Academic Reading

Duration: 60minutes

READING PASSAGE 1 *Questions 1–13*

You should spend about 20 minutes on Questions 1–13, which are based on Reading Passage 1 on the next page.

Questions 1–6

*Reading Passage 1 has six paragraphs **A–F**.*

Choose the correct heading for each paragraph from the list of headings below.

*Write the correct number **i–ix** in boxes 1–6 on your answer sheet.*

List of headings	
i	The nocturnal behaviour of flying foxes
ii	The distances covered by different bats
iii	How bats compare to other animal species
iv	Reasons why flying foxes predominate
v	The significance of bats to early cultures
vi	A comparison between two types of bats
vii	How bats digest their food efficiently
viii	Key factors in determining types of bat
ix	The destruction caused by colonies of bats

1 Paragraph A

2 Paragraph B

3 Paragraph C

4 Paragraph D

5 Paragraph E

6 Paragraph F

LIVEWORKSHEETS

Flying foxes and other bats of Australia

A Bats are the only mammals capable of active and sustained flight. They achieve this with semi-transparent wings, composed of two layers of almost hairless skin stretched between the long forelimb bones, the back limb, and the tail. The other external features of bats are not unlike those seen in many groups of other small mammals. Due to their capacity for flight, their nocturnal lifestyle, and other physiological and ecological adaptations, bats have become a very successful group of mammals. They make up the second most numerous mammal group in the world, after that of rodents (which include rats, mice and guinea pigs).

B Bats belong to the category of Chiroptera meaning 'hand-winged'. Bats can be further divided into two classes: the Megachiroptera (large 'hand-winged' bats) and Microchiroptera (small 'hand-winged' bats). Broadly speaking, the small microchiropterans feed mainly on insects, and navigate using echolocation (animal sonar). The smallest bats in the world belong to the Micorchiroptera. The bumble-bee bat from Thailand, which weighs only 1.5 grams, is possibly the world's smallest mammal. In the Microchiroptera, there are some species which eat plant products, and could therefore be called 'fruit bats'. This group of bats has diversified into a wide range of food habits and includes blood-feeding vampire bats, fish-eating bats, carnivorous and insectivorous bats, as well as the group of fruit eaters. Megachiropterans are larger bats that are 'phytophagous', (they feed on plant products), and navigate principally by sight. Flying foxes, fruit bats and blossom bats belong to this last category.

C The first records of flying foxes in Australia are those found in Aboriginal rock art and mythology. In sandstone cave galleries there are numerous depictions of flying foxes, usually in groups, which reflect a natural view of the animal. However, Aboriginal rock art depictions cannot be interpreted in a simple European way as representing a food source, or a message of the presence of flying foxes nearby. Although these factors are often involved, it is more likely that the representation of flying foxes in Aboriginal rock art has a deeper meaning, relating flying foxes to the environment and Aboriginal spirituality. Many of the observations of flying foxes by Europeans during the early colonisation and exploration periods of Australia were probably misidentified as 'nocturnal birds'.

D Australian flying foxes forage for food almost exclusively during the night. Flying foxes leave their camps at dusk, sometimes just before sundown or shortly after dark. The exodus from a camp usually consists of streams of bats heading off in the direction of the food source. Circling and wheeling in the camp prior to the exodus may be related to information transfer, or just warming up. When the first animal decides to leave the camp in a particular direction, others follow. Depending on the quality of the food and its distance from the camp, flying foxes commence to return at all stages of the night. The peak of returns occurs just before dawn, and bats can be seen returning along the familiar pathways used in their exodus at the beginning of the night.

E The solitary tube-nosed fruit bats are found in rainforests and usually fly along tracks in the forest 3 – 5 metres above the ground, but will fly much higher if feeding on emergent fig trees. Finding them during the day is very difficult as their spotted wings and brown colour make them look like dead leaves. The roost site is never far from the food source and the bats will roost in the same location day after day while the food source remains, after which they will move on. Blossom bats are also solitary and roost in the canopy of dense vegetation where they too resemble hanging dead leaves. No groups or colonies have ever been found, but like tube-nosed fruit bats, numbers of blossom bats will congregate around an isolated food tree. Although separate visits to flowers by individuals can be very brief, blossom bats show a strong loyalty to their feeding areas and will vigorously defend them from other individuals by attacking, vocalising, and clapping the tips of their wings together.

F The larger body size of flying foxes generally restricts their access to food to the outer canopy, so they tend to range long distances and depend on less plant species as a food resource. In the northern rainforests, the bare-backed flying fox avoids this problem by having added manoeuvrability as a result of its extended wing surface area, and can fly and feed below the canopy as well. This allows the bare-backed flying fox access to a greater variety of food types. The smaller body size and wing shape of other types of bats such as the tube-nosed and blossom bats also allows them to utilise a wide range of plant species for food, and consequently results in them having much smaller home ranges than flying foxes.

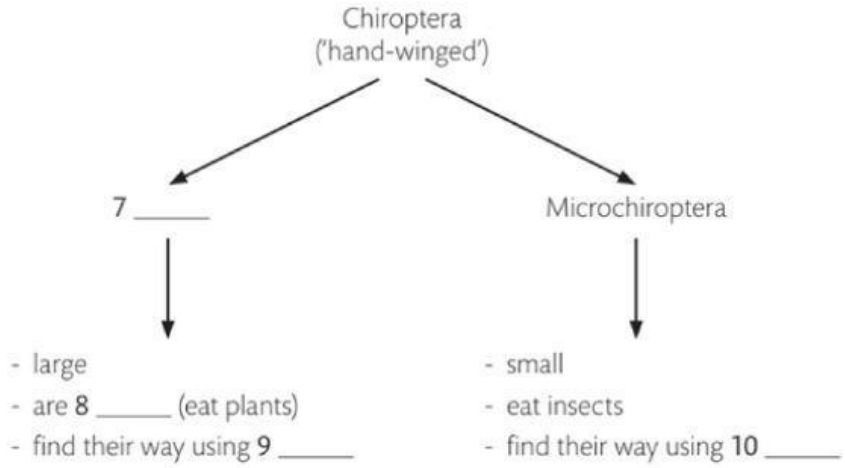
LIVEWORKSHEETS

Questions 7–10

Complete the flow chart below.

*Choose **NO MORE THAN ONE WORD** from the passage for each answer.*

Write your answers in boxes 7–10 on your answer sheet.



Questions 11–13

Classify the following characteristics as belonging to

***A** tube-nosed fruit bats*
***B** blossom bats*
***C** both types of bats*

*Write the correct letter, **A**, **B** or **C**, in boxes 11–13 on your answer sheet.*

11 They are hostile to intruders in their territory.

12 Time is spent in a group only when feeding.

13 They are well camouflaged by their surroundings.

LIVEWORKSHEETS

READING PASSAGE 2 *Questions 14–27*

You should spend about 20 minutes on Questions 14-27, which are based on Reading Passage 2 below.

The meaning of European Rock Art

A Rock art (also known as 'parietal art', most famously cave paintings) has been recorded in Africa the Americas, Asia, Australia and Europe. The earliest examples of European rock art are dated to about 36,000 years ago, but it was not until around 18,000 years ago that European rock art actually flourished. This was the time following the end of the Last Glacial Maximum (22,000–19,000 years ago), when climatic conditions were beginning to improve after reaching their most critical point of the Ice Age. But why was rock art made? After a century of discussion about the 'meaning' of rock art, no complete scholarship consensus exists, but several explanations have been proposed.

B Possibly the simplest of all theories about Upper Paleolithic rock art to be put forward is 'art for art's sake'. This view holds that there is no real meaning behind this type of art, that it is nothing but the product of an idle activity with no deep motivation behind it, a "mindless decoration" in the words of Paul Bahn. As simple and innocent as this view may sound, it has some important implications. Bahn argues that some late 19th and early 20th century scholars saw people in the Upper Paleolithic communities as brute savages incapable of being driven by deep psychological motivations, and they even rejected the idea that rock art could have any connection with spiritual concerns or any other subtle motivation. This approach is not accepted today, but it was an influential one in the early years of archaeology.

C Some scholars, such as Clive Gamble, have claimed that rock art was produced by different communities to mark boundaries during the time when climatic conditions increased the struggle for territory between Upper Paleolithic hunter-gatherer communities. Cave art, according to this view, is seen as a sign of the ethnic or territorial divisions within the different Upper Paleolithic human groups living in a given area. Cave art was used as a marker by hunting-gathering communities in order to indicate to other groups their 'right' to hunt and gather food in a specific area and avoid potential conflicts.

D This argument is in line with demographic and social patterns during the Upper Paleolithic. More population density meant more competition and territorial awareness. However, this model has some flaws. Hatfield and Pittman note that this territorial approach is not consistent with the stylistic unity displayed by some rock art traditions. For them, the art is too coherent and unified to be a representation of division and aggression. Furthermore, David Whitley has observed if Upper Paleolithic groups increased their awareness of territoriality, it is reasonable to expect some sort of indication of this in the archaeological record, such as an increase of signs of injuries inflicted with sharp or blunt weapons in human remains, or other signs of trauma that could be linked to inter-group conflicts. However, in this case it is possible that if the art actually helped to avoid conflict, no such signs would be detected.

E Another suggestion is that Upper Paleolithic rock art was produced because of a belief in magic. The images were designed as an aid for hunting, in the words of Paul Mellars, to "secure control over particular species of animals which were crucially important human food supply". Some supporting evidence includes the fact that sometimes the animals were apparently depicted with inflicted wounds. In addition, similar evidence of magical or spiritual beliefs had previously been found in Australian Aboriginal rock art. Magic rituals may not have had a direct material outcome, but this type of practice surely boosted the confidence and had a direct psychological benefit for hunters (a form of placebo effect), increasing the success of hunting activities. In this context, Upper Paleolithic rock art is seen as a tool to magically benefit the groups' subsistence, encouraging the success of the hunters.

F Our knowledge of the meaning of Upper Paleolithic rock and portable art should not be considered either correct or incorrect, only fragmentary, or incomplete. The element of uncertainty is likely to always be present in this field of study. This should lead to flexible models complementing each other and the willingness to accept that, as more evidence is revealed over time, arguments will have to be adjusted.

LIVEWORKSHEETS

Questions 14–17
*Reading Passage 2 has six paragraphs labelled **A–F**.*
Which paragraph contains the following information?
*Write the correct letter **A–F** in boxes 14–17 on your answer sheet.*

14 an outdated theory about the purpose of rock art
15 an appeal to be open to emerging theories about rock art
16 an alternative term for rock art
17 an explanation of how rock art prevented arguments

Questions 18–23
Look at the following statements (Questions 18–23) and the list of people below.
*Match each statement with the correct person, **A–E**.*
*Write the correct letter **A–E** in boxes 18–23 on your answer sheet.*
***NB** You may use any letter more than once.*

18 There were strong beliefs that the rock art could control people's fortune.
19 There is not enough evidence of conflict in the rock art to support a theory.
20 Evidence for a theory can be found in other continents.
21 Early academics thought rock art had no great cultural significance.
22 Rock art is a result of increased competition for space.
23 Other evidence such as skeleton analysis can provide proof for a theory.

List of people
A Paul Bahn
B Clive Gamble
C Hatfield and Pittman
D David Whitley
E Paul Mellars

Questions 24–27
*Complete the summary using the list of words, **A–I**, below.*
*Write the correct letter **A–I** in boxes 24–27 on your answer sheet.*

Rock art and magic

Paleolithic societies believed that rock art helped with **24** _____ . People believed the art gave them influence over important animals. Pictures of animals with **25** _____ provide evidence to support the argument. However wrong the belief may have been, it would have had an effect on their **26** _____ as the belief acted as a kind of **27** _____ .

A aid	D hunting	G confidence
B material	E similarities	H rituals
C placebo	F wounds	I species

LIVEWORKSHEETS

READING PASSAGE 3 *Questions 28–40*

You should spend about 20 minutes on Questions 28–40, which are based on Reading Passage 3 below.

Master of many trades

I once travelled with a Bedouin tribe in the Western Desert of Egypt. When we got a hole in our tyre, they used tape and an old inner tube to suck air from the other three tyres to inflate the fourth. Far from expressing shame at having no pump, they told me that carrying too many tools is the sign of a weak man; it makes him lazy. The real master has no tools at all, only a limitless capacity to improvise with what is to hand. The more fields of knowledge you cover, the greater your resources for improvisation.

We hear the descriptive words psychopath and sociopath all the time, but here's a new one: monopath. It means a person with a narrow mind, a one-track brain, a bore, a super-specialist, an expert with no other interests – in other words, the role-model of choice nowadays. In June, I was invited on the Today programme on BBC Radio 4 to say a few words about the river Nile, because I had written a new book about it. The producer called me 'Dr Twigger' several times. I was flattered, but I also felt a sense of panic. I have never sought or held a PhD. After the third 'Dr', I gently put the producer right. And of course, it was fine – he didn't especially want me to be a doctor. The culture did. My Nile book was necessarily the work of a generalist. But the radio needs credible guests; it needs an expert – otherwise why would anyone listen?

The monopathic model derives some of its credibility from its success in business. Ever since the beginning of the industrial era, we have known both the benefits and the drawbacks of dividing jobs into ever smaller and more tedious ones. Riches must be balanced against boredom. But as long as a boring job retains an element of physicality, one can find a rhythm, entering a 'flow' state wherein time passes easily and the hard labour is followed by a sense of accomplishment. In Jack Kerouac's novel Big Sur (1962) there is a marvellous description of a character working like a demon, changing tyres in a tyre shop and finding himself uplifted rather than diminished by the work. Industrialism tends toward monopathy because of the growth of divided labour, but it is only when the physical element is removed that the real problems begin. When the body remains still and the mind is forced to do something repetitive, the human inside us rebels.

The average job now is done by someone who is stationary in front of some kind of screen. Someone who has just one overriding interest is tunnel-visioned, a bore, but also a specialist, an expert. Welcome to the monopathic world, a place where only the single-minded can thrive. Of course, the rest of us are very adept at pretending to be specialists. When applying for jobs, we adapt our CVs to make it look as if all we ever wanted to do was sell mobile homes or Nespresso machines. It's common sense, isn't it, to try to create the impression that we are entirely focused on the job we want? And wasn't it always this way?

In fact, it wasn't. Classically, a polymath was someone who 'had learnt much', conquering many different subject areas. As the 15th-century polymath Leon Battista Alberti – an architect, painter, horseman, archer and inventor – wrote: 'a man can do all things if he will'. During the Renaissance, polymathy became part of the idea of the 'perfected man', the manifold master of intellectual, artistic and physical pursuits. Leonardo da Vinci was said to be as proud of his ability to bend iron bars with his hands as he was of the Mona Lisa. Polymaths such as Da Vinci, Goethe and Benjamin Franklin were such high achievers that we might feel a bit reluctant to use the word 'polymath' to describe our own humble attempts to become multi-talented. We can't all be geniuses. But we do all still indulge in polymathic activity; it's part of what makes us human. We all have at least the potential to become polymaths.

Despite this potential, there is still confusion in the modern world about how innovations actually come about. Science, for example, likes to project itself as clean, logical, rational and unemotional. In fact, it's pretty haphazard, driven by funding and ego, reliant on inspired intuition by its top-flight practitioners. Above all it is polymathic. Innovative ideas frequently come from the cross-fertilisation, or mixing of two separate fields. Francis Crick, who intuited the structure of DNA, was originally a physicist; he claimed this background gave him the confidence to solve problems that biologists thought were insoluble. And Richard Feynman came up with his Nobel Prize-winning ideas about quantum electrodynamics by reflecting on a peculiar hobby of his – spinning a plate on his finger.

One could tell similar stories about breakthroughs in art – Jean-Michel Basquiat and Banksy took street graffiti and made it acceptable to galleries. In business, cross-fertilisation is the source of all kinds of innovations: fibres inspired by spider webs have become a source of bulletproof fabric. To come up with such ideas, you need to know things outside your field. What's more, the further afield your knowledge extends, the greater potential you have for innovation.

LIVEWORKSHEETS

Questions 28–36 Do the following statements agree with the claims of the writer in Reading Passage 3? In boxes 28–36 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 it is impossible to say what the writer thinks about this*

28 The Bedouin were embarrassed that they failed to fix a problem.

29 Having highly specialised tools is the sign of an expert.

30 Society today values the opinions of people who are experts in one particular field.

31 Carrying out physically repetitive tasks goes against human nature.

32 Sales jobs require more specialisation than jobs in other fields.

33 Monopathy is a fairly recent phenomenon.

34 Only highly talented individuals can become polymaths.

35 Crick's first field of study helped him with later research.

36 Travel is a good way to expand one's knowledge.

Questions 37–40

Complete the summary below.

*Write **ONE WORD** from the passage for each answer.*

Write your answers in boxes 37–40 on your answer sheet.

The writer argues that our culture values 37 _____ over other models of knowledge. This model first gained popularity with the rise of industrialism. An unwanted side effect of industrial efficiency is 38 _____ for the people carrying out the work. The writer believes that despite current thinking, 39 _____ in science, art, and business depend on people from different fields working together. The writer gives an example of a new type of 40 _____ which is derived from a substance commonly found in nature.

LIVEWORKSHEETS

General Training Reading

Duration: 60 minutes

SECTION 1 *Questions 1–14*

Questions 1–8

Look at the five advertisements, ***A–E****.*

Which advertisement mentions the following?

Write the correct letter, ***A–E****, in boxes 1-8 on your answer sheet.*

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

1 a service that is being offered for the first time
2 a special reduced price for the elderly
3 the operator can come at any time of the day or night
4 the operator guarantees to call you back if they are busy
5 an address where they can be contacted through the Internet
6 the availability of tools for rent
7 this is a local business
8 the operator is very experienced

A

HANDYMAN SERVICE

Joe the Handyman

Contact us:
Call 267 5185 or email joethehandyman@skymesh.com

House and garden maintenance
Home repairs
Plumbing, painting, tiling
No job is too small!

If it's broken, Joe the Handyman will fix it!
If it needs installing, Joe the Handyman can do it!

B

Sunshine Carpet Cleaners

Deep steam cleaning

Wow! £90 for four rooms!

Emergency Flood Water Extraction and Drying

We also do
- tile and grout cleaning
- upholstery
- pet odour removal

Owners from the neighbourhood

Ray and Eileen Burnett

Tel.: **456 7832**

C

Tony's Landscape Services

- Equipment hire
- Garden maintenance
- Spring and Fall Clean-up
- Retaining walls
- Tree planting, pruning, and removal
- Fences
- Concreting
- 26 years in the business!

Call us for a quote!
Seniors Discount
268 5432

D

Frank Gorman Electrician

We offer
- Free estimates
- 24 hour emergency service
- Satisfaction guaranteed

Our services include:
- Wiring and rewiring
- Solar panel installation
- Smoke alarms
- Outlets and switches

Licensed and insured
Call 457 8449

E

Clear View Window Cleaning

Family owned and operated
Call us on 556 8765 for an appointment
All calls returned within 24 hours

£75! Summer special!
➤ All windows washed inside and out
➤ All screens removed and cleaned
➤ For houses up to 250 square metres

New!
Solar panel cleaning

With clean windows your house will look brighter and bigger!

Call us today!

LIVEWORKSHEETS

Questions 9–14

Choosing a Tradesperson

Do you need a plumber, an electrician, or a carpenter? As your parents will probably tell you, a personal recommendation is important, so when you're choosing and using a tradesperson, ask around to get the right person for the job. Perhaps a neighbour has had some work done on their home and can recommend someone for the job. Be wary of adverts that come through your door, and at all costs avoid the fast-talking tradesman who approaches you and 'just happens to be in your area'. Don't be pressurised into letting them do work for you.

There are a few simple things to remember when selecting the best tradesperson for your job. First, get to know the tradesmen you are dealing with. Take a little time to get to know more about them and the services they offer. Secondly, don't be afraid to ask questions. Find out how long they have been in business, check whether they have insurance which covers damage to property, and ask if the work is guaranteed. You can also ask the tradesman for details of other clients they've done work for and follow up those references.

As with all things in this world, the best price is not always the best value. Be sure to weigh up the benefits of working with one tradesman over another. A good way to start is by getting a few quotations, or estimates, for the job. Make sure that each tradesman starts with a good first understanding of your needs, or else their quotations may not be comparable. Including photos will make it even easier for them, but isn't required. Once a tradesman has agreed to quote make sure they have all the information they need and always ask for a firm price. Make sure that you understand what is included in the price.

Once you have chosen your tradesperson, make sure you write up and sign an agreement with him or her regarding the details of the job, how long it will take, when it will start, and the agreed price. Ensure you have the tradesperson's full contact details, including their name, company name, physical address, mobile and landlines, e-mail address and any other details you may need to track them down in the unlikely event of a dispute or guarantee claim.

When it comes to paying for a job, there are a few simple rules to follow to safeguard your interests. Never pay the whole amount in advance and avoid paying large deposits up front. On longer jobs, agree on a schedule of payments and make sure that your payment at each stage reflects the progress made. Always retain a proportion of the total payment until the job is fully completed. However, be fair on completion and pay promptly when the work is finished to your satisfaction. Ask for a signed invoice for every payment you make, and keep all invoices and receipts.

Questions 9–14

Do the following statements agree with the information given in the text above?

In boxes 9–14 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*

9 Hiring a tradesperson who asks you for work is unwise.

10 You have no right to request information about a tradesman's previous work.

11 Photos of the work needed must be sent when asking for estimates.

12 It is advisable to get some legal advice before drawing up an agreement with a tradesperson.

13 Making regular payments to your tradesperson as the work goes along is recommended.

14 Most tradespersons prefer cash payments for jobs.

LIVEWORKSHEETS

SECTION 2 *Questions 15–27*

Read the text below and answer Questions 15–20.

Brownstone Corporation
Activity Based Working – Information for Staff

Introduction

Activity based working (ABW) is a program we are about to implement in the company to give you a choice about how, when and where you work. In the office, that means a choice of work settings, each designed for different types of tasks. Outside the office, it enables you to work anywhere, from home to an airport lounge. The hope is that this improved work-life balance will lead to greater job satisfaction for employees and therefore fewer days taken off sick. And importantly, ABW reduces the number of fixed workstations we need, thus reducing our expenditure.

A choice of spaces

ABW is all about choice. The planning and design of an ABW office includes a range of spaces to support different workplace activities rather than forcing you to do everything at one desk. If quiet concentration is necessary, then a focus room can be utilised; if an informal discussion is required at short notice, you can use a range of rooms that can't be booked; if a last minute presentation is required, there will be small rooms equipped with screens and audiovisual equipment; meeting rooms of all sizes will house the latest technologies, and there will be central hubs on each floor accessible to all so teams can get together when necessary. This is all over and above traditional desk and meeting room set ups – the possibilities and opportunities for ABW are limitless.

Training

We will hold a number of ABW workshops in the coming weeks. The next training is:

5 February 9am – 11:30am

Booking is essential in order to attend this training workshop and the registration form can be found on the Intranet in 'Training'. Your manager must approve your attendance at the training and they must complete the relevant section of the registration form. Payment for the training will be taken prior to the training date and so a correct cost code on the registration form is also essential. A list of these can be found on page 22 of the Intranet.

Questions 15–20

Complete the notes below.

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

Write your answers in boxes 15–20 on your answer sheet.

Activity Based Working (ABW)

Introduction

- the variety of 15 _____ involved in office-work means staff benefit from flexible work stations
- when not in the office, staff can choose freely where to work
- ABW aims to reduce the amount of time employees are 16 _____
- ABW will decrease the company's 17_____ on office furniture and equipment

The available spaces

- a 18 _____ is the best place to be alone and to have time to think
- not all spaces have to be booked
- the most convenient place for groups to meet will be in the 19 _____

Attending training

- complete the registration form online
- get authorisation and the appropriate 20 _____ in order to pay

LIVEWORKSHEETS

Read the text below and answer Questions 21–27.

University of Queensland, Australia

Flexible Work OptionsforStaff

Alternatives to full-time working

• Job sharing

One full-time position may be filled by two people, each of whom works an agreed part of the job and shares responsibility for the total workload.

• Voluntary variable weeks (annualised salary program)

Professional staff may request a shorter work year with extra (unpaid) leave, in return for a pro-rata reduction in annual salary. No loading applies to the extra leave and the reduced salary is paid fortnightly as a predictable income. For example, the trade-off for eight weeks' annual leave (four weeks' recreational plus four weeks' unpaid leave) would be a reduced salary paid on regular University paydays.

• Flexible pre-retirement arrangements

All staff with at least a 50% employment arrangement may apply, prior to retirement, for a flexible pre-retirement contract. Such contracts are designed to assist staff to plan their future and adjust their working arrangements to suit their career objectives.

Telecommuting

Opportunitiestowork from home or other off-campus locations may be possible, depending on business needs and according to terms approved by an employee's manager. Examples of when this might be deemed appropriate include when:

- reduced travel time boosts productivity;
- the strategy is part of a staged "return to work" plan after an absence due to illness, parental leave or other personal circumstances;
- the practice is part of an agreed strategy to balance work and family commitments; and/or
- staff can work from home when employed doing special projects

Types of leave

• Long service leave

This is available to a staff member after 10 years of continuous service. A break in service of more than 3 months will break continuity of service for the purposes of long service leave. The University will recognise eligible prior service from another Australian university in accordance with the long service leave procedures.

• Parental leave

This is available to a staff member in connection with the birth or adoption of a child. An initial period of parental leave up to 12 months (excluding additional parental leave) whether paid or unpaid will be regarded as service for the purpose of determining leave accruals in accordance with the parental leave procedures. Where a staff member has less than 12 months' continuous service at the date of birth, or date of placement of a child, the staff member will be eligible for up to 26 weeks unpaid parental leave. The rate of pay for paid parental leave will be calculated based on the staff member's average service fraction in the 12 months prior to commencing parental leave.

Questions 21–27 Complete the sentences below.
*Choose **ONE WORD ONLY** from the text for each answer. Write your answers in boxes 21–27 on your answer sheet.*

21 Staff are able to job-share as long as the division of duties and _____ is agreed between them.

22 In order to be eligible for fewer annual working weeks, staff must accept a_____ income.

23 Staff approaching _____ can negotiate a new contract that will help them prepare for the future.

24 Telecommuting may be an option for staff if it increases _____ for the company.

25 Staff working on particular _____ may find it an advantage to work from home.

26 Staff are only eligible for long service leave if their work for the university has been_____ .

27 Parental leave will be _____ if the staff member has less than a year's service with the university.

LIVEWORKSHEETS

SECTION 3 *Questions 28–40*

Questions 28–33

The text on the next page has six paragraphs, ***A–F****.*

Choose the correct heading for each paragraph from the list of headings below.

Write the correct number, ***i–ix****, in boxes 28–33 on your answer sheet.*

List of headings

i The earliest recorded instances of lifts
ii The disadvantages of living and working in skyscrapers
iii A significant safety innovation and its consequences
iv The use of technology to maximise efficiency
v The advent of mechanically-driven lifts
vi Public mistrust of elevator safety
vii The importance of the elevator today
viii The hidden cost of elevator maintenance
ix Different lifts for differing needs

28 Paragraph A

29 Paragraph B

30 Paragraph C

31 Paragraph D

32 Paragraph E

33 Paragraph F

LIVEWORKSHEETS

Moving the World

The evolutionoftheelevator, or lift

A Imagine the skyline of a modern city if the elevator did not exist. Buildings would be limited to five or six stories. Most of the architecture of the 20th and 21st century would be impossible. Office towers, hotels and high-rise apartments would hardly stand in their present form. To gain some idea of the effect of this one piece of machinery, consider that today, elevators move the equivalent of the world's population every 72 hours.

B The need for vertical transport is as old as civilization. Over the centuries, mankind has employed ingenious forms of lifting. The earliest lifts used man, animal and water power to raise the load. Lifting devices relied on these basic forms of power from the early agricultural societies until the dawn of the Industrial Revolution. In ancient Greece, Archimedes developed an improved lifting device operated by ropes and pulleys, in which the hoisting ropes were coiled around a winding drum by a capstan and levers. By A.D. 80, gladiators and wild animals rode crude elevators up to the arena level of the Roman Coliseum. Medieval records contain numerous drawings of hoists lifting men and supplies to isolated locations.

C By the 18th century, machine power was being applied to the development of the lift. In 1743, a counterweighted personal lift was commissioned by Louis XV in France for his personal chambers in Versailles. By 1833, a system using reciprocating rods raised and lowered miners in Germany's Harz Mountains. A belt-propelled elevator called the "teagle" was installed in an English factory in 1835. The first hydraulic industrial lift powered by water pressure appeared in 1846. As machinery and engineering improved, other powered lifting devices quickly followed.

D Despite these advances, one problem continued to trouble the elevator as it had since ancient times. There was no effective way to prevent the hoist from plummeting to earth if the lifting cable failed. This ever-present danger made elevators a risky proposition. In 1852, Elisha Otis sought a solution that would eliminate the hazard. He invented a security brake, which functioned automatically in the event of a broken cable. The Otis device revolutionized the elevator industry. Since its invention, the core design of the brake has remained essentially unchanged. Otis went on to found the Otis Elevator Company, which continues to manufacture elevators to this day. The Otis invention had far-reaching effects. Buildings in major cities began rising above the sixth floor, taking advantage of the new opportunities provided by the new elevator. As the safety and efficiency of the early elevators continued to improve, space in buildings' upper floors soon became more desirable, reversing a long-standing trend in commercial and residential leasing.

E Today, an increasing array of elevator options is available to meet the needs of architects and building owners. The observation elevator puts the lift on the outside of the building. These cars walled with glass allow passengers to view the cityscape as they travel. On the other hand, when sturdiness is more important than a beautiful view, freight elevators are designed to withstand the rigours of heavy loads. Double-deck elevators save time and space in high-occupancy buildings by mounting one car upon another. One car stops at even floors and the other stops at the odd floors. Depending on their destination, passengers can mount one car in the lobby or take an escalator to a landing for the alternate car. In very tall buildings, elevator efficiency can be increased by a system that combines express and local elevators. The express elevators stop at designated floors called sky lobbies. There, passengers can transfer to local elevators that will take them to their desired floor. By dividing the building into levels served by the express elevators, the local elevators can be stacked to occupy the same shaft space. That way, each zone can be served simultaneously by its own bank of local elevators. Residential elevators use modern hydraulics to produce a quiet ride while occupying a minimum amount of space. These hydraulic systems produce about the same amount of sound as a typical refrigerator, which makes them well suited for residential use. They can be operated at any hour without causing disturbance. The compact design allows the elevator to be installed in the amount of space required for an average-sized closet.

F Breakthroughs in computerised systems continue to enhance the quality and reliability of modern elevators. The power of microprocessors has been increasingly employed to control every aspect of elevator operation. For maintenance purposes, elevator companies use a remote elevator monitoring system which can identify problems before they occur by detecting failing components and intermittent anomalies that might go undetected until they cause a loss of service. If the system detects an urgent issue, it alerts the appropriate dispatching centre via the Internet and mechanics are sent to repair it and restore service.

LIVEWORKSHEETS

*Questions 34–36 Choose the correct letter, **A**, **B**, **C** or **D**.*
Write your answers in boxes 34–36 on your answer sheet.

34 What happened to the safety brake that Otis invented?

A it was soon superseded by other inventions

B its design had to be completely reworked

C it enabled Otis to start his own business

D it was copied by rival elevator companies

35 In the 19th century, innovations in elevator design led to

A a change in leasing habits.

B a jump in real estate prices.

C a demand for renovation.

D new safety regulations.

36 Using a remote elevator monitoring system allows elevator companies to

A employ fewer mechanics on staff.

B avoid long delays for lift repairs.

C switch off elevators that are not in use.

D observe the behaviour of lift users.

Questions 37–40
Complete the summary below.
*Write **ONE WORD** from the passage for each answer.*

These days, there is a variety of different elevators to suit different needs. For example, building designers can incorporate lifts with a view by choosing the 37 _____ elevator. Some skyscrapers have 38 _____ elevators working in conjunction with local elevators to cater for their large number of users. In apartment buildings where people live, it is particularly important for elevators to be both 39 _____ and compact, while in buildings where weighty objects need to be moved around, specially engineered 40 _____ elevators are essential.

LIVEWORKSHEETS