 The Brooklyn project has experienced technical difficulties setting up the website

10 The city government has taken a considerable interest in the Brooklyn project website

11 Michele Ver Ploeg believes the Brooklyn project website should contain additional information

12 The rate of internet use in Brooklyn is unlikely to increase in the near future

13 Jeffrey Heehs would like more people to assist with the Brooklyn project research

Globe English - 0945463900

LIVEWORKSHEETS

Question 27-31

Do the following statements agree with the claims of the writer In Reading Passage 3?

In boxes 27-31 on your answer sheet, write

YES	*If the statement agrees with the claims of the writer*
NO	*if the statement contradicts the claims of the writer*
NOT GIVEN	*if is impossible to say what the writer thinks about this*

27 The Pacific islands were uninhabited when migrants arrived by sea from Southeast Asia

28 Andrew Sharp was the first person to write about the migrants to islanders

29 Andrew Sharp believed migratory voyages were based on more on luck than skill

30 Despite being controversial, Andrew Sharp's research had positive results

31 Edwin Doran disagreed with the findings of Lewis's research

Globe English - 0945463900

LIVEWORKSHEETS

READING PASSAGE 2

*You should spend about 20 minutes on **Questions 14-26,** which are based on Reading Passage 2.*

The dingo debate

Graziers see them as pests, and poisoning is common, but some biologists think Australia's dingoes are the best weapon in a war against imported cats and foxes.

A A plane flies a slow pattern over Carlton Hill station, a 3,600 square kilometre ranch in the Kimberley region in northwest Australia. As the plane circles, those aboard drop 1,000 small pieces of meat, one by one, onto the scrubland below, each piece laced with poison; this practice is known as baiting.

Besides 50,000 head of cattle, Carlton Hill is home to the dingo, Australia's largest mammalian predator and the bane of a grazier's (cattle farmer's) life. Stuart McKechnie, manager of Carlton Hill, complains that graziers' livelihoods are threatened when dingoes prey on cattle. But one man wants the baiting to end, and for dingoes to once again roam Australia's wide-open spaces. According to Chris Johnson of James Cook University, 'Australia needs more dingoes to protect our biodiversity.'

B About 4,000 years ago, Asian sailors introduced dingoes to Australia. Throughout the ensuing millennia, these descendants of the wolf spread across the continent and, as the Tasmanian tiger disappeared completely from Australia, dingoes became Australia's top predators. As agricultural development took place, the European settlers found that they could not safely keep their livestock where dingoes roamed. So began one of the most sustained efforts at pest control in Australia's history. Over the last 150 years, dingoes have been shot and poisoned, and fences have been used in an attempt to keep them away from livestock. But at the same time, as the European settlers tried to eliminate one native pest from Australia, they introduced more of their own.

C In 1860, the rabbit was unleashed on Australia by a wealthy landowner and by 1980 rabbits had covered most of the mainland. Rabbits provide huge prey base for two other introduced species: the feral (wild) cat and the red fox.

The Interaction between foxes, cats and rabbits is a huge problem for native mammals. In good years, rabbit numbers increase dramatically, and fox and cat populations grow quickly in response to the abundance of this prey. When bad seasons follow, rabbit numbers are significantly reduced - and the dwindling but still large fox and cat populations are left with little to eat besides native mammals.

D Australian mammals generally reproduce much more slowly than rabbits, cats and foxes - and adaption to prevent overpopulation in the arid environment, where food can be scarce and unreliable - and populations decline because they can't grow fast enough to replace animals killed by the predators. Johnson says dingoes are the solution to this problem because they keep cat and fox populations under control. Besides regularly eating the smaller predators, dingoes will kill them simply to lessen competition.

Dingo packs live in large, stable territories and generally have only one fertile, which limits their rate of increase. In the 4,000 years that dingoes have been Australia, they have contributed to few, if any, extinctions, Johnsons says.

LIVEWORKSHEETS

E Reaching out from a desolate spot where three states meet, for 2,500 km in either direction, is the world's longest fence, two metres high and stretching from the coast in Queensland to the Great Australian Bight in South Australia; it is there to keep dingoes out of southeast, the fence separates the main types of livestock found in Australia. To the northwest of the fence, cattle predominate; to the southwest, sheep fill the landscape. In fact, Australia is a land dominated by these animals - 25 million cattle, 100 million sheep and just over 20 million people.

F While there is no argument that dingoes will prey on sheep if given the chance, they don't hunt cattle once the calves are much past two or three weeks old, according to McKechnie. And a study in Queensland suggests that dingoes don't even prey heavily on the newborn calves unless their staple prey disappears due to deteriorating conditions like drought. This study, co-authored by Lee Alien of the Robert Wicks Research Centre in Queensland, suggests that the aggressive baiting programs used against dingoes may actually be counter-productive for graziers. When dingoes are removed from an area by baiting m the area is recolonized by younger, more solitary dingoes. These animals aren't capable of going after the large prey like kangaroos, so they turn to calves. In their study, some of the highest rates of calf predation occurred in areas that had been baited.

G Mark Clifford, general manager of a firm that manages over 200,000 head of cattle, is not convinced by Allen's assertion. Clifford says, 'It's obvious if we drop or loosen control on dingoes, we are going to lose more calves.' He doesn't believe that dingoes will go after kangaroos when calves are around. Nor is he persuaded of dingoes' supposed ecological benefits, saying he is not convinced that they manage to catch cats that often, believing they are more likely to catch small native animals instead.

H McKechnie agrees that dingoes kill the wallabies (small native animals) that compete with his cattle for food, but points out that in parts of Westers Australia, there are no fixes, and not very many cats. He doesn't see how relaxing controls on dingoes in his area will improve the ecological balance.

Johnson sees a need for a change in philosophy on the part of graziers. 'There might be a number of different ways of thinking through dingo management in cattle country,' he says. 'At the moment, though, that hasn't got through to graziers. There's still just on prescription, and that is to bait as widely as possible.'

Global English - 0945463900

LIVEWORKSHEETS

Questions 14-20

Reading Passage 2 has eight sections, A-H.

Which sections contains the following information?

Write the correct letter, A-H, in boxes 14-20 on your answer sheet.

***NB** You may use any letter more than once.*

14 a description of a barrier designed to stop dingoes, which also divides two kinds of non-natives animals

15 how dingoes ensure that rival species do not dominate

16 a reference to a widespread non-native species that other animals feed on

17 a mention of the dingo's arrival in Australia

18 research which has proved that dingoes have resorted to eating young livestock

19 a description of a method used to kill dingoes

20 the way that the structure of dingo groups affects how quickly their numbers grow

Questions 21-23

Look at the following statements (Questions 21-23) and the list of people below.

Match each statement with the correct person, A, B, C or D.

Write the correct letter, A, B, C or D, in boxes 21-23 on your answer sheet.

21 Dingoes tend to hunt native animals rather than hunting other non-native predators.

22 The presence of dingoes puts the income of some people at risk.

23 Dingoes have had little impact on the dying out of animal species in Australia.

List of People

A Stuart McKechnie
B Chris Johnson
C Lee Allen
D Mark Clifford

Globe English - 0945463900

LIVEWORKSHEETS

Questions 24-26

Complete the sentences below.

*Choose **NO MORE THAN TWO WORDS** from the passage for each answer.*

Write your answers In boxes 24-26 on your answer sheet.

24 The dingo replaced the .....as the main predatory animal in Australia.

25 Foxes and cats are more likely to hunt native animals when there are fewer .....

26 Australian animals reproduce at a slow rate as a natural way of avoiding .....

Globe English - 0945463900

LIVEWORKSHEETS

READING PASSAGE 3

*You should spend 20 minutes on **Questions 27-40,** which are based on Reading Passage 3.*

Pacific navigation and voyaging

How people migrated to the Pacific islands

The many tiny islands of the Pacific Ocean had no human population until ancestors of today's islanders sailed from Southeast Asia in ocean-going canoes approximately 2,000 years ago. At the present time, the debate continues about exactly how they migrated such vast distances across the ocean, without any of the modern technologies we take for granted. Although the romantic vision of some early twentieth-century writers of fleets of heroic navigators simultaneously setting sail had come to be considered by later investigators to be exaggerated, no considered assessment of Pacific voyaging was forthcoming until 1956 when the American historian Andrew Sharp published his research. Sharp challenged the 'heroic vision' by asserting that the expertise of the navigators was limited, and that the settlement of the islands was not systematic, being more dependent on good fortune by drifting canoes. Sharp's theory was widely challenged, and deservedly so. If nothing else, however, it did spark renewed interest in the topic and precipitated valuable new research.

Since the 1960s a wealth of investigations has been conducted, and most of them, thankfully, have been of the 'non-armchair' variety. While it would be wrong to denigrate all 'armchair' research - that based on an examination of available published materials - it has turned out that so little progress had been made in the area of Pacific voyaging because most writers relied on the same old sources - travelers' journals or missionary narratives compiled by unskilled observers. After Sharp, this began to change, and researchers conducted most of their investigations not in libraries, but in the field.

In 1965, David Lewis, a physician and experienced yachtsman, set to work using his own unique philosophy: he took the yacht he had owned for many years and navigated through the islands in order to contact those men who still find their way at sea using traditional methods. He then accompanied these men, in their traditional canoes, on test voyages from which all modern instruments were banished from sight, though Lewis secretly used them to confirm the navigator's calculations. His most famous such voyage was a return trip of around 1,000 nautical miles between two islands in midocean. Far from drifting, as proposed by Sharp, Lewis found that ancient navigators would have known which course to steer by memorizing which stars rose and set in certain positions along the horizon and this gave them fixed directions by which to steer their boats.

The geographer Edwin Doran followed a quite different approach. He was interested in obtaining exact data on canoe sailing performance, and to that end employed the latest electronic instrumentation. Doran traveled on board traditional sailing canoes in some of the most remote parts of the Pacific, all the while using his instruments to record canoe speeds in different wind strengths - from gales to calms - the angle canoes could sail relative to the wind. In the process, he provided the first really precise attributes of traditional sailing canoes.

Global English - 0945462900

LIVEWORKSHEETS

A further contribution was made by Steven Horvath. As a physiologist, Horvath's interest was not in navigation techniques or in canoes, but in the physical capabilities of the men themselves. By adapting standard physiological techniques, Horvath was able to calculate the energy expenditure required to paddle canoes of this sort at times when there was no wind to fill the sails, or when the wind was contrary. He concluded that paddles, or perhaps long oars, could indeed have propelled for long distances what were primarily sailing vessels.

Finally, a team led by P Wall Garrard conducted important research, in this case by making investigations while remaining safely in the laboratory. Wall Garrard's unusual method was to use the findings of linguists who had studied the languages of the Pacific islands, many of which are remarkably similar although the islands where they are spoken are sometimes thousands of kilometres apart. Clever adaptation of computer simulation techniques pioneered in other disciplines allowed him to produce convincing models suggesting the migrations were indeed systematic, but not simultaneous. Wall Garrard proposed the migrations should be seen not as a single journey made by a massed fleet of canoes, but as a series of ever more ambitious voyages, each pushing further into the unknown ocean.

What do we learn about Pacific navigation and voyaging from this research? Quite correctly, none of the researchers tried to use their findings to prove one theory or another; experiments such as these cannot categorically confirm or negate a hypothesis. The strength of this research lay in the range of methodologies employed. When we splice together these findings we can propose that traditional navigators used a variety of canoe types, sources of water and navigation techniques, and it was this adaptability which was their greatest accomplishment. These navigators observed the conditions prevailing at sea at the time a voyage was made and altered their techniques accordingly. Furthermore, the canoes of the navigators were not drifting helplessly at sea but were most likely part of a systematic migration; as such, the Pacific peoples were able to view the ocean as an avenue, not a barrier, to communication before any other race on Earth. Finally, one unexpected but most welcome consequence of this research has been a renaissance in the practice of traditional voyaging. In some groups of islands in the Pacific today young people are resurrecting the skills of their ancestors, when a few decades ago it seemed they would be lost forever.

Globe English - 0945463900

LIVEWORKSHEETS

Questions 32-36

Choose the correct letter, ***A, B, C or D.***

Write the correct letter in boxes 32-36 on your answer sheet.

32 David Lewis's research was different because

A he observed traditional navigators at work

B he conducted test voyages using his own yacht

C he carried no modern instruments on test voyages

D he spoke the same language as the islanders he sailed with

33 What did David Lewis's research discover about traditional navigators?

A They used the sun and moon to find their position

B They could not sail further than about 1,000 nautical miles

C They knew which direction they were sailing in

D They were able to drift for long distances

34 What are we told about Edwin Doran's research?

A Data were collected after the canoes had returned to land

B Canoe characteristics were recorded using modern instruments

C Research was conducted in the most densely populated regions

D Navigators were not allowed to see the instruments Doran used

35 Which of the following did Steven Horvath discover during his research?

A Canoe design was less important than human strength

B New research methods had to be developed for use in canoes

C Navigators became very tired on the longest voyages

D Human energy may have been used to assist sailing canoes

36 What is the writer's opinion of P Wall Garrard's research?

A He is disappointed it was conducted in the laboratory

B He is impressed by the originality of the techniques used

C He is surprised it was used to help linguists with their research

D He is concerned that the islands studied are long distances apart

Globe English - 0945463900

LIVEWORKSHEETS

Questions 37-40

Complete each sentence with the correct ending, A-F, below.

Write the correct letter, A-F, in boxes 37-40 on your answer sheet.

37 One limitation in the information produced by all of this research is that it

38 The best thing about this type of research

39 The most important achievement of traditional navigators

40 The migration of people from Asia to the Pacific

A was the variety of experimental techniques used

B was not of interest to young islanders today

C was not conclusive evidence in support of a single theory

D was being able to change their practices when necessary

E was the first time humans intentionally crossed an ocean

F was the speed with which it was conducted

Globe English - 0945463900

LIVEWORKSHEETS