#### Unit 1

#### Lesson 1

# Finding fossil man 发现化石人

First listen and then answer the following question.

听录音, 然后回答以下问题。

Why are legends handed down by storytellers useful?

We can read of things that happened 5,000 years ago in the Near East, where people first learned to write. But there are some parts of the word where even now people cannot write. The only way that they can preserve their history is to recount it as sagas -- legends handed down from one generation of another. These legends are useful because they can tell us something about migrations of people who lived long ago, but none could write down what they did. Anthropologists wondered where the remote ancestors of the Polynesian peoples now living in the Pacific Islands came from. The sagas of these people explain that some of them came from Indonesia about 2,000 years ago.

But the first people who were like ourselves lived so long ago that even their sagas, if they had any, are forgotten. So archaeologists have neither history nor legends to help them to find out where the first 'modern men' came from.

Fortunately, however, ancient men made tools of stone, especially flint, because this is easier to shape than other kinds. They may also have used wood and skins, but these have rotted away. Stone does not decay, and so the tools of long ago have remained when even the bones of the men who made them have disappeared without trace.

ROBIN PLACE Finding fossil man

New words and expressions 生词和短语

fossil man (title)

adj. 化石人

recount

v. 叙述

saga

n. 英雄故事

legend

n. 传说,传奇 migration

n. 迁移,移居

anthropologist

n. 人类学家

archaeologist

n. 考古学家

ancestor

n. 祖先

Polynesian

adj.波利尼西亚(中太平洋之一群岛)的

Indonesia

n. 印度尼西亚

flint

n. 燧石

rot

n. 烂掉

# 参考译文

我们从书籍中可读到 5,000 年前近东发生的事情,那里的人最早学会了写字。但直到现在,世界上有些地方,人们还不会书写。 他们保存历史的唯一办法是将历史当作传说讲述,由讲述人一代接一代地将史实描述为传奇故事口传下来。人类学家过去不清楚如今生活在太平洋诸岛上的波利尼西亚人的祖先来自何方,当地人的传说却告诉人们:其中一部分是约在 2,000 年前从印度尼西亚迁来的。

但是,和我们相似的原始人生活的年代太久远了,因此,有关他们的传说既使有如今也失传了。于是,考古学家们既缺乏历史记载,又无口头传说来帮助他们弄清最早的"现代人"是从哪里来的。

然而, 幸运的是,远古人用石头制作了工具,特别是用燧石,因为燧石较之其他石头 更容易成形。他们也可能用过木头和兽皮,但这类东西早已腐烂殆尽。石头是不会腐烂的。 因此,尽管制造这些工具的人的骨头早已荡然无存,但远古时代的石头工具却保存了下来。

> Lesson 2 Spare that spider 不要伤害蜘蛛

First listen and then answer the following question. 听录音,然后回答以下问题。

How much of each year do spiders spend killing insects?

Why, you may wonder, should spiders be our friends? Because they destroy so many insects, and insects include some of the greatest enemies of the human race. Insects would make it impossible for us to live in the world; they would devour all our crops and kill our flocks and herds, if it were not for the protection we get from insect-eating animals. We owe a lot to the birds and beasts who eat insects but all of them put together kill only a fraction of the number destroyed by spiders. Moreover, unlike some of the other insect eaters, spiders never do the harm to us or our belongings.

Spiders are not insects, as many people think, nor even nearly related to them. One can tell the difference almost at a glance, for a spider always has eight legs and insect never more than six.

How many spiders are engaged in this work no our behalf? One authority on spiders made a census of the spiders in grass field in the south of England, and he estimated that there were more than 2,250,000 in one acre; that is something like 6,000,000 spiders of different kinds on a football pitch. Spiders are busy for at least half the year in killing insects. It is impossible to make more than the wildest guess at how many they kill, but they are hungry creatures, not content with only three meals a day. It has been estimated that the weight of all the insects destroyed by spiders in Britain in one year would be greater than the total weight of all the human beings in the country.

## T. H. GILLESPLE Spare that spider from The Listener

New words and expressions

beast

n. 野兽

census

n. 统计数字

acre

n. 英亩

content

adj. 满足的

# 参考译文

你可能会觉得奇怪, 蜘蛛怎么会是我们的朋友呢?因为它们能消灭那么多的昆虫,其中包括一些人类的大敌,要不是人类受一些食虫动物的保护,昆虫就会使我们无法在地球上生活下去,昆虫会吞食我们的全部庄稼,杀死我们的成群的牛羊。我们要十分感谢那些吃昆虫的鸟和兽,然而把它们所杀死的昆虫全部加在一起也只相当于蜘蛛所消灭的一小部分。此外,蜘蛛不同于其他食虫动物,它们丝毫不危害我们和我们的财物。

许多人认为蜘蛛是昆虫,但它们不是昆虫,甚至与昆虫毫无关系。人们几乎一眼就能看出二者的差异,因为蜘蛛都是8条腿,而昆虫的腿从不超过6条。

有多少蜘蛛在为我们效力呢?一位研究蜘蛛的权威对英国南部一块草坪上的蜘蛛作了一次调查。他估计每英亩草坪里有 225 万多只蜘蛛。这就是说,在一个足球场上约有 600 万只不同种类的蜘蛛。蜘蛛至少有半年在忙于吃昆虫。它们一年中消灭了多少昆虫,我们简直无法猜测,它们是吃不饱的动物,不满意一日三餐。据估计,在英国蜘蛛一年里所消灭昆虫的重量超过这个国家人口的总重量。

Lesson 3
Matterhorn man
马特霍恩山区人

First listen and then answer the following question.

听录音,然后回答以下问题。

What was the main objective of early mountain climbers?

Modern alpinists try to climb mountains by a route which will give them good sport, and the more difficult it is, the more highly it is regarded. In the pioneering days, however, this was not the case at all. The early climbers were looking for the easiest way to the top, because the summit was the prize they sought, especially if it and never been attained before. It is true that during their explorations they often faced difficulties and dangers of the most perilous nature, equipped in a manner with would make a modern climber shudder at the thought, but they did not go out of their way to court such excitement. They had a single aim, a solitary goal -- the top!

It is hard for us to realize nowadays how difficult it was for the pioneers. Except for one or two places such as Zermatt and Chamonix, which had rapidly become popular, Alpine village tended to be impoverished settlements cut off from civilization by the high mountains. Such inns as there were generally dirty and flea-ridden; the food simply local cheese accompanied by bread often twelve months old, all washed down with coarse wine. Often a valley boasted no inn at all, and climbers found shelter wherever they could -- sometimes with the local priest (who was usually as poor as his parishioners), sometimes with shepherds or cheese-makers. Invariably the background was the same: dirt and poverty, and very uncomfortable. For men accustomed to eating seven-course dinners and sleeping between fine linen sheets at home, the change to the Alps must have very hard indeed.

#### WALTER UNSWORTH Matterhorn Man

New words and expressions 生词和短语

#### Matterhorn

- n. 马特霍恩峰(阿尔卑斯山之一,在意大利和瑞士边境) alpinist
- n. 登山运动员

pioneer

- v. 开辟,倡导;
- n. 先锋,开辟者

summit

n. 顶峰

attain

v. 到达

perilous

adj. 危险的

shudder

v. 不寒而栗

court

v. 追求

solitary

adj. 唯一的

impoverish

v. 使贫困

Alpine

- adj. 阿尔卑斯山的 flea-ridden
- adj. 布满跳蚤的 coarse
- adj. 粗劣的 boast
- 7. 自恃有 · · · ·
- parishioner n. 教区居民

shepherd

- n. 牧羊人 linen
- n. 亚麻布床单 the Alps
- n. 阿尔卑斯山脉

# 参考译文

现代登山运动员总想找一条能够给他们带来运动乐趣的路线来攀登山峰。他们认为,道路愈艰险愈带劲儿。然而,在登山运动的初期,全然不是这种情况。早期登山者所寻找的是通往山顶的最方便的途径,因为顶峰特别是前人未曾到过的顶峰 -- 才是他们寻求的目标。确实,在探险中他们经常遇到惊心动魄的困难和危险,而他们装备之简陋足以使现代登山者一想起来就胆战心惊。但是,他们并非故意寻求这种刺激,他们只有一个目标,唯一的目标-- 顶峰!

我们今天很难想像昔日的登山先驱们是多么艰苦。除了泽曼特和夏蒙尼等一两个很快出了名的地方外,阿尔卑斯山山区的小村几乎全是高山环抱、与世隔绝的穷乡僻壤。那里的小客栈一般都很肮脏,而且跳蚤猖獗。 食物是当地的干酪和通常存放了一年之久的面包,人们就着劣酒吞下这种食物。山谷里常常没有小客栈,登山者只好随遇而安。有时同当地牧师(他通常和他的教民一样穷)住在一起,有时同牧羊人或制乳酪的人住在一起。无论住在哪儿,情况都一样:肮脏、贫穷,极其不舒适。对于过惯了一顿饭吃7道菜、睡亚麻细布床单的人来说,变换一下生活环境来到阿尔卑斯山山区,那一定是很艰难的。

Lesson 4 Seeing hands 能看见东西的手

First listen and answer the following question. 听录音,然后回答以下问题。

How did Vera discover she had this gift of second sight?

Several cases have been reported in Russia recently of people who can detect colours with their fingers, and even see through solid and walls. One case concerns and eleven-year-old schoolgirl, Vera Petrova, who has normal vision but who can also perceive things with different parts of her skin, and through solid walls. This ability was first noticed by her father. One day she came into his office and happened to put her hands on the door of a locked safe. Suddenly she asked her father why he kept so many old newspapers locked away there, and even described the way they were done up in bundles.

Vera's curious talent was brought to the notice of a scientific research institute in the town of Ulyanovsk, near where she lives, and in April she was given a series of tests by a special commission of the Ministry of Health of the Russian Federal Republic. During these tests she was able to read a newspaper through an opaque screen and, stranger still, by moving her elbow over a child's game of Lotto she was able to describe the figures and colours printed on it; and, in another instance, wearing stockings and slippers, to make out with her foot the outlines and colours of a picture hidden under a carpet. Other experiments showed that her knees and shoulders had a similar sensitivity. During all these tests Vera was blindfold; and, indeed, except when blindfold she lacked the ability to perceive things with her skin. It was also found that although she could perceive things with her fingers this ability ceased the moment her hands were wet.

ERIC DE MAUNY Seeing hands from The Listener

## New words and expressions

solid

adj. 坚实的

safe

n. 保险柜

Ulyanovsk

n. 乌里扬诺夫斯克

commission

n. 委员会

opaque

adj. 不透明的

lotto

n. 一种有编号的纸牌

slipper

n. 拖鞋

blindfold

adj.& adv. 被蒙上眼睛的

#### 参考译文

俄罗斯最近报导了几个事例,有人能用手指看书识字和辨认颜色,甚至能透过厚实的门和墙看到东西。 其中有一例谈到有一个名叫维拉.彼托洛娃的 11 岁学生。她的视力与常人一样,但她还能用皮肤的不同部位辨认东西,甚至看穿坚实的墙壁。是她父亲首先发现她这一功能的。一天,维拉走进父亲的办公室,偶然把手放在一个锁着的保险柜的门上,她突然

问父亲为什么把这么多的旧报纸锁在柜子里,还说了报纸捆扎的情况。

维拉的特异功能引起了她家附近乌里扬诺夫斯克城一个科研单位的注意。4月里,俄罗斯卫生部一个特别委员会对她进行了一系列的测试。在这些测试中,她能隔着不透明的屏幕读报纸。更为奇怪的是,她把肘部在儿童玩的"罗托"纸牌上移动一下,便能说出印在纸牌上的数字和颜色。还有一次,她穿着长筒袜子和拖鞋,能用脚步识别出藏在地毯下面的一幅画的轮廓和颜色。其他实验表明,她的膝盖和双肩有类似的感觉能力,在所有这些实验中,维拉的双眼都是蒙着的。如果不蒙上双眼她的皮肤就不再具有识别物体的能力。这是千真万确的。同时还发现,尽管她能用手指识别东西,但她的手一旦弄湿,这种功能便会立即消失。

Lesson 5 Youth 青年

First listen and then answer the following question:

听录音, 然后回答以下问题。

How does the writer like to treat young people?

People are always talking about 'the problem of youth'. If there is one -- which I take leave to doubt -- then it is older people who create it, not the young themselves. Let us get down to fundamentals and agree that the young are after all human beings -- people just like their elders. There is only one difference between an old man and a young one: the young man has a glorious future before him and the old one has a splendid future behind him: and maybe that is where the rub is.

When I was a teenager, I felt that I was just young and uncertain -- that I was a new boy in a huge school, and I would have been very pleased to be regarded as something so interesting as a problem. For one thing, being a problem gives you a certain identity, and that is one of the things the young are busily engaged in seeking.

I find young people exciting. They have an air of freedom, and they not a dreary commitment to mean ambitions or love of comfort. They are not anxious social climbers, and they have no devotion to material things. All this seems to me to link them with life, and the origins of things. It's as if they were, in some sense, cosmic beings in violent and lovely contrast with us suburban creatures. All that is in my mind when I meet a young person. He may be conceited, ill-mannered, presumptuous or fatuous, but I do not turn for protection to dreary cliches about respect of elders -- as if mere age were a reason for respect. I accept that we are equals, and I will argue with him, as an equal, if I think he is wrong.

FIELDEN HUGHES from Out of the Air, The Listener

New words and expression 生词和短语

leave

n. 允许

fundamentals

n. 基本原则

glorious

adj. 光辉灿烂的 splendid

adj. 灿烂的

rub

n. 难题

identity

n. 身份

dreary

adj. 沉郁的

commitment

n. 信奉

mean

adj. 吝啬, 小气

social climber

追求更高社会地位的, 向上爬的人

devotion

n. 热爱

cosmic

adj. 宇宙的

suburban

adj. 见识不广的,偏狭的

conceited

adj. 自高自大的

presumptuous

adj. 自以为是的,放肆的

fatuous

adj. 愚蠢的

cliche

n. 陈词滥调

## 参考译文

人们总是在谈论"青年问题"。如果这个问题存在的话 -- 请允许我对此持怀疑态度 -- 那么,这个问题是由老年人而不是青年人造成的。让我们来认真研究一些基本事实: 承认青年人和他们的长辈一样也是人。老年人和青年人只有一个区别:青年人有光辉灿烂的前景,而老年人的辉煌已成为过去。 问题的症结恐怕就在这里。

我十几岁时,总感到自己年轻,有些事拿不准 -- 我是一所大学里的一名新生,如果我当时真的被看成像一个问题那样有趣,我会感到很得意的。因为这至少使我得到了某种承认,这正是年轻人所热衷追求的。

我觉得年轻人令人振奋,无拘无束。他们既不追逐卑鄙的名利,也不贪图生活的舒适。 他们不热衷于向上爬,也不一味追求物质享受。在我看来,所有这些使他们与生命和万物之 源联系在了一起。从某种意义上讲,他们似乎是宇宙人,同我们这些凡夫俗子形成了强烈而鲜明的对照。每逢我遇到年轻人,脑子里就想到这些年轻人也许狂妄自负,举止无理,傲慢放肆,愚昧无知,但我不会用应当尊重长者这一套陈词滥调来为我自己辨护,似乎年长就是受人尊敬的理由。我认为我和他们是平等的。如果我认为他们错了,我就以平等的身份和他们争个明白。

Lesson 6
The sporting spirit
体育的精神

First listen and then answer the following question. 听录音,然后回答以下问题.

How does the writer describe sport at the international level?

I am always amazed when I hear people saying that sport creates goodwill between the nations, and that if only the common peoples of the would could meet one another at football or cricket, they would have no inclination to meet on the hattlefield. Even if one didn't know from concrete examples (the 1936 Olympic Games, for instance) that international sporting contests lead to orgies of hatred, one could deduce if from general principles.

Nearly all the sports practised nowadays are competitive. You play to win, and the game has little meaning unless you do your utmost to win. On the village green, where you pick up sides and no feeling of local patriotism is involved, it is possible to play simply for the fun and exercise: but as soon as a the question of prestige arises, as soon as you feel that you and some larger unit will be disgraced if you lose, the most savage combative instincts are aroused. Anyone who has played even in a school football match knows this. At the international level, sport is frankly mimic warfare. But the significant thing is not the behaviour of the players but the attitude of the spectators: and, behind the spectators, of the nations who work themselves into furies over these absurd contests, and seriously believe -- at any rate for short periods -- that running, jumping and kicking a ball are tests of national virtue.

GEORGE ORWELL The sporting spirit

New words and expression

goodwill

n. 友好

cricket

n. 板球

inclination

n. 意愿

contest

n. 比赛

orgy

- n. 无节制的,放荡 deduce
- v. 推断

competitive

adj. 竞争性的 patriotism

- n. 地方观念,爱国主义 disgrace
- v. 使丢脸 savage
- adj. 野性的 combative
- adj. 好斗的 mimic warfare 模拟战争 behaviour
- n. 行动,举止 absurd
- adj. 荒唐的

# 参考译文

当我听人们说体育运动可创造国家之间的友谊,还说各国民众若在足球场或板球场上交锋,就不愿在战场上残杀的时候,我总是惊愕不已。一个人即使不能从具体的事例(例如1936年的奥林匹克运动会)了解到国际运动比赛会导致疯狂的仇恨,也可以从常理中推断出结论。

现在开展的体育运动几乎都是竞争性的。参加比赛就是为了取胜。如果不拚命去赢,比赛就没有什么意义了。 在乡间的草坪上,当你随意组成两个队,并且不涉及任何地方情绪时,那才可能是单纯的为了娱乐和锻炼而进行比赛。可是一量涉及到荣誉问题,一旦你想到你和某一团体会因为你输而丢脸时,那么最野蛮的争斗天性便会激发起来。即使是仅仅参加过学校足球赛的人也有种体会。在国际比赛中,体育简直是一场模拟战争。但是,要紧的还不是运动员的行为,而是观众的态度,以及观众身后各个国家的态度。面对着这些荒唐的比赛,参赛的各个国家会如痴如狂,甚至煞有介事地相信 -- 至少在短期内如此 -- 跑跑、跳跳、踢踢球是对一个民族品德素质的检验。

Lesson 7 Bats 蝙蝠

First listen and then answer the following question.

听录音,然后回答以下问题。

In what way does echo-location in bats play an utilitarian role?

Not all sounds made by animals serve as language, and we have only to turn to that extraordinary discovery of echo-location in bats to see a case in which the voice plays a strictly utilitarian role.

To get a full appreciation of what this means we must turn first to some recent human inventions. Everyone knows that if he shouts in the vicinity of a wall or a mountainside, an echo will come back. The further off this solid obstruction, the longer time will elapse for the return of the echo. A sound made by tapping on the hull of a ship will be reflected from the sea bottom, and by measuring the time interval between the taps and the receipt of the echoes, the depth of the sea at that point can be calculated. So was born the echo-sounding apparatus, now in general use in ships. Every solid object will reflect a sound, varying according to the size and nature of the object. A shoal of fish will do this. So it is a comparatively simple step from locating the sea bottom to locating a shoal of fish. With experience, and with improved apparatus, it is now possible not only to locate a shoal but to tell if it is herring, cod, or other well-known fish, by the pattern of its echo.

It has been found that certain bats emit squeaks and by receiving the echoes, they can locate and steer clear of obstacles -- or locate flying insects on which they feed. This echo-location in bats is often compared with radar, the principle of which is similar.

#### MAURICE BURTON Curiosities of animal life

New words and expressions 生词和短语

bat

n. 蝙蝠

strictly

adv. 明确地

utilitarian

adj.实用的

appreciation

n. 理解

elapse

v. 障碍物

hull

n. 消逝

interval

n. 船体

receipt

n. 间隔

apparatus

n. 收到

shoal

n. 仪器

herring

n. 鱼群

cod

n. 鳕鱼

squeak

#### n. 尖叫声

# 参考译文

动物发出的声音不都是用作语言交际。我们只要看一看蝙蝠回声定位这一极不寻常的发现,就可以探究一下声音在什么情况下有绝对的实用价值。

要透彻理解这句话的意义,我们应先回顾一下人类最近的几项发明。大家都知道,在墙壁或山腰附近发出的喊声,就会听到回声。固体障碍物越远。回声返回所用时间就越长。敲打船体所发了的声音会从海底传回来,测出回声间隔的时间,便可算出该处海洋的深度。这样就产生了目前各种船舶上普遍应用的回声探测仪。任何固体者反射声音,反射的声音因物体的大小和性质的不同而不同。鱼群也反射声音。从测定海深到测定鱼群,这一进展比较容易。根据经验和改进了的仪器,不仅能够确定鱼群的位置,而且可以根据鱼群回声的特点分辨出是鲱鱼、鳕鱼,这是人们所熟悉的其他鱼。

人们发现,某些蝙蝠能发出尖叫声,并能通过回声来确定并躲开障碍物,或找到它们赖 以为生的昆虫。蝙蝠这种回声定位常常可与雷达相比较,其原理是相似的。

Lesson 8
Trading standards
贸易标准

First listen and then answer the following question. 听录音,然后回答以下问题。

What makes trading between rich countries difficult?

Chickens slaughtered in the United States, claim officials in Brussels, are not fit to grace European tables. No, say the American: our fowl are fine, we simply clean them in a different way. These days, it is differences in national regulations, far more than tariffs, that put sand in the wheels of trade between rich countries. It is not just farmers who are complaining. An electric razor that meets the European Union's safety standards must be approved by American testers before it can be sold in the United States, and an American-made dialysis machine needs the EU's okay before is hits the market in Europe.

As it happens, a razor that is safe in Europe is unlikely to electrocute Americans. So, ask businesses on both sides of the Atlantic, why have two lots of tests where one would do? Politicians agree, in principle, so America and the EU have been trying to reach a deal which would eliminate the need to double-test many products. They hope to finish in time for a trade summit between America and the EU on May 28TH. Although negotiators are optimistic, the details are complex enough that they may be hard-pressed to get a deal at all.

Why? One difficulty is to construct the agreements. The Americans would happily reach one accord on standards for medical devices and them hammer out different pacts covering, say, electronic goods and drug manufacturing. The EU -- following fine continental traditions -- wants agreement on general principles, which could be applied to many types of products and perhaps extended to other countries.

New words and expressions 生词和短语

slaughter

v. 屠宰

fit

adj. 适合

grace

v. 给...增光

tariff

n. 关税

standard

n. 标准

dialysis

n. 分离,分解;透析,渗析

electrocute

v. 使触电身亡

eliminate

v. 消灭

accord

n. 协议

device

n. 仪器,器械

hammer out

v. 推敲

pact

n. 合同,条约,公约

# 参考译文

布鲁塞尔的官员说,在美国屠宰的鸡不适于用来装点欧洲的餐桌。不,美国人说,我们的家禽很好,只是我们使用了另一种清洗方式。当前,是各国管理条例上的差异,而不是关税阻碍了发达国家之间的贸易。并不仅仅是农民在抱怨。一把符合欧洲联盟安全标准的电动剃须刀必须得到美国检测人员的认可,方可在美国市场上销售;而美国制造的透析仪也要得到欧盟的首肯才能进入欧洲市场。

碰巧在欧洲使用安全的剃须刀不大可能使美国人触电身亡,因此,大西洋两岸的企业都在问,当一套测试可以解决问题时,为什么需要两套呢?政治家在原则上同意了,因此,美国和欧洲一直在寻求达成协议,以便为许多产品取消双重检查。他们希望尽早达成协议,为5月28日举行的美国和欧洲贸易的最高通级会议作准备。然谈判代表持乐观态度,但协议细节如此复杂,他们所面临的困难很可能使他们无法取得一致。

为什么呢?困难之一是起草这些协议。美国人很愿意就医疗器械的标准达成一个协议,然后推敲出不同的合同,用以涵盖 -- 比如说 -- 电子产品和药品的生产。欧洲人遵循优良的大陆传统,则希望就普遍的原则取得一致,而这些原则适用于许多不同产品,同时可能延伸到其它国家。

Lesson 9 Royal espionage 王室谍报活动

First listen and then answer the following question.

听录音, 然后回答以下问题。

What important thing did King Alfred learn when he penetrated the Danish camp of Guthrum?

Alfred the Great acted his own spy, visiting Danish camps disguised as a minstrel. In those days wandering minstrels were welcome everywhere. They were not fighting men, and their harp was their passport. Alfred had learned many of their ballads in his youth, and could vary his programme with acrobatic tricks and simple conjuring.

While Alfred's little army slowly began to gather at Athelney, the king himself set out to penetrate the camp of Guthrum, the commander of the Danish invaders. There had settled down for the winter at Chippenham: thither Alfred went. He noticed at once that discipline was slack: the Danes had the self-confidence of conquerors, and their security precautions were casual. They lived well, on the proceeds of raids on neighbouring regions. There they collected women as well as food and drink, and a life of ease had made them soft.

Alfred stayed in the camp a week before he returned to Athelney. The force there assembled was trivial compared with the Danish horde. But Alfred had deduced that the Danes were no longer fit for prolonged battle: and that their commissariat had no organization, but depended on irregular raids.

So, faced with the Danish advance, Alfred did not risk open battle but harried the enemy. He was constantly on the move, drawing the Danes after him. His patrols halted the raiding parties: hunger assailed the Danish army. Now Alfred began a long series of skirmishes -- and within a month the Danes had surrendered. The episode could reasonably serve as a unique epic of royal espionage!

BERNARD NEWMAN Spies in Britain

New words and expressions 生词和短语

espionage

n. 间谍活动

Alfred

公元 871-899 年间任英国国王

Danish

adj. 丹麦的, 丹麦人的, 丹麦语的

minstrel

n. 中世纪的吟游歌手

wandering

adj. 漫游的

harp

n. 坚琴

ballad

n. 民歌

acrobatic

adj. 杂技的

conjuring

n. 魔术

Athelney

n. 阿塞尔纳(英国一个小岛)

Chippenham

n. 切本哈姆(英国一个城市)

thither

adv. 向那里

Dane

n. 丹麦人

slack

adj. 涣散的

conqueror

n. 征服者

casual

adj. 马虎的, 随便的

precaution

n. 预防,警惕

proceeds

n. 所得

assemble

v. 集合

trivial

adj. 微不足道的

prolonged

adj. 持久的

commissariat

n. 军粮供应

episode

n. 一个事件, 片断

epic

n. 史诗

harry

v. 骚扰

assail

v. 袭击

skirmish

n. 小规模战斗

## 参考译文

阿尔弗雷德大帝曾亲自充当间谍。他扮作吟游歌手到丹麦军队的营地里侦察。当时,浪迹天涯的吟游歌手到处受欢迎,他们不是作战人员,竖琴就是他们的通行证。阿尔弗德年轻时学过许多民歌,并能穿插演一些杂技和小魔术使自己的节目多样化。

阿尔弗雷德人数不多的军队开始在阿塞尔纳慢慢集结时,他亲自潜入丹麦入侵司令官古瑟罗姆的营地。丹麦军已在切本哈姆扎下营准备过冬,阿尔弗雷便来到此地。他马上发现丹麦军纪律松弛,他们以征服者自居,安全措施马马虎虎。他们靠掠夺附近的地区的财物过着舒适的生活。他们不仅搜刮吃的喝的,而且抢掠妇女,安逸的生活已使丹麦军队变得软弱无力。

阿尔弗雷德在敌营呆了一个星期后,回到了阿塞尔纳。他集结在那里的军队和丹麦大军相比是微不足道的,然而,阿尔弗雷德断定,丹麦人已不再适应持久的战争,他们的军需供应处于无组织状态,只是靠临时抢夺来维持。

因此,面对丹麦人的进攻,阿尔弗雷德没有贸然同敌人作战,而是采用骚扰敌人的战术。他的部队不停地移动,牵着敌人的鼻子,让他们跟着跑。他派出巡逻队阻止敌人抢劫,因而饥饿威胁着丹麦军队。这时,阿尔弗雷德发起一连串小规模的进攻,结果不出一个月,丹麦人就投降了。这一幕历史可以说是王室谍报活动中最精彩的篇章。.

Lesson 10 Silicon valley 硅谷

First listen and then answer the following question. 听录音, 然后回答以下问题。

What does the computer industry thrive on apart from anarchy?

Technology trends may push Silicon Valley back to the future. Carver Mead, a pioneer in integrated circuits and a professor of computer science at the California Institute of Technology, notes there are now work-stations that enable engineers to design, test and produce chips right on their desks, much the way an editor creates a newsletter on a Macintosh. As the time and cost of making a chip drop to a few days and a few hundred dollars, engineers may soon be free to let their imaginations soar without being penalized by expensive failures. Mead predicts that inventors will be able to perfect powerful customized chips over a weekend at the office --spawning a new generation of garage start-ups and giving the U.S. a jump on its foreign rivals in getting new products to market fast. 'We're got more garages with smart people,' Mead observes. 'We really thrive on anarchy.'

And on Asians. Already, orientals and Asian Americans constitute the majority of the engineering staffs at many Valley firms. And Chinese, Korean, Filipino and Indian engineers are

graduating in droves from California's colleges. As the heads of next-generation start-ups, these Asian innovators can draw on customs and languages to forge righter links with crucial Pacific Rim markets. For instance, Alex Au, a Stanford Ph. D. from Hong Kong, has set up a Taiwan factory to challenge Japan's near lock on the memory-chip market. India-born N.Damodar Reddy's tiny California company reopened an AT & T chip plant in Kansas City last spring with financing from the state of Missouri. Before it becomes a retirement village, Silicon Valley may prove a classroom for building a global business.

# US NEWS AND WORLD REPORT, October 2, 1989

New words and expressions 生词和短语

silicon

n. 硅

integrated

adj. 综合的

circuit

n. 线路, 电路

California

n. 加利福尼亚(美国州名)

workstation

n. 工作站

chip

n. 芯片,集成电路片,集成块

newsletter

n. 时事通讯

Macintosh

n. 苹果机,一种个人电脑

penalize

v. 处罚,惩罚

customize

v. 按顾客具体需要制造

spawn

v. 引起,酿成

thrive

v. 兴旺,繁荣

anarchy

n. 无政府状态,混乱

oriental

n. 东方人

constitute

v. 构成

drove

n. 群

innovator

n. 发明者

forge

v. 发展

memory-chip

n. 内存条

AT & T

美国电话电报公司 (American Telephone and Telegraph)

Kansas

n. 堪萨斯 (美国州名)

Missouri

n. 密苏里(美国州名)

#### 参考译文

技术的发展趋势有可能把硅谷重新推向未来。卡弗.米德 -- 集成电路的一位先驱,加州理工学院的计算机教授 -- 注意到,现在有些计算机工作站使工程技术人员可以在他们的办公桌上设计、试验和生产芯片,就像一位编辑在苹果机上编出一份时事通讯一样。由于制造一块芯片的时间已缩短至几天,费用也只有几百美元,因此,工程技术人员可能很块就可充分发挥他们的想像力,而不会因失败而造成经济上的损失。米德预言发明者可以在办公室用一个周末的时间生产了完美的、功能很强的、按客户需求设计的芯片 -- 造就新一代从汽车间起家的技术人员,在把产品推向市场方面使美国把它的外国对手们打个措手不及。 "我们有更多的汽车间,那里有许多聪明人,"米德说。"我们确实是靠这种无政府状态发展起来的。"靠的是亚洲人。硅谷许多公司中工程技术人员的大多数是东方人和亚裔美国人。中国、韩国、菲律宾和印度的工程师一批批地从加州的大学毕业。作为新掘起一代的带头人,亚裔发明家可以凭借他们在习惯和语言上的优势,与关键的太平洋沿岸市场建立起更加牢固的联系。比如说,亚历克斯.奥,一位来自香港的斯坦福大学博士,已经在台湾建厂,对日本在内存条市场上近似垄断的局面提出了挑战。印度出生的 N.达莫达.雷迪经营的小小的加州公司在堪萨斯城重新启用了美国电话电报公司的一家芯片工厂,并从密苏里州获取了财政上的支持。在硅谷变成一个退休村之前,它很可能成为建立全球商业的一个教学场地。

Lesson 11 How to grow old 如何安度晚年

First listen and then answer the following question. 听录音,然后回答以下问题。

What, according to the author, is the best way to overcome the fear of death as you get older?

Some old people are oppressed by the fear of death. In the young there is a justification for this feeling. Young men who have reason to fear that they will be killed in battle may justifiably feel bitter in the thought that they have cheated of the best things that life has to offer. But in an old man who has known human joys and sorrows, and has achieved whatever work it was in him

to do, the fear of death is somewhat abject and ignoble. The best way to overcome it -- so at least it seems to me -- is to make your interests gradually wider and more impersonal, until bit by bit the walls of the ego recede, and your life becomes increasingly merged in the universal life. An individual human existence should be like a river -- small at first, narrowly contained within its banks, and rushing passionately past boulders and over waterfalls. Gradually the river grows wider, the banks recede, the waters flow more quietly, and in the end, without any visible break, they become merged in the sea, and painlessly lose their individual being. The man who, in old age, can see his life in this way, will not suffer from the fear of death, since the things he cares for will continue. And if, with the decay of vitality, weariness increases, the thought of rest will be not unwelcome. I should wish to die while still at work, knowing that others will carry on what I can no longer do, and content in the thought that what was possible has been done.

# BERTRAND RUSSELL How to grow old from Portraits from Memory

New words and expressions 生词和短语

oppress

v. 忧郁, 压抑

justification

n. 正当理由

justifiably

adv. 无可非议地

cheat

v. 欺骗

abject

adj. 可怜的

ignoble

adj. 不体面的,可耻的

impersonal

adj. 超脱个人感情影响的

ego

n. 自我

receded

v. 退去

increasing

adv. 日益,不断

passionately

adv. 激昂地

painlessly

adv. 毫无痛苦地

vitality

n. 精力

weariness

n. 疲惫感

参考译文

有些老年人因为怕死而感到烦恼。青年人有这种感觉是情有可原的。有理由害怕自己会死在战场上的年轻人,想到自己被剥夺了生活所能给予的最美好的东西时,感到痛苦,这是可以理解的。可是老年人已经饱尝了人间的甘苦,一切能做的都做了,如果怕死,就有点儿可怜又可鄙。克服怕死的最好办法 -- 至少在我看来是这样 -- 就是逐渐使自己的兴趣更加广泛,逐渐摆脱个人狭小的圈子,直到自我的围墙一点一点地倒塌下来,自己的生活慢慢地和整个宇宙的生活融合在一起。个人的存在应该像一条河流,开始很小,被紧紧地夹在两岸中间,接着热情奔放地冲过巨石,飞下瀑布。然后河面渐渐地变宽,两岸后撤,河水流得平缓起来,最后连绵不断地汇入大海,毫无痛苦地失去了自我的存在。上了年纪的人这样看待生命,就不会有惧怕死亡的心情了,因为自己关心的一切事件都会继续下去。 再者,随着精力的衰退,老年人的疲惫会增长,有长眠的愿望未尝不是一件好事情,我希望工作到死为止,明白了有人会继续我的未竟事业,想到能做的事都做了,也就坦然了。

Unit 2 Lesson 12 Banks and their customers 银行和顾客

First listen and then answer the following question. 听录音,然后回答以下问题。

Why is there no risk to the customer when a bank prints the customer's name on his cheques?

When anyone opens a current account at a bank, he is lending the bank money, repayment of which he may demand at any time, either in cash or by drawing a cheque in favour of another person. Primarily, the banker-customer relationship is that of debtor and creditor -- who is which depending on whether the customer's account is in credit or is overdrawn. But, in addition to that basically simple concept, the bank and its customer owe a large number of obligations to one another. Many of these obligations can give in to problems and complications but a bank customer, unlike, say, a buyer of goods, cannot complain that the law is loaded against him.

The bank must obey its customer's instructions, and not those of anyone else. When, for example, a customer first opens an account, he instructs the bank to debit his account only in respect of cheques draw by himself. He gives the bank specimens of his signature, and there is a very firm rule that the bank has no right or authority to pay out a customer's money on a cheques on which its customer's signature has been forged. It makes no difference that the forgery may have been a very skilful one: the bank must recognize its customer's signature. For this reason there is no risk to the customer in the practice, adopted by banks, of printing the customer's name on his cheques. If this facilitates forgery, it is the bank which will lose, not the customer.

GORDON BARRIE and AUBREY L. DLAMOND The Consumer Society and the Law

New words and expressions 生词和短语 current adj. 通用的,流行的 account

- n. 账户
  - cash
- n. 现金
  - debtor
- n. 支票
  - debtor
- n. 借方
  - creditor
- n. 贷方
  - obligation
- n. 义务
  - complication
- n. 纠纷
  - debit
- v. 把...记入借方
  - specimen
- n. 样本
  - forge
- v. 伪造
  - forgery
- n. 伪造(文件,签名等)
  - adopt
- v. 采用
  - facilitate
- v. 使便利

# 参考译文

任何人在银行开一个活期账户,就等于把钱借给了银行。这笔钱他可以随时提取,提取的方式可以是取现金,也可以是开一张以他人为收款人的支票。银行与储户的关系主要是债务人和债权人的关系。究竟谁是债务人谁是债权人,要看储户是有结余还是透支。除了这一基本的简单的概念外,银行和储户彼此还需承担大量义务。其中许多义务往往引起问题和纠纷。但是储户不能像货物的买主那样来抱怨法律对自己不利。

银行必须遵照储户的嘱托办事,不能听从其他人的指令。比如,储户首次在银行开户时,嘱咐银行他的存款只能凭本世人签字的支票来提取。他把自己签名的样本交给银行,对此有一条非常严格的规定:银行没有任何权利或理由把储户的钱让伪造储户的支票取走。即使伪造得很巧妙,也不能付款,因为银行有责任辨认出其储户的签名。因此,某些银行已采用把储户印在支票上的作法。这种做法对储户毫无风险。如果因这种作法出现了伪造的话,受损失的将不是储户,而是银行。

Lesson 13 The search for oil 探寻石油 First listen and then answer the following question.

听录音, 然后回答以下问题。

What do oilmen want to achieve as soon as they strike oil?

The deepest holes of all made for oil, and they go down to as much as 25,0000 feet. But we not need to send men down to get the oil our, as we must with other mineral deposits. The holes are only borings, less than a foot in diameter. My particular experience is largely in oil, and the search for oil has done more to improve deep drilling than any other mining activity. When is has been decided where we are going to drill, we put up at the surface an oil derrick. It has to be tall because it is like a giant block and tackle, and we have to lower into the ground and haul out of the ground great lengths of drill pipe which are rotated by an engine at the top and are fitted with a cutting bit at the bottom.

The geologist needs to know what rocks the drill has reached, so every so often a sample is obtained with a coring bit. It cuts a clean cylinder of rock, from which can be seen the strata the drill has been cutting through. Once we get down to the oil, it usually flows to the surface because great pressure, either from or water, is pushing it. This pressure must be under control, and we control it by means of the mud which we circulate down the drill pipe. We endeavour to avoid the old, romantic idea of a gusher, which wastes oil and gas. We want it to stay down the hole until we can lead it off in a controlled manner.

T.F.GASKELL The Search for the Earth's Minerals from Discovery

New words and expressions 生词和短语

mineral

adj. 矿物的

boring

n. 钻孔

derrick

n. 井架

block and tackle

滑轮组

haul

v. 拖,拉

rotate

v. 使转动

cutting bit

钻头

geologist

n. 地质学家

coring

取芯钻头

cylinder

n. 圆柱体

strata

- n. 岩层[复]([单]stratum 或 strata [误用]) circulate
- v. 注入,环流 gusher
- n. 喷油井

#### 参考译文

在所有洞穴中,为寻找石油所钻出的洞是最深的,这些洞可深达 25,000 英尺。但是,我们不必像开采其他矿藏那样,把人送到地下去把石油取出。这些洞只不过是一些钻孔,直径不到 1 英尺。我是专门搞石油的,寻找石油比其他任何采矿业对改进钻探作的贡献都要大。当确定钻孔地点后,我们就在那里竖起一个井架。井架必须很高,因为它像一个巨型滑轮组。我们必须把很长的钻杆一节节地钻入地下,然后再从地下拉出来。钻杆顶部安装的发动机带动钻杆旋转,它的底部装有钻头。

地质学家需要知道钻头已以到达什么样的岩层,因此时常要用芯钻头取样。这种钻头能切割一段光滑的圆柱形岩石,从中能看出所钻透的地层。一旦到达油层,石油就会由于地下巨大的压力流到地面上来,这种巨大的压力来自地下天然气或水。这种压力必须加以控制,我们让泥桨顺着钻杆向下循环,用这种方法来控制压力。我们尽量避免使用陈旧天真的喷井方法,那样会浪费石油和天然气。我们要让石油留在井下,直到我们能用一种有控制的方法把它引上来为止。

Lesson 14
The Butterfly Effect 蝴蝶效应

First listen and then answer the following question.

听录音,然后回答以下问题。

Why do small errors make it impossible to predict the weather system with a high degree of accuracy?

Beyond two or three days, the world's best weather forecasts are speculative, and beyond six or seven they are worthless.

The Butterfly Effect is the reason. For small pieces of weather -- and to a global forecaster, small can mean thunderstorms and blizzards -- any prediction deteriorates rapidly. Errors and uncertainties multiply, cascading upward through a chain of turbulent features, from dust devils and squalls up to continent-size eddies that only satellites can see.

The modern weather models work with a grid of points of the order of sixty miles apart, and even so, some starting data has to guessed, since ground stations and satellites cannot see everywhere. But suppose the earth could be covered with sensors spaced one foot apart, rising at one-foot intervals all the way to the top of the atmosphere. Suppose every sensor gives perfectly

accurate readings of temperature, pressure, humidity, and any other quantity a meteorologist would want. Precisely at noon an infinitely powerful computer takes all the data and calculates what will happen at each point at 12.01, then 1202, then 12.03...

The computer will still be unable to predict whether Princeton, New Jersey, will have sun or rain on a day one month away. At noon the spaces between the sensors will hide fluctuations that the computer will not know about, tiny deviations from the average. By 12.01, those fluctuations will already have created small errors one foot away. Soon the errors will have multiplied to the ten-foot scale, and so on up to the size of the globe.

#### JAMES GLEICK, Chaos

New words and expressions 生词和短语

forecast

n. 预报

speculative

adj. 推测的

blizzard

n. 暴风雪

deteriorate

v. 变坏

multiply

v. 增加

cascade

v. 瀑布似地落下

turbulent

adj. 狂暴的

dust devil

小尘暴, 尘旋风

squall

n. 暴风

eddy

n. 旋涡

grid

n. 坐标方格

sensor

n. 传感器

humidity

n. 温度

meteorologist

n. 气象学家

Princeton

n. 普林斯顿 (美国城市名)

New Jersey

n. 新泽西 (美国州名)

fluctuation

- n. 起伏,波动 deviation
- n. 偏差

# 参考译文

世界上最好的两三天以上的天气预报具有很强的猜测性,如果超过六七天,天气预报就没有了任何价值。

原因是蝴蝶效应。对于小片的恶劣天气 -- 对一个全球性的气象预报员来说,"小"可以意味着雷暴雨和暴风雪 -- 任何预测的质量会很快下降。错误和不可靠性上升,接踵而来的是一系列湍流的徵状,从小尘暴和暴风发展到只有卫星上可以看到的席卷整块大陆的旋涡。

现代气象模型以一个坐标图来显示,图中每个点大约是间隔 60 英里。既使是这样,有些开始时的资料也不得不依靠推测,因为地面工作站和卫星不可能看到地球上的每一个地方。假设地球上可以布满传感器,每个相隔 1 英尺,并按 1 英尺的间隔从地面一直排列到大气层的顶端。再假定每个传感器都极极端准确地读出了温度、气压、温度和气象学家需要的任何其他数据。在正午时分,一个功能巨大的计算机搜集了所有的资料,并算出在每一个点上 12: 01、12: 02、12: 03 时可能出现的情况。

计算机无法推断出 1 个月以后的某一天,新泽西州的普林斯顿究竟是晴天还是雨天。正午时分,传感器之间的距离会掩盖计算机无法知道的波动、任何偏平均值的变化。到 12:01 时,那些波动就已经会在 1 英尺远的地方造成偏差。很快这种偏差会增加到尺 10 英的范围,如此等等,一直到全球的范围。

Lesson 15 Secrecy in industry 工业中的秘密

First listen and then answer the following question. 听录音,然后回答以下问题。

Why is secrecy particularly important in the chemical industries?

Two factors weigh heavily against the effectiveness of scientific research in industry. One is the general atmosphere of secrecy in which it is carried out, the other the lack of freedom of the individual research worker. In so far as any inquiry is a secret one, it naturally limits all those engaged in carrying it out from effective contact with their fellow scientists either in other countries or in universities, or even, often enough, in other departments of the same firm. The degree of secrecy naturally varies considerably. Some of the bigger firms are engaged in researches which are of such general and fundamental nature that it is a positive advantage to them not to keep them secret. Yet a great many processes depending on such research are sought for with complete secrecy until the stage at which patents can be taken out. Even more processes are never patented at all but kept as secret processes. This applies particularly to chemical industries, where chance discoveries play a much larger part than they do in physical and mechanical

industries. Sometimes the secrecy goes to such an extent that the whole nature of the research cannot be mentioned. Many firms, for instance, have great difficulty in obtaining technical or scientific books from libraries because they are unwilling to have names entered as having taken out such and such a book, for fear the agents of other firms should be able to trace the kind of research they are likely to be undertaking.

# J.D. BERNAL The Social Function of Science

New words and expressions

secrecy

n. 秘密

effectiveness

n. 成效,效力

inquiry

n. 调查研究

positive

adj. 确实的

process

n. 过程

patent

- n. 专利;
- v. 得到专利权 agent
- n. 情报人员

# 参考译文

有两个因素严重地妨碍工业中科学研究的效率:一是科研工作中普遍存在的保密气氛;二是研究人员缺乏个人自由。任何一项研究都涉及到保密,那些从事科研的人员自然受到了限制。他们不能和其他国家、其他大学、甚至往往不能与本公司的其他部门的同行们进行有效的接触。保密程度自然差别很大。某些大公司进行的研究属于一般和基础的研究,因此不保密对他们才有利。然而,依赖这种研究的很多工艺程序是在完全保密的情况下进行的,直到可以取得专利权的阶段为止。更多的工艺过程根本就不会取得专利权,而是作为秘方保存着。在这化学工业方面尤为突出。同物理和机械工业相比,化学工业中偶然发现的机会要多得多。有时,保密竟达到了这样的程度,即连研究工作的整个性质都不准提及。比如,很多公司向图书馆借阅科技书籍时感到困难,因为它们不愿让人家记下它们公司的名字和借阅的某一本书。他们生怕别的公司的情报人员据此摸到他们可能要从事的某项科研项目。

Lesson 16 The modern city 现代城市 First listen and then answer the following question.

听录音, 然后回答以下问题。

What is the author's main argument about the modern city?

In the organization of industrial life the influence of the factory upon the physiological and mental state of the workers has been completely neglected. Modern industry is based on the conception of the maximum production at lowest cost, in order that an individual or a group of individuals may earn as much money as possible. It has expanded without any idea of the true nature of the human beings who run the machines, and without giving any consideration to the effects produced on the individuals and on their descendants by the artificial mode of existence imposed by the factory. The great cities have been built with no regard for us. The shape and dimensions of the skyscrapers depend entirely on the necessity of obtaining the maximum income per square foot of ground, and of offering to the tenants offices and apartments that please them. This caused the construction of gigantic buildings where too large masses of human beings are crowded together. Civilized men like such a way of living. While they enjoy the comfort and banal luxury of their dwelling, they do not realize that they are deprived of the necessities of life. The modern city consists of monstrous edifices and of dark, narrow streets full of petrol fumes and toxic gases, torn by the noise of the taxicabs, lorries and buses, and thronged ceaselessly by great crowds. Obviously, it has not been planned for the good of its inhabitants.

ALEXIS CARREL Man, the Unknown

New words and expressions 生词和短语

physiological

adj. 生理的

maximum

adj. 最大限度的 consideration

n. 考虑

descendant

n. 子孙,后代 artificial

n. 人工的

impose

v. 强加

dimension

n. 直径

skyscraper

n. 摩天大楼

tenant

n. 租户

civilized

adj. 文明的

banal

adj. 平庸

luxury

n. 豪华

deprive

v. 剥夺

monstrous

adj. 畸形的

edifice

n. 大厦

toxic

adj. 有毒的

ceaselessly

adv. 不停地

throng

v. 挤满, 壅塞

# 参考译文

在工业生活的组织中,工厂对工人的生理和精神状态的影响完全被忽视了。现代工业的基本概念是:以最低成本获取最多产品,为的是让某个个人或某一部分人尽可能多地赚钱。现代工业发展起来了,却根本没想到操作机器的人的本质。工厂把一种人为的生存方式强加给工人,却不顾及这种生存方式给工人及其后代带来的影响。大城市的建设毫不关心我们。摩天大楼完全是按这样的需要修建的:每平方英尺地皮取得最大收入和向租房人提供使他满意的办公室和住房。这样就导致了许多摩天大厦拔地而起,大厦内众多的人挤地一起。文明人喜欢这样一种生活方式。在享受自己住宅的舒适和庸俗的豪华时,却没有意识到被剥夺了生活所必需的东西。大得吓人的高楼和阴暗狭窄的街道组成了今日现代化的城市。街道上充斥着汽油味和有毒气体,出租汽车、卡车、公共汽车的噪音刺耳难忍,络绎不绝的人群挤来挤去。显然,现代化的城市不是这居民的利益而规划的。

# Lesson 17 A man-made disease 人为的疾病

First listen and then answer the following question. 听录音,然后回答以下问题。

What factor helped to spread the disease of myxomatosis?

In the early days of the settlement of Australia, enterprising settlers unwisely introduced the European rabbit. This rabbit had no natural enemies in the Antipodes, so that it multiplied with that promiscuous abandon characteristic of rabbits. It overran a whole continent. It caused devastation by burrowing and by devouring the herbage which might have maintained millions of

sheep and cattle. Scientists discovered that this particular variety of rabbit (and apparently no other animal) was susceptible to a fatal virus disease, myxomatosis. By infecting animals and letting them loose in the burrows, local epidemics of this disease could be created. Later it was found that there was a type of mosquito which acted as the carrier of this disease and passed it on to the rabbits. So while the rest of the world was trying to get rid of mosquitoes, Australia was encouraging this one. It effectively spread the disease all over the continent and drastically reduced the rabbit population. It later became apparent that rabbits were developing a degree of resistance to this disease, so that the rabbit population was unlikely to be completely exterminated. There were hopes, however, that the problem of the rabbit would become manageable.

Ironically, Europe, which had bequeathed the rabbit as a pest to Australia, acquired this man-made disease as a pestilence. A French physician decided to get rid of the wild rabbits on his own estate and introduced myxomatosis. It did not, however, remain within the confines of his estate. It spread through France, Where wild rabbits are not generally regarded as a pest but as sport and a useful food supply, and it spread to Britain where wild rabbits are regarded as a pest but where domesticated rabbits, equally susceptible to the disease, are the basis of a profitable fur industry. The question became one of whether Man could control the disease he had invented.

## RITCHIE CALDER Science Makes Sense

New words and expressions 生词和短语

settlement

n. 新拓居地

enterprising

adj. 有事业心的

settler

n. 移居者

Antipodes

n. 新西兰和澳大利亚(英)

promiscuous

adj. 杂乱的

abandon

n. 放任,纵情

overrun

v. 蔓延,泛滥

devastation

n. 破坏,劫掠

burrow

v. 挖、掘

susceptible

adj. 易受感染的

virus

n. 病毒

myxomatosis

n. 多发性粘液瘤

infect

- v. 传染
  - epidemic
- n. 流行病
  - mosquito
- n. 蚊虫
  - carrier
- n. 带菌者
  - exterminate
- v. 消灭
  - ironically
- adv. 具有讽刺意味地
  - bequeath
- v. 把...传给
  - pest
- n. 害虫,有害动物 pestilence
- n. 瘟疫
  - confine
- n. 范围
  - domesticate
- v. 驯养

## 参考译文

在澳大利亚移民初期,一些有创业精神的移民不明智地把欧洲兔子引进了澳大利亚。这种兔子在澳大利亚及新西兰没有天敌,因此便以兔子所特有的杂乱交配迅猛繁殖起来。整个澳洲兔子成灾。它们在地下打洞,吃掉本可以饲养数百万头牛羊的牧草,给澳洲大陆造成了毁灭性的破坏。科学家们发现,这种特殊品种的兔子(显然不包括别的动物)易患一种叫"多发性粘液瘤"的致命毒性疾病。通过让染上此病的动物在洞内乱跑,就可以使这种疾病在一个地区蔓延起来。后来又发现,有一种蚊子是传播这种疾病的媒介,能把此病传染给兔子。因此,世界上其他地方在设法消灭蚊子的时候,澳大利亚却在促使这种蚊子大量繁殖。蚊子把这种疾病扩散到整个澳洲大陆,效果甚佳,结果兔子的数目在为减少。后来,明显看出,兔子对这种疾病已产生了一定程度的免疫力,所以兔子不可能被完全消灭。但是,已有希望解决兔子所带来的问题。

具有讽刺意味的是,欧洲把这种兔子作为有害动物传给澳洲,而欧洲自己却染上了这种人为的瘟疫般的疾病。一位法国内科医生决定除掉自己庄园内的野兔子,于是引进了这种多发性粘液瘤疾病。然而,这种疾病并未被局限在他的庄园内,结果在整个法国蔓延开来。野兔在法国一般不被当作有害动物,而被视为打猎取乐的玩物和有用的食物来源。这种疾病又蔓延到了英国。在英国,野兔被当作有害的动物,可是家兔是赚钱的毛皮工业的基础,然而家兔同样易感染这种疾病。现在的问题是,人类能否控制住这种人为的疾病。

Lesson 18 Porpoises First listen and then answer the following question.

听录音, 然后回答以下问题。

What would you say is the main characteristic of porpoises?

There has long been a superstition among mariners that porpoises will save drowning men by pushing them to the surface, or protect them from sharks by surrounding them in defensive formation. Marine Studio biologists have pointed out that, however intelligent they may be, it is probably a mistake to credit dolphins with any motive of lifesaving. On the occasions when they have pushed to shore an unconscious human being they have much more likely done it out of curiosity or for sport, as in riding the bow waves of a ship. In 1928 some porpoises were photographer working like beavers to push ashore a waterlogged mattress. If, as has been reported, they have protected humans from sharks, it may have been because curiosity attracted them and because the scent of a possible meal attracted the sharks. Porpoises and sharks are natural enemies. It is possible that upon such an occasion a battle ensued, with the sharks being driven away or killed.

Whether it be bird, fish or beast, the porpoise is intrigued with anything that is alive. They are constantly after the turtles, who peacefully submit to all sorts of indignities. One young calf especially enjoyed raising a turtle to the surface with his snout and then shoving him across the tank like an aquaplane. Almost any day a young porpoise may be seen trying to turn a 300-pound sea turtle over by sticking his snout under the edge of his shell and pushing up for dear life. This is not easy, and may require two porpoises working together. In another game, as the turtle swims across the oceanarium, the first porpoise swoops down from above and butts his shell with his belly. This knocks the turtle down several feet. He no sooner recovers his equilibrium than the next porpoise comes along and hits him another crack. Eventually the turtle has been butted all the way down to the floor of the tank. He is now satisfied merely to try to stand up, but as soon as he does so a porpoise knocks him flat. The turtle at last gives up by pulling his feet under his shell and the game is over.

# RALPH NADING HILL Window in the Sea

New words and expressions 生词和短语

porpoise

n. 海豚

mariner

n. 水手

shark

n. 鲨鱼

formation

n. 队形

dolphin

n. 海豚科动物

unconscious

- adj. 不省人事
  - beaver
- n. 海狸
  - ashore
- adv. 上岸
  - waterlogged
- adj. 浸满水的
  - scent
- n. 香味
  - ensue
- v. 接着发生
  - intrigue
- v. 引起兴趣 indignity
- n. 侮辱
  - snout
- n. 口鼻部
  - shove
- v. 硬推
  - aquaplane
- n. 驾浪滑水板
  - oceanarium
- n. 水族馆
  - swoop
- v. 猛扑
  - belly
- n. 腹部
  - equilibrium
- n. 平衡
  - butt
- v. 碰撞
  - crack
- n. 重击

#### 参考译文

长期以来,海员中流传着一种迷信的说法,认为海豚会把快要淹死的人托到水面,救人性命;或在人们周围列队保护,使他们免遭鲨鱼伤害。海洋摄影室的生物学家指出,无论海豚多么聪明,认为它们有救人的动机可能是错误的。当它们偶尔把一个失去知觉的人推到岸边时,更大的可能是出于好奇或游戏,就像它们追逐被船首犁开的浪花一样。1928年,有人拍摄到了海豚像海狸一样把浸透水的床垫推上岸的情景。正如报道中所说,如果海豚保护人不受鲨鱼侵害,那么它们可能是出于好奇;而鲨鱼可能是闻到了可以美食一顿的香味。海豚和鲨鱼是天然仇敌,双方可能随之发生搏斗,搏斗结果是海豚赶走或咬死鲨鱼。

海豚对凡是活的东西都感兴趣,不管是鸟、是鱼,还是野兽。它们经常追逐海龟,海龟

则温顺地忍受着各种侮辱。一只小海豚特别喜欢用鼻子把海龟推到水面,然后像滑水板一样把海龟从水池的这一边推到那一边。几乎每天都可以看到一只小海豚把鼻子顶入一只 300 磅重的海龟的硬壳下面,拼命地把它翻过来。这并非易事,可能需要两只海豚合伙干才行。在另一场游戏中,当海龟游过水族馆时,第一只海豚从上方猛扑下去,用腹部撞击龟壳。这一下子把海龟撞下去好几英尺。海龟刚恢复平衡,第二只海豚又冲过来猛击一下。这只海龟最终被撞到池底。此时的海龟,只要能站起来就满足了,但它刚站起来,就被一只海豚击倒。海龟终于屈服了,将4条腿缩进壳内。游戏到此结束。

Lesson 19
The stuff of dreams
话说梦的本质

First listen and then answer the following question. 听录音,然后回答以下问题。

What is going on when a person experiences rapid eye-movements during sleep?

It is fairly clear that sleeping period must have some function, and because there is so much of it the function would seem to e important. Speculations about is nature have been going on for literally thousands of years, and one odd finding that makes the problem puzzling is that it looks very much as if sleeping is not simply a matter of giving the body a rest. 'Rest', in terms of muscle relaxation and so on, can be achieved by a brief period lying, or even sitting down. The body's tissues are self-repairing and self-restoring to a degree, and function best when more or less continuously active. In fact a basic amount of movement occurs during sleep which is specifically concerned with preventing muscle inactivity.

If it is not a question of resting the body, then perhaps it is the brain that needs resting? This might be a plausible hypothesis were it not for two factors. First the electroencephalograph (which is simply a device for recording the electrical activity of the brain by attaching electrodes to the scalp) shows that while there is a change in the pattern of activity during sleep, there is no evidence that the total amount of activity is any less. The second factor is more interesting and more fundamental. Some years ago an American psychiatrist named William Dement published experiments dealing with the recording of eye-movements during sleep. He showed that the average individual's sleep cycle is punctuated with peculiar bursts of eye-movements, some drifting and slow, others jerky and rapid. People woken during these periods of eye-movements generally reported that they had been dreaming. When woken at other times they reported no dreams. If one group of people were disturbed from their eye-movement sleep for several nights on end, and another group were disturbed for an equal period of time but when they were no exhibiting eye-movements, the first group began to show some personality disorders while the others seemed more or less unaffected. The implications of all this were that it was not the disturbance of sleep that mattered, but the disturbance of dreaming.

CHRISTOPHER EVANS The stuff of dreams from The Listener

New words and expressions 生词和短语 speculation

n. 推测

literally

adv. 确实

odd

adj. 奇特的

tissue

n. 组织 plausible

adj. 似乎有理的

hypothesis

n. 假说

electroencephalograph

n. 脑电图仪 electrode

n. 电极

scalp

n. 头皮

psychiatrist

n. 精神病学家

punctuate

v. 不时介入

jerky

adj. 急动的

disorder

n. 失调

implication

n. 表明

## 参考译文

很清楚,睡眠必然具有某种作用。睡眠占去那么多时间,所以其作用似乎还是很重要。 人们对睡眠作用的种种猜测,确实有数千年之久。一项使人对这个问题感到困惑的奇怪的发现是,睡眠在很大程度似乎并不仅仅是为了使身体得到休息。"休息",从使肌肉得到放松等方面来看,只要稍微躺一躺,甚至坐一坐就能达到。人体组织在一定程度上有自我修补和自我恢复的能力,有张有弛地连续活动时,其功能最佳。事实上,睡眠状态下仍有着基本的活动量,以防止肌肉活动停止。

如果睡眠的功能不是在于使身体得到休息,那么也许是让大脑得以休息?若不是下面两点,这种假使似乎是有道理的。第一点,脑电图记录仪(不过是一种把电极接到头皮上记录脑电活动的仪器)显示,人在睡眠时大脑活动的方式有变化,但没有迹象表明,其活动总量有任何减少。第二点更有意思,也更重要。前些年,美国一位精神病学者发表了一篇报告,报告中记录了眼球在睡眠时的活动情况。他指出,平常人的睡眠周期中不时伴有一阵阵奇怪的眼球队活动,这些活动有的飘忽而缓慢,有的急剧而快速。在眼球活动期间被叫醒的人都

说自己在做梦;在其他期间叫醒他们,则说没有做梦。如果有两组人,一组人连续几夜在眼球队活动时被叫醒;另一组人也是连续几夜被叫醒,但是在眼球队没活动时被叫醒的。结果,第一组人开始出现性格失常,而第二组人似乎没受什么影响。这一切暗示我们:睡眠受到干忧没关系,而做梦受到干忧是有问题的。

Lesson 20 Snake poison 蛇毒

First listen and then answer the following question. 听录音, 然后回答以下问题。

What are the two different ways in which snake poison acts?

How it came about that snakes manufactured poison is a mystery. Over the periods their saliva, a mild, digestive juice like our own, was converted into a poison that defies analysis even today. It was not forced upon them by the survival competition; they could have caught and lived on prey without using poison, just as the thousands of non-poisonous snakes still do. Poison to a snake is merely a luxury; it enables it to get its food with very little effort, no more effort than one bite. And why only snakes? Cats, for instance, would be greatly helped; no running fights with large, fierce rats or tussles with grown rabbits -- just a bite and no more effort needed. In fact, it would be an assistance to all carnivores though it would be a two-edged weapon when they fought each other. But, of the vertebrates, unpredictable Nature selected only snakes (and one lizard). One wonders saliva into why Nature, with respect from that of others, as other on the blood.

In the conversion of saliva into poison, one might suppose that a fixed process took place. It did not; some snakes manufacture a poison different in every respect from that of others, as different as arsenic is from strychnine, and having different effects. One poison acts on the nerves, the other on the blood.

The makers of the nerve poison include the mambas and the cobras and their venom is called neurotoxic. Vipers (adders) and rattlesnakes manufacture the blood poison, which is known as haemolytic. Both poisons are unpleasant, but by far the more unpleasant is the blood poison. It is said that the nerve poison is the more primitive of the two, that the blood poison is, so to speak, a newer product from an improved formula. Be that as it may, the nerve poison does its business with man far more quickly than the blood poison. This, however, means nothing. Snakes did not acquire their poison for use against man but for use against prey such as rats and mice, and the effects on these of viperine poison is almost immediate.

# JOHN CROMPTON The snake

New words and expressions 生词和短语 saliva

n. 唾液 digestive

- adj. 助消化的
  - defy
- v. 使不可能
  - analysis
- n. 分析
  - prey
- n. 被捕食的动物
  - fierce
- adj. 凶猛的
  - tussle
- n. 扭打
  - carnivore
- n. 食肉动物
  - vertebrate
- n. 脊椎动物
  - lizard
- n. 蜥蜴
  - concoct
- v. 调制
  - potency
- n. 效力
  - conversion
- n. 转变
  - arsenic
- n. 砒霜
  - strychnine
- n. 马钱子碱
  - mamba
- n. 树眼镜蛇
  - cobra
- n. 眼镜蛇
  - venom
- n. 毒液
  - neurotoxic
- adj. 毒害神经的
  - viper
- n. 蝰蛇
  - adder
- n. 蝮蛇
  - rattlesnake
- n. 响尾蛇
  - haemolytic
- adj. 溶血性的
  - viperine

# 参考译文

蛇是怎样产生毒液的,这是一个谜。蛇的唾液本来和我们人的消化液一样柔和,但经过漫长的时间,演变成了今天仍无法分析清楚的毒液。毒液不是生存竞争强加给它们的,它们也可以不用毒液捕捉动物而生存,就像今天成千上万的无毒蛇那样。毒液对毒蛇来说只不过是一种舒适生存的优越手段,它使蛇不用费多大力气就能捕获到食物,轻咬一口即可。为什么只有蛇才有毒液呢?譬如说,如果猫有毒液,那对猫会大有帮助,它就不必再和又大又凶的老鼠边跑边博斗了,也不必再和大兔子扭斗了,只要咬一口,就不必再费大力气。因此,任何食肉动物有了毒液,都能从中获益。不过,当它们相互撕打时,毒液就成了利弊参半的武,可以杀死对方,也可以被对方的毒液杀死。然而,在脊椎动物中,大自然神秘模测地只选择了蛇(还有一种蜥蜴),人们弄不清楚大自然为什么在某些蛇的身上调制出如此高效的毒液来。

人们可能认为, 唾液转变成毒液, 其中有固定的程序。其实没有。有些蛇产生的毒液也在各方面与另外一些毒蛇产生的毒液不同, 就像砒霜不同于马钱子碱一样。不同毒蛇产生的毒液产生的效果不同, 一种毒液作用于神经, 另一种毒液作用于血液。

产生神经毒液的蛇有一种非洲树眼镜蛇和眼镜蛇,它们的毒液称为神经毒素。蝰蛇(蝮蛇)和响尾蛇产生血液毒素,称为溶血性毒液。这两种毒液都很可怕,但溶血性毒液尤其厉害。据说,神经毒液在两种毒液中是较为原始的一种,而溶血性毒液,打个比方说,是根据改良配方生产的一种较新的产品。不过,神经毒辣液比溶血性毒液在人身上起作用快得多。但是,这没有什么关系,因为蛇有毒液不是用来对付人的,而是对付它的猎物,诸如鼠类,毒液对这些猎物会立刻起作用。

Lesson 21
William S. Hart and
the early 'Western' film
威廉.S. 哈特和早期限的'西部'影片

First listen and then answer the following question. 听录音,然后回答以下问题。

How did William Hart's childhood prepare him for his acting role in Western films?

William S. hart was, perhaps, the greatest of all Western stars, fro unlike Gary Cooper and John Wayne he appeared in nothing but Westerns. From 1914 to 1924 he was supreme and unchallenged. It was Hart who created the basic formula of the Western film, and devised the protagonist he played in every film he made, the good-had man, the accidental-noble outlaw, or the honest-but-framed cowboy, or the sheriff made suspect by vicious gossip; in short, the individual in conflict with himself and his frontier environment.

Unlike most of his contemporaries in Hollywood, Hart actually knew something of the old West. He had lived in it as a child when it was already disappearing, and his hero was firmly rooted in his memories and experiences, and in both the history and the mythology of the vanished

frontier. And although no period or place in American history has been more absurdly romanticized, myth and reality did join hands in at least one arena, the conflict between the individual and encroaching civilization.

Men accustomed to struggling for survival against the elements and Indians were bewildered by politicians, bankers and businessmen, and unhorsed by fences, laws and alien taboos. Hart's good-bad man was always an outsider, always one of the disinherited, and if he found it necessary to shoot a sheriff or rob a bank along the way, his early audiences found it easy to understand and forgive, especially when it was Hart who, in the end, overcame the attacking Indians.

Audiences in the second decade of the twentieth century found it pleasant to escape to a time when life, though hard, was relatively simple. We still do; living in a world in which undeclared aggression, war, hypocrisy, chicanery, anarchy and impending immolation are part of our daily lives, we all want a code to live by.

CARL FOREMAN Virtue and a Fast Gun from The Observer

New words and expressions 生词和短语

Supreme

adj. 首屈一指

protagonist

n. 主角

outlaw

n. 逃犯, 亡命之徒

framed

adi. 遭到陷害的

vicious

adj. 恶毒的

mythology

n. 神话

vanished

adj. 消失了的

absurdly

adv. 荒诞地

arena

n. 竞技场在

encroaching

adj. 渐渐渗入的

Indian

n. 印第安人

bewilder

v. 使手足无措

alien

adj. 外来的

taboo

n. 戒律

disinherit

- v. 剥夺...继承权 undeclared
- adj. 未经宣布的 hypocrisy
- n. 伪善 chicanery
- n. 诈骗 impending
- adj. 迫近的,近在眉睫的 immolation
- n. 杀戮 code
- n. 准则

#### 参考译文

威廉.S.哈特大概是美国西部电影明星中的佼佼者。他和加里.古柏、约翰.韦恩不同,他只在西部电影中扮演角色。在 1914 年至 1924 年期间,他首屈一指,独霸影坛。正是他创造了西部电影的基调,即在他自己的拍摄的影片中他所塑造的主人公形象:被认为是坏人的好人,出人意料的高尚的逃犯,诚实却遭陷害的牛仔或因流言蜚语蒙受嫌疑的司法官。总之,主人公是一个自相矛盾,又与他的拓荒环境相矛盾的人物。

哈特与大部分同时代在好莱坞的演员不同,他确实了解西部早期拓荒生活的一些情况。 作为一个孩子他曾在西部生活过,当时西部拓荒生活正在消失。他塑造的英雄人物深深地扎 根于他本人的记忆和经历之中,也扎根于有关已经消失的拓荒生活的历史和神话之中。虽然 在美国历史上没有任何时期或地区像西部拓荒时期那样被荒谬地浪漫主义化了,但神话和事 实至少在某一个舞台上共存,也就是存在于个人与渐渐闯入的文明这两者的冲突之中。

习惯与大自然和印第安人作斗争以求生存的拓荒者被政客、银行家和商人搞得晕头转向,最后被圈地、尖律我外来的清规戒律所击败。哈特扮演的被误为坏人的好人总是一个局外人,总是一个被剥夺继承权的人。如果他认为在进行过程中有必要枪击一个司法官或抢劫一个银行,他的早期观众很容易接受,觉得应该原谅他,特别是当哈特最后战胜了前来进攻的印第安人时,观众更能原谅他。

生活在 20 世纪 20 年代的观众认为,逃到一个即使艰苦但比较简朴的时代中去是件愉快的事,我们今天仍有这种感觉。如今,不宣而战的侵略、战争、虚伪、诈骗、无政府状态以及即将临头的毁灭成了我们日常生活的一部分,我们都希望有一个赖以生存的行为准则。

Lesson 22

Knowledge and progress 知识和进步

First listen and then answer the following question. 听录音,然后回答以下问题。

In what two areas have people made no 'progress' at all?

Why does the idea of progress loom so large in the modern world? Surely progress of a particular kind is actually taking place around us and is becoming more and more manifest. Although mankind has undergone no general improvement in intelligence or morality, it has made extraordinary progress in the accumulation of knowledge. Knowledge began to increase as soon as the thoughts of one individual could be communicated to another by means of speech. With the invention of writing, a great advance was made, for knowledge could then be not only communicated but also stored. Libraries made education possible, and education in its turn added to libraries: the growth of knowledge followed a kind of compound interest law, which was greatly enhanced by the invention of printing. All this was comparatively slow until, with the coming of science, the tempo was suddenly raised. Then knowledge began to be accumulated according to a systematic plan. The trickle became a stream; the stream has now become a torrent. Moreover, as soon as new knowledge is acquired, it is now turned to practical account. What is called 'modern civilization' is not the result of a balanced development of all man's nature. but of accumulated knowledge applied to practical life. The problem now facing humanity is: What is going to be done with all this knowledge? As is so often pointed out, knowledge is a two-edged weapon which can be used equally for good or evil. It is now being used indifferently for both. Could any spectacle, for instance, be more grimly whimsical than that of gunners ourselves very seriously what will happen if this twofold use of knowledge, with its ever-increasing power, continues.

# G.N.M.TYRRELL The Personality of Man

New words and expressions 生词和短语

loom

v. 赫然耸起

manifest

adj.明显的

morality

n. 道德

communicate

v. 交流,交际

compound

adj. 复合的

enhance

v. 增进

tempo

n. 速率

trickle

n. 涓涓细流

torrent

n. 滔滔洪流

humanity

n. 人类

indifferently

adv. 不在乎地

grimly

adv. 可怖地

whimsical

adj. 怪诞的

shatter

v. 毁坏

twofold

adj. 双重的

### 参考译文

为什么进步这个概念在现代世界显得如此突出?无疑是因为有一种特殊的进步实际上正在我们周围发生,而且变得越来越明显。虽然人类有智力和道德上没有得到普遍提高,但在知识积累方面却取得了巨大的进步。人一旦能用语言同别人交流思想,知识的积累便开始了。随着书写的发明,又迈进了一大步,因为这样一来,知识不仅能交流,而且能储存了。藏书使教育成为可能,而教育反过来又丰富了藏书,因为知识的增长遵循着一种"滚雪球"的规律。印刷术的发明又大大提高了知识增长的速度。所有这些发展都比较缓慢,而随着科学的到来,增长的速度才突然加快。于是,知识便开始有系统有计划地积累起来。涓涓细流汇成小溪,小溪现已变成了奔腾的江河。而且,新知识一旦获得,便得到实际应用。所谓"现代文明"并不是人的天性平衡发展的结果,而是积累起来的知识应用到实际生活中的结果。现在人类面临的问题是:用这些知识去做什么?正像人们常常指出的,知识是一把双刃刀,可以用于造福,也可以用来为害。人们现在正漫不经心地把知识用于这两个方面,例如:炮兵利用科学毁坏人的身体、而外科医生就在附近用科学抢救被炮兵毁坏的人体,还有什么情景比这更可怕、更怪诞的吗?我们不得不严肃地问问我们自己:随着日益增长的知识的力量,如果我们继续利用知识的这种双重性,将会发生什么样的情况呢?

Lesson 23 Bird flight 鸟的飞行方法

First listen and then answer the following question. 听录音,然后回答以下问题。

What are the two main types of bird flight described by the author?

No two sorts of birds practise quite the same sort of flight; the varieties are infinite; but two classes may be roughly seen. Any shi that crosses the Pacific is accompanied for many days by the smaller albatross, Which may keep company with the vessel for an hour without visible or more than occasional movement of wing. The currents of air that the walls of the ship direct upwards, as well as in the line of its course, are enough to give the great bird with its immense wings sufficient sustenance and progress. The albatross is the king of the gliders, the class of fliers which harness the air to their purpose, but must yield to its opposition. In the contrary school, the duck is supreme. It comes nearer to the engines with which man has 'conquered' the air, as he boasts. Duck, and like them the pigeons, are endowed with such-like muscles, that are a good part of the

weight of the bird, and these will ply the short wings with such irresistible power that they can bore for long distances through an opposing gale before exhaustion follows. Their humbler followers, such as partridges, have a like power of strong propulsion, but soon tire. You may pick them up in utter exhaustion, if wind over the sea has driven them to a long journey. The swallow shares the virtues of both schools in highest measure. It tires not, nor does it boast of its power; but belongs to the air, travelling it may be six thousand miles to and from its northern nesting home, feeding its flown young as it flies, and slipping through we no longer take omens from their flight on this side and that; and even the most superstitious villagers no longer take off their hats to the magpie and wish it good-morning.

### WILLIAM BEACH THOMAS A Countryman's Creed

New words and expressions 生词和短语

albatross

n. 信天翁

sustenance

n. 支撑力

glider

n. 滑翔者

harness

v. 利用

endow

v. 赋有

ply

v. 不断地供给

gale

n. 大风

partridge

n. 鹧鸪

like

adj. 类似的

propulsion

n. 推进力

utter

adj. 完全的

slip

v. 滑行

adverse

adj. 逆的,相反的

omen

n. 预兆

# 参考译文

没有任何两种鸟的飞行方式是相同的。鸟的飞行方式千差万别,但大体上可分为两类。任何一艘横度太平洋的轮船都会有一种小信天翁伴随飞行许多天。它们随船飞行一小时也难

得见其扇动一下翅膀。沿船体的上升的气流和沿航线向前的气流给这种巨翼大鸟以足够的浮力和推力。信天翁是滑翔飞行的鸟类之王,它能自如地驾驭空气,但必须顺气流飞行。与滑翔鸟相对的另一类鸟中,数野鸭本领最高。它更近乎于人类自夸的"征服"了空气的发动机。野鸭及它们相似的鸽子有天赋的钢铁般的肌肉,占了体重的很大一部分。这些肌肉以巨大的力量扇动短小的翅膀,使这类鸟能顶着大风飞行很远的路才会疲劳。次于野鸭和鸽子的鸟,如鹧鸪,有相似的巨大推动力,但很快会疲劳。如果海风驱使它们飞行很长距离,你可以捡到一些因筋疲力尽而摔下来的鹧鸪。燕子充分兼有这两类鸟的长处,它既不疲劳,也不炫耀自己的飞翔力;在空中十分自如,可以飞行 6,000 英里,可以飞往北方做窝的老家,再从老家飞回;一边飞一边喂养会飞的雏燕,甚至在顶风时也能在气流中滑翔,似乎气流在帮它前进。这些鸟对我们是有益的,虽然我们不再从它们的飞翔姿态来占卜吉凶,连最迷信的村民也不再对喜鹊脱帽行礼,祝它早安了。

Lesson 24 Beatuy 美

First listen and then answer the following question. 听录音,然后回答以下问题。

What do glimpses of beauty, either in nature or art, often suggest to the human mind?

A young man sees a sunset and, unable to understand or to express the emotion that it rouses in him, concludes that it must be the gateway to world that lies beyond. It is difficult for any of us in moments of intense aesthetic experience to resist the suggestion that we are catching a glimpse of a light that shines down to us from a different realm of existence, different and, because the experience is intensely moving, in some way higher. And, though the gleams blind and dazzle, yet do they convey a hint of beauty and serenity greater than we have known or imagined. Greater too than we can describe; for language, which was invented to convey the meanings of this world, cannot readily be fitted to the uses of another.

That all great has this power of suggesting a world beyond is undeniable. In some moods, Nature shares it. There is no sky in June so blue that it does not point forward to a bluer, no sunset so beautiful that it does not waken the vision of a greater beauty, a vision which passes before it is fully glimpsed, and in passing leaves and indefinable longing and regret. But, if this world is not merely a bad joke, life a vulgar flare amid the cool radiance of the stars, and existence an empty laugh braying across the mysteries; if these intimations of a something behind and beyond are not evil humour born of indigestion, or whimsies sent by the devil to mock and madden us. if, in a word, beauty means something, yet we must not seek to interpret the meaning. If we glimpse the unutterable, it is unwise to try to utter it, nor should we seek to invest with significance that which we cannot grasp. Beauty in terms of our human meanings is meaningless.

C.E.M.JOAD Pieces of Mind

New words and expressions 生词和短语

intense

- adj. 强烈的 aesthetic
- adj. 审美的 realm
- n. 世界 serenity
- n. 静谧 undeniable
- adj. 不可否认的 indefinable
- adj. 模糊不清的 vulgar
- adj. 平庸的 radiance
- n. 发光 intimation
- n. 暗示 unutterable
- adj. 不可言传的 invest
- v. 赋予

#### 参考译文

一个年轻人看到日落,由于无法理解和表达日落在他心中唤起的激情,便得出结论:日落处想必是通往遥远世界的大门。无论是谁,在强烈感受到美的时刻,心中都不禁油生一种遐想:我们似乎瞥见从另一个世界射向我们的一线光芒,那个世界不仅不同于我们这个世界,而且由于美感的强烈感染,在某些方面比我们这个世界更美好。虽然这光芒令人眼花缭乱,但它确实给予我们一种不曾经历和无法想象的美感和静谧的启示。这种美感和静谧是我们无法描述的,因为我们发明的语言是用来描述这个世界的含义,不能随便拿来去描述另一个世界。

不可否认,一切伟大的艺术都具有使人遐想到进入天外世界的魅力。在某种状态下,大自然也有这种魅力。六月蔚蓝的天空总使人遥想一个更加蔚蓝的苍穹;美丽的落日总会引起一个更加绚丽的景象未及饱览便一闪即逝,并在消逝中给人留下不可名状的渴望和惆怅。如果这个世界不只是一个拙劣的恶作剧,如果人生不只是群星寒光中平凡的一闪,如果存在不只是对神秘事物的一种空虚的笑声,如果某种玄妙事物的暗示不是消化不良引起的邪恶情绪,也不是魔鬼为了捉弄我们,使我们发狂而送给我们的邪念,一句话,如果美有某种意义的话,我闪千万不要去阐明它的意义。如果我瞥见了只可意会不可言传的事物,企图把它说出来,那上不明智的;对于我们不理解的事物,我们也不应该去赋予它某种意义。用对我们人类有意义的词解释美是没有意义的。

Non-auditory effects of noise 噪音的非听觉效应

First listen and then answer the following question.

听录音, 然后回答以下问题。

What conclusion does the author draw about noise and health in this piece?

May people in industry and the Services, who have practical experience of noise, regard any investigation of this question as a waste of time; they are not prepared even to admit the possibility that noise affects people. On the other hand, those who dislike noise will sometimes use most inadequate evidence to support their pleas for a quieter society. This is a pity, because noise abatement really is a good cause, and it is likely to be discredited if it gets to be associated with had science.

One allegation often made is that noise produces mental illness. A recent article in a weekly newspaper, for instance, was headed with a striking illustration of a lady in a state of considerable distress, with the caption 'She was yet another victim, reduced to a screaming wreck'. On turning eagerly to the text, one learns that the lady was a typist who found the sound of office typewriters worried her more and more until eventually she had to go into a mental hospital. Now the snag in this sort of anecdote is of course that one merely a symptom? Another patient might equally well complain that her neighbours were combining to slander her and persecute her, and yet one might be cautious about believing this statement.

What is needed in case of noise is a study of large numbers of people living under noisy conditions, to discover whether they are mentally ill more often than other people are. Some time ago the United States Navy, for instance, examined a very large number of men working on aircraft carriers: the study was known as Project Anehin. It can be unpleasant to live even several miles from an aerodrome; if you think what it must be like to share the deck of a ship with several squadrons of jet aircraft, you will realize that a modern navy is a good place to study noise. But neither psychiatric interviews nor objective tests were able to show any effects upon these American sailors. This result merely confirms earlier American and British studies: if there is any effect of noise upon mental health, it must be so small that present methods of psychiatric diagnosis cannot find it. That does not prove that it does exist: but it does mean that noise is less dangerous than, say, being brought up in an orphanage -- which really is mental health hazard.

D.E.BROADBENT Non-auditory effects of noise from Science Survey

New words and expressions 生词和短语

auditory

adj. 听觉的

inadequate

adj. 不适当的

plea

n. 要求

abatement

n. 减少

discredit

- v. 怀疑
  - allegation
- n. 断言
  - caption
- n. 插图说明
  - wreck
- n. 残废人
  - snag
- n. 疑难之处,障碍
  - anecdote
- n. 轶闻
  - slander
- v. 诽谤
  - persecute
- v. 迫害
  - squadron
- n. 中队
  - psychiatric
- adi. 精神病学的
  - diagnosis
- n. 诊所
  - orphanage
- n. 孤儿院

### 参考译文

在工业部门工作和在军队中服役的许多人对噪声音有切身的体会,他们认为对这个问题 进行调查中浪费时间,甚至不愿承认噪音可能对人有影响。另一方面,那些讨厌噪音的人有 时会用不充分的证据来支持他们希望有一个较为安静的社会环境的要求。要求减少噪音是件 好事,但是如果与拙劣的科学掺杂在一起的话,就不会被人们所信任,这是很遗憾的。

常见的一种指责是,噪音能引起精神病。例如,最近一家周报刊登了一篇文章,文章上方有一幅引人注目的插图,是一位表情沮丧的女子。图的文字说明:"她是又一个受害者,成了只会尖叫的可怜虫。"当人们急切地看完正文后,便知道这女子是个打字员,办公室打字机的声音使她越来越烦,最终住进了精神病医院。这类奇闻的疑难之处是无法区别因果关系。是噪音引起了(精神)病呢,还是(精神)病的症状之一是对噪音的抱怨?另有一位病人可能同样有理由抱怨说,她的邻居们正在联合起来对她进行诽谤和迫害,不过,人们不会轻信她的抱怨。

对于噪音问题,需要对大量生活在噪音中的人进行研究,看一看他们是否比其他人更易患精神病。例如,美国海军前些时候调查了许多在航空母航上工作的人,这次调查被称之为: "安内英工程"。即使住在离机场几英里以外的地方,机场的噪音也会使人难受。因此,如果你能想像出和几个中队的喷气机同在一个甲板上是什么滋味儿的话,你就会认识到现代海军是研究噪音的好地方。但是,不管进行精神病学的调查访问,还是进行客观的测试,都不能显示噪音对这些美国水兵有任何影响。这个结果只不过证实了美国和英国早些时候的研究

结论:如果噪音对精神健康有影响的话,那也一定是微乎其微,以致现代的精神病诊断方法还发现不了。这并不是证实不存在噪音对健康的影响。但它确实说明,噪音的危险性 -- 比如说 -- 比在孤儿院长大所受的危害要小一些,孤儿院才是真正危害精神健康的地方。

Lesson 26
The past life of the earth
地球上的昔日生命

First listen and then answer the following question. 听录音,然后回答以下问题。

What is the main condition for the preservation of the remains of any living creature?

It is animals and plants which lived in or near water whose remains are most likely to be preserved, for one of the necessary conditions of preservation is quick burial, and it is only in the seas and rivers, and sometimes lakes, where mud and sit have been continuously deposited, that bodies and the can be rapidly covered over and preserved.

But even in the most favourable circumstances only a small fraction of the creatures that die are preserved in this way before decay sets in or, even more likely, before scavengers eat them. After all, all living creatures live by feeding on something else, whether it be plant or animal, dead or alive, and it is only by chance that such a fate is avoided. The remains of plants and animals that lived on land are much more rarely preserved, for there is seldom anything to cover them over. When you think of the innumerable birds that one sees flying bout, not to mention the equally numerous small animals like field mice and voles which you do not see, it is very rarely that one comes across a dead body, except, of course, on the roads. They decompose and are quickly destroyed by the weather or eaten by some other creature.

It is almost always due to some very special circumstances that traces of land animals survive, as by falling into inaccessible caves, or into an ice crevasse, like the Siberian mammoths, when the whole animal is sometimes preserved, as in a refrigerator. This is what happened to the famous Beresovka mammoth which was found preserved and in good condition. In his mouth were the remains of fir trees -- the last meal that he had before he fell into the crevasse and broke his back. The mammoth has now just a suburb of Los Angeles. Apparently what happened was that water collected on these tar pits, and the bigger animals like the elephants ventured out on to the apparently firm surface to drink, and were promptly bogged in the tar. And then, when they were dead, the carnivores, like the sabre-toothed cats and the giant wolves, came out to feed and suffered exactly the same fate. There are also endless numbers of birds in the tar as well.

ERROL WHITE The past life of the earth from Discovery

New words and expressions 生词和短语 preservation

n. 保存

silt

- n. 淤泥
  - scavenger
- n. 食腐动物
  - vole
- n. 野鼠, 鼹鼠 decompose
- v. 腐烂

inaccessible

- adj. 不能到达的
  - crevasse
- n. 缝隙

Siberian

- adj.西伯利亚的
  - palaeontological
- adj. 古生物学的
  - St. Petersburg
- n. 圣彼得堡

sabre-toothed

- adj. 长着锐利的长牙
  - venture
- v. 冒险

bogged

adj. 陷入泥沼的,陷入要困境的

# 参考译文

只有生活在水中或水边的动植物尸体最有可能被保存下来,因为保存的必要条件之一是 迅速掩埋,所以只有在泥沙不停淤积的海洋和江河里,有时在湖泊里,尸体之类的东西才能 被迅速地覆盖而保存下来。

即使是在最有利的环境中,死去的生物中也只有一小部分能在开始腐烂前,或更可能在被食腐动物吃掉之前,被这样保存下来。因为一切生物都是靠吃别的东西来活命的,不管这种东西是植物还是动物,死的还是活的,因此,生物偶尔才能避免被吃掉的命运。曾在陆地上生活过的动植物的遗体被保存下来的更为罕见,因为陆地上几乎没有什么东西覆盖它们。你可以想象出天上有看得见的飞来飞去、数不清的鸟,地上有不显眼的无数的老鼠和田鼠之类的小动物,但是,除非在路上,很少有人遇到这些动物的尸体,因为它们腐败之后很快就被风化掉,或被别的动物吃掉了。

几乎总是由于某些特殊的条件,陆地动物的遗体才被存下来,如掉进难以到达的洞穴,或掉进冰河裂缝里,或者像西伯利亚长毛象那样掉进冰窟中,有时整个动物像被放在冰箱里一样被保存下来,著名的那林索夫卡长毛象就是这样被保存下来的,而且保存得很好。它嘴里还留着冷杉 -- 它掉进冰河裂隙折断脊椎柱之前的最后一顿饭。这头长毛象已被修复,现存于圣彼得堡古生物学博物馆。有的动物掉进天然沥清坑里被保存下来,如在兰桥.拉.布里-- 现在是洛杉矶的郊区发现的大象、剑齿虎和许多其他动物。显然,事情的经过是这样:沥青坑里积存了水,大象那样的大动物冒险到似乎坚固的水面上去饮水,立即掉进了沥青坑。大象死后,一些食肉动物,如剑齿虎和大灰狼就来吃大象,结果遭到了同样的命运。沥青坑

Lesson 27 The 'Vasa' "瓦萨"号

First listen and then answer the following question. 听录音,然后回答以下问题。

What happened to the 'Vasa' almost immediately after she was launched?

From the seventeenth-century empire of Sweden, the story of a galleon that sank at the start of her maiden voyage in 1628 must be one of the strangest tales of the sea. For nearly three and a half centuries she lay at the bottom of Stockholm harbour until her discovery in 1956. This was the Vasa, royal flagship of the great imperial fleet.

King Gustavus Adolphus, 'The Northern Hurricane', then at the height of his military success in the Thirty Years' War, had dictated her measurements and armament. Triple gun-decks mounted sixty-four bronze cannon. She was intended to play a leading role in the growing might of Sweden.

As she was prepared of her maiden voyage on August 10, 1628, Stockholm was in a ferment. From the Skeppsbron and surrounding islands the people watched this thing of beauty begin to spread her sails and catch the wind. They had laboured for three years to produce this floating work of art; she was more richly carved and ornamented than any previous ship. The high stern castle was a riot of carved gods, demons, knights, kings, warriors, mermaids, cherubs; and zoomorphic animal shapes ablaze with rea and gold and blue, symbols of courage, power, and cruelty, were portrayed to stir the imaginations of the superstitious sailors of the day.

Then the cannons of the anchored warships thundered a salute to which the Vasa fired in reply. As the emerged from her drifting cloud of gun smoke with the water churned to foam beneath her bow, her flags colour, she presented a more majestic spectacle than Stockholmers had ever seen before. All gun-ports were open and the muzzles peeped wickedly from them.

As the wind freshened there came a sudden squall and the ship made a strange movement, listing to port. The Ordnance Officer ordered all the port cannon to be heaved to starboard to counteract the list, but the steepening angle of the decks increased. Then the sound of rumbling thunder reached the watchers on the shore, as cargo, ballast, ammunition and 400 people went sliding and crashing down to the port side of the steeply listing ship. The lower gun-ports were now below water and the inrush sealed the ship's fate. In that first glorious hour, the mighty Vasa, which was intended to rule the Baltic, sank with all flags flying-in the harbour of her birth.

ROY SAUNGERS The Raising of the 'Vasa' from The Listener

New words and expressions 生词和短语 galleon

n. 大型帆船

Stockholm

- n. 斯德哥尔摩 flagship
- n. 旗舰

imperial

adj. 帝国的

hurricane

n. 飓风

armament

n. 军械

triple

adj. 三层的

mount

v. 架有

bronze

n. 青铜

cannon

n. 加农炮

# 参考译文

1628 年,一艘大帆船在处女航时就沉没了,这个从容不迫 7 世纪瑞典帝国流传至今的故事无疑是航海史上最离奇的事件之一。这艘大船在斯德哥尔摩港口的海底躺了将近几年来个世纪之后,直到 1956 年才被发现。这就是"瓦萨"号,帝国大舰的皇家旗舰。

当时号称"北方飓风"的国王古斯夫斯.阿道尔弗正处在"三十年战争"的军事鼎盛阶段,他亲自规定了这艘船的规模和武器配备。3层的火炮甲板上装着眼点4门青铜加农炮,目的就是要在不断增长的瑞典势力中起主导作用。

1628 年 8 月 10 日,"瓦萨"号准备首航时,斯德哥尔摩一片欢腾。人们从斯开波斯布朗和周围的岛屿前来观着这艘美丽的战船扬帆起航,乘风前进。瑞典人辛辛苦苦干了 3 年才建成这件水上艺术品,它比以往任何船只雕刻得都更加精美,装饰得都更加华丽。高耸的船楼上雕刻了令人眼花缭乱的神仙、妖魔、骑士、国王、武士、美人鱼和小天使,还有用红色、金黄色、蓝色绘制的光彩夺目的兽形图案,象征着勇敢、力量和残暴,以激起汉时崇尚迷信的水手们的想像。

这时,停泊在港口的其他战船向"瓦萨"号鸣炮致礼,"瓦萨"号也鸣炮回礼。当"瓦萨"号从弥漫的礼炮烟云中出现时,船头下浪花加溅,舰旗迎风招展,三角旗随风飘动,微风鼓起风帆,金碧辉煌的船楼闪耀着灿烂的色彩。"瓦萨"号展现的壮观景象是斯德哥尔摩人从未见过的。船上的炮眼开着,炮口虎视眈眈地向外窥视着。

当风力增强时,突然刮来一阵大风,"瓦萨"号奇怪地摇晃了一下,便向左舷倾斜。炮长命令把左舷上所有大炮搬到右舷上来以抵消船的倾斜,但甲板的倾斜度仍在增加。当物口、压舱物、弹药和 400 个人轰地一声滑向陡斜的左舷时,岸上的观众听到了雷鸣般的轰响。下层炮眼已淹没在水里,涌进船舱的水给"瓦萨"号带来了难以逃脱的厄运。就这样,想要统治波罗的海的大型战舰"瓦萨"号,在它壮丽的起航时刻,带着全身飘扬的彩旗,沉没在了它诞生的港口。

Lesson 28
Patients and doctors 病人与医生

First listen and then answer the following question. 听录音,然后回答以下问题。

What are patients looking for when they visit the doctor?

This is a sceptical age, but although our faith in many of the things in which our forefathers fervently believed has weakened, our confidence in the curative properties of the bottle of medicine remains the same a theirs. This modern faith in medicines is proved the fact that the annual drug bill of the Health Services is mounting to astronomical figures and shows no signs at present of ceasing to rise. The majority of the patients attending the medical out-patients departments of our hospitals feel that they have not received adequate treatment unless they are able to carry home with them some tangible remedy in the shape of a bottle of medicine, a box of pills, or a small jar of ointment, and the doctor in charge of the department is only too ready to provide them with these requirements. There is no quicker method of disposing of patients then by giving them what they are asking for, and since most medical men in the Health Services are overworked and have little time for offering time-consuming and little-appreciated advice on such subjects as diet, right living, and the need for abandoning bad habits etc., the bottle, the box, and the jar are almost always granted them.

Nor is it only the ignorant and ill-educated person who was such faith in the bottle of medicine. It is recounted of Thomas Carlyle that when him in his pocket what remained of a bottle of medicine formerly prescribed for an indisposition of Mrs. Carlyle's. Carlyle was entirely ignorant of what the bottle in his pocket contained, of the nature of the illness from which his friend was suffering, and of what had previously been wrong with his wife, but a medicine that had worked so well in one form of illness would surely be of equal benefit in another, and comforted by the thought of the help he was bringing to his friend, he hastened to Henry Taylor's house. History does not relate whether his friend accepted his medical help, but in all probability he did. The great advantage of taking medicine is that it makes no demands on the taker beyond that of putting up for a moment with a disgusting taste, and that is what all patients demand of their doctors -- to be cured at no inconvenience to themselves.

New words and expressions 生词和短语

sceptical

adj. 怀疑的

forefathers

n. 祖先

fervently

adv. 热情地

curative

- adj. 治病的 astronomical
- adj. 天文学的 tangible
- adj.实实在在的

remedy

- n. 药物 ointment
- n. 药膏 prescribe
- v. 开药方 indisposition
- n. 小病 inconvenience
- n. 令人讨厌的 inconvenience
- n. 不便

### 参考译文

这是一个怀疑一切的时代,可是虽然我们对我们祖先笃信的许多事物已不太相信,我们对瓶装药品疗效的信心仍与祖辈一样坚定。卫生部门的处度药费上升到了天文数字,并且目前尚无停止上升的迹象,这个事实证实了现代人对药物的依赖。在医院门诊部看病的大多数人觉得,如果不能带回一些看得见、摸得着的药物,如一瓶药水,一盒药丸、一小瓶药膏回家的话,就没算得到了充分的治疗。负责门诊的医生也非常乐意为前来看病的人提供他们想要得到的药物,病人要什么就给什么,没有比这样处理病人更快的方法了。因为卫生部门的大多数医生超负荷工作,所以没有多少时间提出一些既费时而又不受人欢迎的忠告,如注意饮食、生活有规律,需要克服坏习惯等等,结果就是把瓶药、盒药、罐药开给看病的人而完事大吉。

并不只是那些无知和没受过良好教育的人才迷信药瓶子。据说托马斯.卡莱尔有过这么一件事:他听说朋友亨利.泰勒病了,就立刻跑去看他,衣袋里装上了他妻子不舒服时吃剩下的一瓶药。卡莱尔不知道药瓶子里装的是什么药,不知道他的朋友得的是什么病,也不知道妻子以前得的是什么病,只知道一种药对一种病有好处,肯定对另一种病也会有好处。想到能对朋友有所帮助,他感到很欣慰,于是急急忙忙来到了亨利.泰勒的家里,他的朋友是否接受了他的药物治疗,历史没有记载,但很可能接受了。服药的最大优点是:除了暂时忍受一下令人作呕的味道外,对服药人别无其他要求。这也正是病人对医生的要求 -- 病要治好,但不要太麻烦。

Lesson 29 The hovercraft 气垫船

First listen and then answer the following question.

What is a hovercraft riding on when it is in motion?

Many strange new means of transport have been developed in our century, the strangest of them being perhaps the hovercraft. In 1953, a former electronics engineer in his fifties, Christopher Cockerell, who had turned to boat-building on the Norfolk Broads, suggested an idea on which he had been working for many years to the British Government and industrial circles. It was the idea of supporting a craft on a 'pad', or cushion, of low-pressure air, ringed with a curtain of higher pressure air. Ever since, people have had difficulty in deciding whether the craft should be ranged among ships, planes, or land vehicles -- for it is something in between a boat and an aircraft. As a shipbuilder, Cockerell was trying to find a solution to the problem of the wave resistance which wastes a good deal of a surface ship's power and limits its speed. His answer was to lift the vessel out of the water by a great number of ring-shaped air jets on the bottom of the craft. It 'flies', therefore, but it cannot fly higher -- its action depends on the surface, water or ground, over which it rides.

The first tests on the Solent in 1959 caused a sensation. The hovercraft travelled first over the water, then mounted the beach, climbed up the dunes, and sat down on a road. Later it crossed the Channel, riding smoothly over the waves, which presented no problem.

Since that time, various types of hovercraft have appeared and taken up regular service. The hovercraft is particularly useful in large areas with poor communications such as Africa or Australia; it can become a 'flying fruit-bowl', carrying bananas from the plantations to the ports; giant hovercraft liners could span the Atlantic; and the railway of the future may well be the 'hovertrain', riding on its air cushion over a single rail, which it never touches, at speeds up to 300 m.p.h. -- the possibilities appear unlimited.

EGON LARSEN The Pegasus Book of Inventors

New words and expressions 生词和短语

hovercraft

n. 气垫船

Norfolk Broads

n. 诺福克郡的湖泊地区

cushion

n. 座垫

ring

v. 围

Solent

n. (英国的)苏伦特海峡

sensation

n. 轰动

dune

n. 沙丘

plantation

n. 种植园

#### hovertrain

#### n. 气垫火车

### 参考译文

本世纪已研制出许多新奇的交通工具,其中最新奇的要数气垫船了。1953 年,有一位50 多岁名叫克里斯托弗.科克雷的原电子工程师,改行在诺福克郡的湖泊地区从事造船业,他向英国政府和工业界提出了他研究多年的一项计划。他的设想是:用一个低压空气或软垫来支撑船体,软垫周围用高压空气环绕。自那以后,人们很难决定是否应该将这种运载工具列为轮船、飞机,或是陆上交通工具,因为它是介于船和飞机之间。作为一个船舶技师,科克雷尔在寻找解决波浪阻力的方法,因为波浪阻力浪费掉了船在水面行驶的大量动力,从而限制了船的速度。他的解决办法是把船体提离水面,让船在一个气垫上行驶,气垫只有一两英尺厚。船底装上大量环状喷气嘴以实现这一目的。这样,船就能飞了,但飞不高。它的飞行限决于它所悬浮的水面或地面。

1959 年,在苏伦特海峡进行的首次试航引起了轰动,气垫船先是在水面上行驶,后又登上海岸,爬上沙丘,最后停在路上。后来气垫船跨越英吉利海峡,平衡地在波浪上方行驶,波浪不再产生阻力。

从那以后,各种各样的气垫船出现了,并开始了定期航行服务。气垫船在非洲、澳大利亚等交通不发达地区特别有用。它能成为"飞行水果盘子",把香蕉从种植园动到港口。大型的气垫班轮或许能跨越大西洋。未来的火车或许能成为"气垫火车",靠气垫在单轨上行驶而不接触轨道,时速可达每小时300英里。气垫船的前途是不可限量的。

Lesson 30 Exploring the sea-floor 海底勘探

First listen and then answer the following question. 听录音, 然后回答以下问题。

How did people probably imagine the sea-floor before it was investigated?

Our knowledge of the oceans a hundred years ago was confined to the two-dimensional shape of the sea surface and the hazards of navigation presented by the irregularities in depth of the shallow water close to the land. The open sea was deep and mysterious, and anyone who gave more than a passing thought to the bottom confines of the oceans probably assumed that the sea bad was flat. Sir James Clark Ross had obtained a sounding of over 2,400 fathoms in 1839, but it was not until of deep soundings was obtained in the Atlantic and the first samples were collected by dredging the bottom. Shortly after this the famous H. M. S. Challenger expedition established the study of the sea-floor as a subject worthy of the most qualified physicists and geologists. A burst of activity associated with the laying of submarine cables soon confirmed the challenger's observation that many parts of the ocean were two to there miles deep, and the existence of underwater features of considerable magnitude.

Today, enough soundings are available to enable a relief map of the Atlantic to be drawn and we know something of the great variety of the sea bed's topography. Since the sea covers the greater part of the earth's surface, it is quite reasonable to regard the sea floor as the basic form of the crust of the earth, with, superimposed upon, it the continents, together with the islands and other features of the oceans. The continents form rugged tablelands which stand nearly three miles above the floor of the open ocean. From the shore line, out a distance which may be anywhere from a few miles to a few hundred miles, runs the gentle slope of the continental shelf, geologically part of the continents. The real dividing line between continents and oceans occurs at the foot a steeper slope.

This continental slope usually starts at a place somewhere near the 100-fatheom mark and in the course of a few hundred miles reaches the true ocean floor at 2,500-3,500 fathoms. The slope averages about 1 in 30. but contains steep, probably vertical, cliffs, and gentle sediment-covered terraces, and near its lower reaches there is a long tailing-off which is almost certainly the result of material transported out to deep water after being eroded from the continental masses.

T.F.GASKELL Exploring the Sea-floor from Science Survey

New words and expressions 生词和短语

navigation

n. 航海

sounding

n. 水深度

fathom

n. 寻(1 寻等于 1.8 米)

porcupine

n. 箭猪

dredge

v. 挖掘

expedition

n. 远征

physicist

n. 物理学家

magnitude

n. 很多

topography

n. 地形

crust

n. 地壳

rugged

adj.崎岖不平

tableland

n. 高地

sediment

n. 沉淀物

terrace

- n. 阶地 erode
- v. 侵蚀

# 参考译文

100年前,我们只知道海洋是二维平面形的,以及靠近陆地浅水区的深浅不一能给航行带来危险。无边无际的海洋深邃而又神秘,凡是稍稍想过大海海底的人大概都会认为海底是平坦的。1839年,詹姆斯.克拉克.罗斯爵士曾测得海水深度超过 2,400 英寻;但直到 1869年,皇家学会用英国"豪猪"号舰艇进行了几次巡航后,才在大西洋测得一个海水深度,同时能过挖掘海底,取得了研究海底的首批样品。此后不久,英国著名的"挑战者"号舰艇对海底的那次考察,把对海床的研究确立为一个值得一流物理学家和地质学家从事的研究课题,铺设海底电缆的热潮很快证实了"挑战者"号的观察结果:海洋中很多地方可深达两三英里,水下特征差异极大。

现在已有足够的水深测量数据来绘制一张大西洋洋底地形图,而且我对海底地形的千变万化也有了一定的了解。既然海洋覆盖着地球的大部分表面,因此完全有理由把海床看作地壳的基本模壳,上面附加着大陆以及岛屿和海洋的其他形态。大陆是崎岖不平的高地,高出辽阔的海洋海底近三英里。从海岸线向大海延伸几英里到几百英里的区域是大陆架慢坡,从地质学上来说,它是大陆的一部分。大陆和海洋的真正分界线是在陡破脚下。

大陆架慢坡一般是从差不多 100 英寻水深的地方开始的,一直延伸到几百英里远深达 2,500 至 3,500 的地方,那里才是真正的海底。坡度平均约为 1/30,但其中包括陡峭的、乃至垂直的峭壁和沉积物覆盖的缓和的阶梯地带,在这个地带的低处是很长的一段尾沙地段,基本上可以断定这个地段是大陆块体上侵蚀下来的物质被水冲到深水处形成的。

Lesson 31 The sculptor speaks 雕塑家的语言

First listen and then answer the following question. 听录音,然后回答以下问题。

What do you have to be able to do to appreciate sculpture?

Appreciation of sculpture depends upon the ability to respond to form in there dimension. That is perhaps why sculpture has been described as the most difficult of all arts; certainly it is more difficult than the arts which involve appreciation of flat forms, shape in only two dimensions. Many more people are 'form-blind' than colour-blind. The child learning to see, first distinguishes only two-dimensional shape; it cannot judge distances, depths. Later, for its personal safety and practical needs, it has to develop (partly by means of touch) the ability to judge roughly three-dimensonal distances. But having satisfied the requirements of practical necessity, most people go no further. Though they may attain considerable accuracy in the perception of flat from,

they do no make the further. Though they may attain considerable accuracy in the perception of flat form, they do not make the further intellectual and emotional effort needed to comprehend form in its full spatial existence.

This is what the sculptor must do. He must strive continually to think of, and use, form in its full spatial completeness. He gets the solid shape, as it were, inside his head-he thinks of it, whatever its size, as if he were holding it completely enclosed in the hollow of his hand. He mentally visualizes a complex form from all round itself; he knows while he looks at one side what the other side is like, he identifies himself with its centre of gravity, its mass, its weight; he realizes its volume, as the space that the shape displaces in the air.

And the sensitive observer of sculpture must also learn to feel shape simply as shape, not as description or reminiscence. He must, for example, perceive an egg as a simple single solid shape, quite apart from its significance as food, or from the literary idea that it will become a bird. And so with solids such as a shell, a nut, a plum, a pear, a tadpole, a mushroom, a mountain peak, a kidney, a carrot, a tree-trunk, a bird, a bud, a lark, a ladybird, a bulrush, a bone. From these he can go on to appreciate more complex forms of combinations of several forms.

# HENRY MOORE The Sculptor Speaks from The Listener

New words and expressions 生词和短语

colour-blind

adj. 色盲的

perception

n. 知觉

comprehend

v. 理解

spatial

adj. 空间

visualize

v. 使具形象,设想

reminiscence

n. 回忆, 联想

tadpole

n. 蝌蚪

mushroom

n. 蘑菇

carrot

n. 胡萝卜

bud

n. 花蕾

lark

n. 云雀

ladybird

n. 瓢虫

bulrush

n. 芦苇

#### 参考译文

对雕塑的鉴赏力取决于对立体的反应能力。雕塑被说成是所有艺术中最难的艺术,可能就是这个道理。欣赏雕塑品当然比欣赏平面的艺术品要难。"形盲"的人数比"色盲"的人数要多得多。正在学看东西的儿童起初只会分辨二维形态,不会判断距离和深度。慢慢地,由于自身安全和实际需要,儿童必须发展(部分通过触觉)粗略判断三维空间距离的能力。但是。大部分人在满足了实际需要后,就不再继续发展这种能力了。虽然他们对平面形的感觉能达到相当准确的程度,但他们没有在智力和感情上进一步努力去理解存在于空间的整个形态。

而雕塑家就必须做到这一点。他必须勤于想像并且利用形体在空间中的完整性。可以说,当他想像一个物体时,不管其大小如何,他脑子里得到的是一个立体的概念,就好像完全握在自己手心里一样。他的大脑能从物体周围的各个角度勾画出其复杂的形象,他看物体的一边时,便知道另一边是个什么样子。他把自身和物体重心、质量、重量融为一体。他能意识到物体的体积,那就是它的形状有空气中所占的空间。

因此,敏锐的雕塑观赏者也必须学会把形体作为形体来感觉,不要靠描述和印象去想象。 以鸟蛋为例。观赏者必须感觉到它是一个单一的实体形态,而完全不靠它的食用意义或它会 变成鸟这样的文字概念来感觉。对于其他实体,如,贝壳、核桃、李子、梨子、蝌蚪、蘑菇、 山峰、肾脏、胡萝卜、树干、鸟儿、花蕾、云雀、瓢虫、芦苇以及骨头也应这样来感觉。从 这些形体出发,观赏者可进一步观察更为复杂的形体或若干形体的组合。

> Lesson 32 Galileo reborn 伽利略的复生

First listen and then answer the following question. 听录音,然后回答以下问题。

What has modified out traditional view of Galileo in recent times?

In his own lifetime Galileo was the centre of violent controversy; but the scientific dust has long since settled, and today we can see even his famous clash with the Inquisition in something like its proper perspective. But, in contrast, it is only in modern times that Galileo has become a problem child for historians of science.

The old view of Galileo was delightfully uncomplicated. He was, above all, a man who experimented: who despised the prejudices and book learning of the Aristotelians, who put his questions to nature instead of to the ancients, and who drew his conclusions fearlessly. He had been the first to turn a telescope to the sky, and he had seen there evidence enough to overthrow Aristotle and Ptolemy together. He was the man who climbed the Leaning Tower of Pisa and dropped various weights from the top, who rolled balls down inclined planes, and then generalized the results of his many experiments into the famous law of free fall.

But a closer study of the evidence, supported by a deeper sense of the period, and particularly by a new consciousness of the philosophical undercurrents in the scientific revolution, has profoundly modified this view of Galileo. Today, although the old Galileo lives on in many popular writings, among historians of science a new and more sophisticated picture has emerged. At the same time our sympathy fro Galileo's opponents ahs grown somewhat. His telescopic observations are justly immortal; they aroused great interest at the time, they had important theoretical consequences, and they provided a striking demonstration of the potentialities hidden in instruments and apparatus. But can we blame those who looked and failed to see what Galileo saw, if we remember that to use a telescope at the limit of its powers calls for long experience and intimate familiarity with one's instrument? Was the philosopher who refused to look through Galileo's telescope more culpable than those who alleged that the spiral nebulae observed with Lord Rosse's great telescope in the eighteen-forties were scratches left by the grinder? We can perhaps forgive those who said the moons of Jupiter were produced by Galileo's spyglass if we recall that in his day, as for centuries before, curved glass was the popular contrivance for producing not truth but illusion, untruth; and if a single curved glass would distort nature, how much more would a pair of them?

#### MICHAEL HOSKIN Galileo Reborn from The Listener

New words and expressions 生词和短语

controversy

n. 争议,争论

dust

n. 纠纷,骚动

clash

n. 冲突

Inquisition

n. (罗马天主教的)宗教法庭

perspective

n. 观点,看法

despise

v. 蔑视

generalize

v. 归纳

undercurrent

n. 潜流

theoretical

adj. 理论上的

potentiality

n. 潜能

intimate

adj. 详尽的

familiarity

n. 熟悉的

culpable

adi. 应受遣责的

Aristotelian

n. 亚里士多德学派的人

Aristotle

n. 亚里士多德(公元前 384-322, 古希腊哲学家)

Ptolemy

n. 托勒密(公元90-168, 古希腊天文学家)

Leaning Tower of Pisa

比萨斜塔

spiral

adi. 螺旋状的

nebula

n. 星云

scratch

n. 擦痕

contrivance

n. 器械

distort

v. 歪曲

#### 参考译文

伽利略在世时是激烈论战的中心。但是,自他逝世以来,那场科学上的纷争早已平息了下来,甚至他和宗教法庭的著名冲突,我们今天也能正确如实地看待。但是相比之下,对于科学史家来说,伽利略只是在现代才变成了一个新的难题。

令人高兴的是,过去对伽利略的看法并不复杂。他首先是个实验工作者,他蔑视亚里士多德学派的偏见和空洞的书本知识。他向自然界而不是向古人提出问题,并大胆地得出结论。他是第一个把望远镜对准天空的人,观察到的论据足以把亚里士多德和托勒密一起推翻。他就是那个曾经爬上比萨斜塔,从塔顶向下抛掷积各种重物的人;他是那个使地球体沿斜面向下滚动,然后将多次实验结果概括成著名的自由落体定律的人。

但是,对那个时代的深化了解,尤其是以科学家革命中哲学潜流的新意识为依据,进一步仔细研究,就会极大地改变对伽利略的看法。今天,虽然已故的伽利略继续活在许多通俗读物中,但在科学史家中间,一个新的更加复杂的伽利略形象出现了。与此同时,我们对伽利略的反对派的同情也有所增加。伽利略用望远镜所作的观察确实是不朽的,这些观察当时引起人们极大的兴趣,具有重要的理论意义,并充分显示出了仪表和仪器的潜在力量。但是,如果我们想到,便用一架倍数有限的望远镜需要长期的经验和对自己仪器的熟悉程度,那么我们怎么能去责备观察了天空但没有看到伽利略所看到的东西的那些人呢?某位哲学家曾拒绝使用伽利略的望远镜去观察天空;到了19世纪40年代,有人硬把罗斯勋爵高倍望远镜观测到的螺旋状星云说成是磨镜工留下的磨痕。难道反对伽利略的哲学家比诋毁罗斯勋爵造谣者应受到更大的谴责吗?如果我们回想一下伽利略之前几个世纪期间,曲面镜一直是一种用于产生幻影而不是产生真象的把戏装置,那么我们就会原谅那些当时把伽利略观察到的木星卫生说成是伽利略用他的小望远镜变出来的人们,何况一片曲面镜就可歪曲自然,那么伽利略的两片曲面镜对自然的歪曲又该多大呢?

Lesson 33 Education 教育

First listen and then answer the following question. 听录音,然后回答以下问题。

Why is education democratic in bookless, tribal societies?

Education is one of the key words of our time. A man without an education, many of us believe, is an unfortunate victim of adverse circumstances, deprived of one of the greatest twentieth-century opportunities. Convinced of the importance of education, modern states 'invest' in institutions of learning to get back 'interest' in the form of a large group of enlightened young men and women who are potential leaders. Education, with its cycles of instruction so carefully worked out, punctuated by textbooks -- those purchasable wells of wisdom-what would civilization be like without its benefits?

So much is certain: that we would have doctors and preachers, lawyers and defendants, marriages and births -- but our spiritual outlook would be different. We would lay less stress on 'facts and figures' and more on a good memory, on applied psychology, and on the capacity of a man to get along with his fellow-citizens. If our educational system were fashioned after its bookless past we would have the most democratic form of 'college' imaginable. Among tribal people all knowledge inherited by tradition is shared by all; it is taught to every member of the tribe so that in this respect everybody is equally equipped for life.

It is the ideal condition of the 'equal start' which only our most progressive forms of modern education try to regain. In primitive cultures the obligation to seek and to receive the traditional instruction is binding to all. There are no 'illiterates' -- if the term can be applied to peoples without a script -- while our own compulsory school attendance became law in Germany in 1642, in France in 1806, and in England in 1876, and is still non-existent in a number of 'civilized' nations. This shows how long it was before we deemed it necessary to make sure that all our children could share in the knowledge accumulated by the 'happy few' during the past centuries.

Education in the wilderness is not a matter of monetary means. All are entitled to an equal start. There is none of the hurry which, in our society, often hampers the full development of a growing personality. There, a child grows up under the ever-present attention of his parent; therefore the jungles and the savannahs know of no 'juvenile delinquency'. No necessity of making a living away from home results in neglect of children, and no father is confronted with his inability to 'buy' an education for his child.

JULIUS E. LIPS The Origin of Things

```
New words and expressions 生词和短语 adverse adj. purchasable adj.可买到的 preacher
```

- n. 传教士 defendant
- n. 被告

outlook

- n. 视野 capacity
- n. 能力 democratic
- adj. 民主的 tribal
- n. 部落的 tribe
- n. 部落 illiterate
- n. 文盲 compulsory
- adj. 义务的 deem
- v. 认为 means
- n. 方法,手段,财产,资力 hamper
- v. 妨碍

savannah

- n. 大草原 juvenile
- adj. 青少年 delinquency
- n. 犯罪

#### 参考译文

教育是我们这个时代的关键词之一。我们许多人都相信,一个没有受过教育的人,是逆境的牺牲品,被剥夺了 20 世纪的最优越的机会之一。现代国家深深懂得教育的重要性,对教育机构投资,收回的'利息'便是培养出大批有知识的男女青年,这些人可能成为未来的栋梁。教育,以其教学周期如此精心地安排,并以教科书 -- 那些可以买到的智慧源泉 -- 予以强化,如果不受其惠,文明将会是个什么样子呢?

至少,这些是可以肯定的:虽然我们还会有医生和牧师、律师和被告、婚姻和生育,但人们的精神面貌将是另一个样子。人们不会重视'资料和数据',而靠好记性、实用心理学与同伴相处的能力。如果我们的教育制度仿效没有书籍的古代教育,我们的学院将具有可以想象得出的最民主的形式了。在部落中,通过传统继承的知识为所有人共享,并传授给部落中的每一个成员。从这个意义上讲,人人受到的有关生活本领的教育是相等的。

这就是我们最进步的现代教育试图恢复的"平等起步"的理想状况。在原始文化中,寻求和接受传统教育的义务对全民都有约束力。因而没有"文盲"(如果这个字眼儿可以用于没有文字的民族的话)。而我们的义务教育成为法律在德国是在 1642 年,在法国是在 1806

年,在英国是在1876年。今天,在许多"文明"国家里,义务教育迄今尚未实行。这说明,经过了多么漫长的时间之后,我们才认识到,有必要确保我们的孩子享有多少个世纪以来由'少数幸运者'所积累起来的知识。

荒凉地区的教育不是钱的问题,所有的人都享有平等起步的权利。那里没有我们今天社会中的匆忙生活,而匆忙的生活常常妨碍个性的全面发展。荒凉地区的孩子无时无刻不在父母关怀下成长。因此,丛林和荒凉地区不知道什么叫"青少年犯罪"。人们没有必要离家谋生,所以不会产生孩子无人管的问题,也不存在父亲无力为孩子支付教育费用而犯难的问题。

Lesson 34 Adolescence 青春期

First listen and then answer the following question. 听录音,然后回答以下问题。

What do adolescents respect in parents?

Parents are often upset when their children praise the homes of their friends and regard it as a slur on their own cooking, or cleaning, or furniture, and often are foolish enough to let the adolescents see that they are annoyed. They may even accuse them of disloyalty, or make some spiteful remark about the friends' parents. Such loss of dignity and descent into childish behaviour on the part to their parents about the place or people they visit. Before very long the parents will be complaining that the child is so secretive and never tells them anything, but they seldom realize that they have brought this on themselves.

Disillusionment with the parents, however good and adequate they may be both as parents and as individuals, is to some degree inevitable. Most children have such a high ideal of their parents, unless the parents themselves have been unsatisfactory, that it can hardly hope to stand up to a realistic evaluation. Parents would be greatly surprised and deeply touched if they hope to stand up to a realistic evaluation. Parents would be greatly surprised and deeply touched if they realized how much belief their children usually have in their character and infallibility, and how much this faith means to a child. If parents were prepared for this adolescent reaction, and realized that it was a sign that the child was growing up and developing valuable powers of observation and independent judgment, they would not be so hurt, and therefore would not drive the child into opposition by resenting and resisting it.

The adolescent, with his passion for sincerity, always respects a parent who admits that he is wrong, or ignorant, or even that he has been unfair or unjust. What the child cannot forgive is the parent's refusal to admit these charges if the child knows them to be true.

Victorian parents believed that they kept their dignity by retreating behind an unreasoning authoritarian attitude; in fact they did nothing of the kind, but children were then too cowed to let them know how they really felt. Today we tend to go to the other extreme, but on the whole this is a healthier attitude both for the child and the parent. It is always wiser and safer to face up to reality, however painful it may be at the moment.

# DOTID OFLUM Journey Through Adolescence

New words and expressions 生词和短语 adolescence

n.

slur

n. 青春期

adolescent

n. 底毁

disloyalty

n. 青少年(12-18岁)

spiteful

adj. 恶意的, 怀恨的

disillusionment

n. 幻灭感

evaluation

n. 评价

infallibility

n. 一贯正确

resent

v. 怨恨

sincerity

n. 诚挚

victorian

adj. 维多利亚式的

retreat

v. 后退

unreasoning

adj. 不凭理智的

authoritarian

adj. 专制的

cow

v. 吓唬

#### 参考译文

当家长听到孩子赞扬自己朋友的家时,总感到不安,认为孩子在嫌弃自家的饭菜、卫生、或家具,而且愚蠢地让孩子看出自己的烦恼。他们甚至责备孩子不忠,或者讲些小朋友家长的坏话。家长这种有失身份和孩子气的作法使青春期的孩子大为震惊,决心以后不再向父母讲述去过的地方和见过的人。不要很久,家长就会抱怨孩子守口如瓶,什么事也不告诉他们,殊不知这是他们自找的。

不管家长的人品有多么好,作为父母有多么合格,孩子们对家长幻想的破灭在某种程度 上是不可避免的。除非父母自身不能令人满意,大多数孩子对父母估价过高,以致这种估价 很难指望经受住现实的考验。如果家长意识到孩子们通常是多么相信家长的品行和绝对正 确,意识到孩子们的这种信念会对孩子产生多么大的影响,那么家长会大为吃惊和深受感动 的。如果家长对青少年的这种反应有思想准备,并且意识到这象征着孩子们正在成熟和正在 发展宝贵的观察力、独立判断力,那么他们就不会那样伤心,也就不会由于怨恨和抵触这种 反应,而把孩子推到自己的对立面去。

青少年酷爱真诚,对于能够承认错误或无知、甚至承认自己做得不分平或不公正的父母,他们总是尊敬的,孩子们所不能原谅的是:父母错了,孩子们也看出来了,可是做父母的还不肯承认。

维多利亚时代的父母认为,他们可靠无理的权威气派来维护自己的尊严,实际上那是根本不行的。孩子们只不过被吓得不敢让父母知道自己的想法罢了。虽然现在我们倾向于走向另一个极端,但总地来看,孩子和家长双方态度都比较端正。遇事采取面对现实的态度总是比较明智和稳妥的,尽管会有暂时的痛苦。

Lesson 35 Space odyssey 太空探索

First listen and then answer the following question.

听录音, 然后回答以下问题。

When will it be possible for us to think seriously about colonising Mars?

The Moon is likely to become the industrial hub of the Solar System, supplying the rocket fuels fro its ships, easily obtainable from the lunar rocks in the from of liquid oxygen. The reason lies in its gravity. Because the Moon has only an eightieth of the Earth's mass, it requires 97 per cent less energy to travel the quarter of a million miles from the Moon to Earth-orbit than the 200 mile-journey from Earth's surface into orbit!

This may sound fantastic, but it is easily calculated. To escape from the Earth in a rocket, one must travel at seven miles per second. The comparable speed from the Moon is only 1.5 miles per second. Because the gravity on the Moon's surface is only a sixth of Earth's (remember how easily the Apollo astronauts bounded along), it takes much less energy to accelerate to that 1.5 miles per second than it does on Earth. Moon-dwellers will be able to fly in space at only three per cent of the cost of similar journeys by their terrestrial dwellers will be able to fly in space at only three per cent of the cost of similar journeys by their terrestrial cousins.

Arthur C. Clark once suggested a revolutionary idea passes through three phases:

- 1 'It's impossible -- don't waste my time.'
- 2 'It's possible, but not worth doing.'
- 3 'I said it was a good idea all along.'

The idea of colonising Mars -- a world 160 times more distant time the Moon -- will move decisively from the second phase to the third, when a significant number of people are living permanently in space. Mars has an extraordinary fascination for would-be voyagers. America, Russia and Europe are filled with enthusiasts -- many of them serious and senior scientists -- who dream of sending people to it. Their aim is understandable. It is the one world in the Solar System that is most like the Earth. It is a world of red sandy deserts (hence its name -- the Red Planet),

cloudless skies, savage sandstorms, chasms wider than the Grand Canyon and at least one mountain more than twice as tall as Everest. It seems ideal for settlement.

# 7 DAYS, February 19, 1989

New words and expressions 生词和短语

hub

n. (活动的)中心

lunar

adj. 月球的

oxygen

n. 氧气

Apollo

n. 阿波罗

accelerate

v. 加速

terrestrial

adj. 地球的

permanently

adv. 永远地

fascination

n. 魅力

senior

adj. 资历深的,年长的

chasm

n. 断层,裂口

canyon

n. 峡谷

# 参考译文

月球很可能成为太阳系的工业中心。从月球上的岩石中很容易提炼出液态氧,作为航天飞船的燃料。其原因在于月球的重力。因为月球的重只有地球的 1/8,因此,从月球到地球的 25 万英里所消耗的能量要比从地球表面进入地球轨道的 200 英里所耗能量少 97%。

这点听起来令人难以置信,但却很容易计算出来。要乘坐一枚火箭飞离地球,火箭的速度要达到每秒7英里,而从月球出发的相应速度史是每秒1.5英里。由于月球表面的重力仅是地球表面的1/6--还记得阿波罗飞船中的宇航员累松地跳跃--在月球上加速到每秒1.5英里比在地球上所用能源要少得多。月球居民在太空遨游的费用仅是地球上朋友飞越同样路所需费用的3%。

亚瑟.C.克拉克曾提议,一种创新的想法要经过以下3个阶段:

- 1 "根本不可能,不要浪费我的时间。"
- 2 "可能,但不值得做。"
- 3 "我一直说这是个好想法。"

如果有相当数量的人永久性地住在太空,征服火星的计划 -- 一个比月球远 160 倍的星球 -- 就可以明确地从第 2 阶段进入第 3 阶段。火星对未来的星际旅客说有着特殊的魅力。

美国、俄罗斯和欧洲都有许多热心此项事业的人 -- 其中的不少是认真和资深的科学家,他们一直梦想着把人送上火星。他们的目标是可以理解的。火星是太阳系里与地球最接近的一颗行星。这是一个红色沙漠的世界(因而得名:红色行星),无云的天空,凶猛的沙暴,比大峡谷还宽的裂缝,起码有一座山有珠穆朗玛峰的近两倍高。看起来,它很合适居住。

Lesson 36
The cost of government 政府的开支

First listen and then answer the following question. 听录音, 然后回答以下问题。

What is the most important factor, both in government or business, for keeping running costs low?

If a nation is essentially disunited, it is left to the government to hold it together. This increases the expense of government, and reduces correspondingly the amount of economic resources that could be used for developing the country. And it should not be forgotten how small those resources are in a poor and backward country. Where the cost of government is high, resources for development are correspondingly low.

This may be illustrated by comparing the position of a nation with that of a private business enterprise. An enterprise has to incur certain costs and expenses in order to stay in business. For our purposes, we are concerned only with one kind of cost -- the cost of managing and administering the business. Such administrative overheads in a business are analogous to the cost of government in a nation. The administrative overheads of a business are low to the extent that everyone working in the business can be trusted to behave in a way that best promotes the interests of the firm. If they can each be trusted to take such responsibilities, and to exercise such initiative as falls within their sphere, then administrative overheads will be low. It will be low because it will be necessary to have only one man looking after each job, then the business will require armies of administrators, checkers, and foremen and administrative overheads will rise correspondingly. As administrative overheads rise, so the earnings of the business after meeting he expense of administration, will fall; and the business will have less money to distribute as dividends or invest directly in its future progress and development.

It is precisely the same with a nation. To the extent that the people can be relied upon to behave in a loyal and responsible manner, the government does not require armies of police and civil servants to keep them in order. But if a nation is disunited, the government cannot be sure that the actions of the people will be in the interests of the nation; and it will have to watch, check, and control the people accordingly. A disunited nation therefore has to incur unduly high costs of government.

RAYMOND FROST The Backward Society

New words and expressions 生词和短语 disunited

adj. 分裂的

correspondingly

adv. 相应地

backward

adj. 落后的

incur

v. 承担

administer

v. 管理

adminstrative

adj. 行政管理的

analogous

adj. 类似的

overheads

n. 一般费用

initiative

n. 主动,积极性

checker

n. 检查人员

foreman

n. 监工

dividend

n. 红利

unduly

adv. 过度地

### 参考译文

如果一个国家实际上处于分裂状态,使之联合起来就是政府的事了。这样的一来就增加了政府的开支,从而相应地减少了可以用来了展国家的那部分经济资源。不应忘记,在一个贫穷落后的国家里,那部分财力是很有限的。凡是政府管理费用高的地方,用于发展国家经济的资金就会相应地减少。

把国家的状况同私人企业的状况加以比较,就可以看清这个问题。一个企业为了继续经营,不得不支出一定的费用和开销。就我们的目的而言,我们只关心一种费用 -- 企业行政管理费。一家企业的行政管理开支类似于一个国家的政府管理所用的开支。如果企业中的每个人都在真诚地为提高企业利润而工作,那么企业的管理费用就会降低到相应的程度。如果企业的每个人都信得过,人人都认真负责,在各自的工作范围内发挥主动性,行政管理费用就会降低。行政管理费用的降低的原因是:每项工作只需要一个人去完成,用不着另外再有一个人检查工作。督促他遵守章程,或向有关人士汇报他的工作。但是,如果企业中谁也不可信赖会对工作尽忠守职,那公企业就会需大批的管理人员、检查人员和带班人员,管理费用就会相应在增加。管理费用增加了,那么在扣除管理费用后,企业的收入就降低了。因此用于分红的金额就用于将来开拓和发展的投资就相应地减少了。

一个国家的情况也完全相同。如果人民忠于职守,举止规矩,能受到政府的信赖,那么 政府就不需要大批的警察和文职人员运去促使人民遵纪守法。但是,如果一个国家处于分裂 状态,政府不能相信人民的行动有利于国家,那么政府就不得不对人民进行监督、检查和控制。因此,一个处于分裂的国家必须要支付过高的行政管理费用。

Lesson 37 The process of ageing 衰老过程

First listen and then answer the following question. 听录音,然后回答以下问题。

What is one of the most unpleasant discoveries we make about ourselves as we get older?

At the age of twelve years, the human body is at its most vigorous. It has yet to reach its full size and strength, and its owner his or her full intelligence; but at this age the likelihood of death is least. Earlier, we were infants and young children, and consequently more vulnerable; later, we shall undergo a progressive loss of our vigour and resistance which, though imperceptible at first, will finally become so steep that we can live no longer, however well we look after ourselves, and however well society, and our doctors, look after us. This decline in vigour with the passing of time is called ageing. It is one of the most unpleasant discoveries which we all make that we must decline in this way, that if we escape wars, accidents and disease we shall eventually 'die of old age', and that this happens at a rate which differs little from person to person, so that there are heavy odds in favour of our dying between the ages of sixty-five and eighty. Some of us will die sooner, a few will live longer -- on into a ninth or tenth decade. But the chances are against it, and there is a virtual limit on how long we can hope to remain alive, however lucky and robust we are.

Normal people tend to forget this process unless and until they are reminded of it. We are so familiar with the fact that man ages, that people have for years assumed that the process of losing vigour with time, of becoming more likely to die the older we get, was something self-evident, like the cooling of a hot kettle or the wearing-out of a pair of shoes. They have also assumed that all animals, and probably other organisms such as trees, or even the universe itself, must in the nature of things 'wear out'. Most animals we commonly observe do in fact age as we do, if given the chance to live long enough; and mechanical systems like a wound watch, or the sun, do in fact run out of energy in accordance with the second law of thermodynamics (whether the whole universe does so is a moot point at present). But these are not analogous to what happens when man ages. A run-down watch is still a watch and can be rewound. An old watch, by contrast, becomes so worn and unreliable that it eventually is not worth mending. But a watch could never repair itself -- it does not consist of living parts, only of metal, which wears away by friction. We could, at one time, repair ourselves --well enough, at least, to overcome all but the most instantly fatal illnesses and accidents. Between twelve and eighty years we gradually lose this power; an illness which at twelve would knock us over, at eighty can knock us out, and another 700 for the survivors to be reduced by half again.

ALEX COMFORT The process of ageing

New words and expressions 生词和短语

likelihood

- n. 可能性
  - infant
- n. 婴儿

vulnerable

- adj. 脆弱
  - imperceptible
- adj. 感觉不到的
  - steep
- adj. 急转直下
  - ageing
- n. 老化
  - odds
- n. 可能性
  - virtual
- adi. 实际上的
  - robust
- adj. 强健的
  - organism
- n. 有机体
  - thermodynamics
- n. 热力学
  - moot
- adj. 争论未决的
  - run-down
- adj. 破旧的
  - friction
- n. 摩擦

# 参考译文

人体在 12 岁时是生命力最旺盛的时期。虽然这个时期人的身材、体力和智力还有待发展和完善,但在这个年龄死亡的可能性最小。再早一些,我们是幼儿和小孩子,身体较脆弱;再迟一些,我们就要经历生命力和抵抗力逐步衰退的过程。虽然这个过程起初难以觉察,但最终会急转直下,不管我们怎样精心照料我们自己,不管社会和医生怎样对我们进行精心照顾,我们也无法再活下去了。生命力随着时间的流失而衰退叫做衰老。人类发现的最不愉快的一个事实是:人必然会衰老。既使我们能避开战争、意外的事故和各种疾病,我们最终也会"老死";衰老的速度在人与人之间相差甚微,我们最可能死亡的年龄在65至80岁之间,有些人会死得早一些,少数人寿命会长一些 -- 活到八十几岁或九十几岁,但这种可能性很小。不管我们多么幸运,多么健壮,我们所希望的长寿实际上是有限度的。

衰老的过程,不经提起,正常人容易忘记;一经提醒,才会记起。我们对人总是要衰老的现象并不陌生,多年来就已认识到。生命随着时间流失而丧失活力,人随着年龄的增长而接近死亡,这是不言而喻的,就像一壶热水迟早会凉不来,一双鞋渐渐会磨破一样。人们不但认识到所有的动物,大概也认识到所有的有机物。如树木,甚至宇宙本身,从事物的本质上来说都会"磨损掉"。我们通常看到的大多数动物,即使能让它们活得足够长久的话,也

会像我们一样衰老的。像上紧发条的手表那样的机械装置,或太阳,也都会消耗完其能量(整个宇宙否如此,目前沿有争论)。不过,这些衰老的情况同人并不相似。手表停了依然是只手表,还可以重上好发条。然而一只老掉牙的手表,磨损太厉害,老得一点儿不准了,最终不值得修理了。但是,手表决不会自行修理,它不是由有生命的部件组成,而是由金属组成,而金属可以随着磨擦而磨损殆尽。而我们人,在一定时间内是可以自行修复的,除了暴病死或意外事故外,至少足以克服一切疾病和事故。在12岁至80岁之间,我们逐渐丧失这种能力。能使我们在12岁时病倒的疾病,到了80岁可能会使我们一厥不振而进入坟墓。假如我们能保持12岁时的旺盛生命力,那么我们当中的一半人过700年才会死去,剩下的一半人再过700年,才会又减少一半。

Lesson 38
Water and the traveller 水和旅行者

First listen and then answer the following question. 听录音,然后回答以下问题。

What does this text describe?

Contamination of water supplies is usually due to poor sanitation close to water sources, sewage disposal into the sources themselves, leakage of sewage into distribution systems or contamination with industrial or farm waste. Even if a piped water supply is safe at its source, it is not always safe by the time it reaches the tap. Intermittent tap-water supplies should be regarded as particularly suspect.

Travellers on short trips to areas with water supplies of uncertain quality should avoid drinking tap-water, or untreated water from any other source. It is best to hot drinks, bottled or canned drinks of well-known brand names -- international standards of water treatment are usually followed at bottling plants. Carbonated drinks are acidic, and slightly safer. Make sure that all bottles are opened in your presence, and that their rims are clean and dry.

Boiling is always a good way of treating water. Some hotels supply boiled water on request and this can be used for drinking, or for brushing teeth. Portable boiling elements that can boil small quantities of water are useful when the right voltage of electricity is available. Refuse politely any cold drink from an unknown source.

Ice is only as safe as the water from which it is made, and should not be put in drinks unless it is known to be safe. Drink can be cooled by placing them on ice tather than adding ice to them.

Alcohol may be a medical disinfectant, but should not be relied upon to sterilize water. Ethanol is more effective at a concentration of 50-70 per cent; below 20 per cent, its bactericidal action is negligible. Spirits labelled 95 proof contain only about 47 per cent alcohol. Beware of methylated alcohol, which is very poisonous, and should never be added to drinking water.

If no other safe supply can be obtained, tap water that is too hot to touch can be left to cool and is generally safe to drink. Those planning a trip to remote areas, or intending to live in countries where drinking water is not readily available, should know about the various possible

#### RICHARD DAWOOD Travellers' Health

New words and expressions 生词和短语

contamination

n. 污染

sanitation

n. 卫生,卫生设备

sewage

n. 污水

leakage

n. 泄漏

intermittent

adj. 间歇的, 断断续续的

carbonated

adj. 碳化的,碳酸的

acidic

adj. 酸的,酸性的

alcohol

n. 酒精

disinfectant

n. 消毒剂

sterilize

v. 消毒

ethanol

n. 乙醇

bactericidal

adj. 杀菌的

negligible

adj. 可以忽略的, 微不足道的

methylated

adj. 加入甲醇的

#### 参考译文

水源的污染通常是由于接近水源的地方卫条件太差而造成的:污水排入水源,污水渗入给水系统或工农业污水造成污染。即使管道供水系统在水源处安全的,等水到达龙头时就不一定总是安全的了。断断续续的水管应该被视为是非常可疑的。

短途旅行到水质不保险的地区时,应避免饮用水龙头的水或未经处理任何其他来源的水。最好仅饮用开水,名牌瓶装或罐装水 -- 装瓶厂通常遵循国际水处理的标准。碳酸饮料是酸性的,就更安全一些。确保瓶子是当你面开启的,瓶口清洁干燥。

烧开一直是水处理的一种好办法。有的酒店根据要求可提供开水,这些开水可用于饮用和刷牙。如果有相配的电压,可以煮少量水的便携式热水装置是有用的。应谢绝任何不明来源的冷饮。

冰块只有当制造冰块的水安全时才是保险的,只有知道冰块安全时才能加入饮料。可以把饮料置于冰块之上来冷却,而不是把冰块加进饮料之中。

酒精可能是医学上的消毒剂,但决不可用来消毒饮用水。乙醇的浓度为 50%至 70%时比较有效,浓度低于 20%时,杀菌能力基本上就不存在了。强度标为 95 的酒中含有 47%的酒精。要提防甲基化酒精,那是剧毒的,永远不能掺入饮用水。

如果没有其他安全的饮用水,水管中流出的烫手的水可以留下来冷却。这种水一般是安全的。那些计划去偏远地区旅行,或在饮用水不现成的国家居住的人,应该知道如何使水适于饮用的各种办法。

Lesson 39 What every writer wants 作家之所需

First listen and then answer the following question. 听录音,然后回答以下问题。

How do professional writers ignore what they were taught at school about writing?

I have known very few writers, but those I have known, and whom I respect, confess at once that they have little idea where they the are going when they first set pen to paper. They have a character, perhaps two; they are in that condition of eager discomfort which passes for inspiration; all admit radical changes of destination once the journey has begun; one, to my certain knowledge, spent nine months on a novel about Kashmir, then reset the whole thing in the Scottish Highlands. I never heard of anyone making a 'skeleton', as we were taught at school. In the breaking and remaking, in the timing, interweaving, beginning afresh, the writer comes to discern things in his material which were not consciously in his mind when he began. This organic process, often leading to moments of extraordinary self-discovery, is of an indescribable fascination. A blurred image appears; he adds a brushstroke and another, and it is gone; but something was there, and he will not rest till he has captured it. Sometimes the yeast within a writer outlives a book he has written. I have heard of writers who read nothing but their own books; like adolescents they stand before the mirror, and still cannot fathom the exact outline of the vision before them. For the same reason, writers talk interminably about their own books, winkling out hidden meanings, super-imposing new ones, begging response from those around them. Of course a writer doing this is misunderstood: he might as well try to explain a crime or a love affair. He is also, incidentally, an unforgivable bore.

This temptation to cover the distance between himself and the reader, to study his image in the sight of those who do not know him, can be his undoing: he has begun to write to please.

A young English writer made the pertinent observation a year or two back that the talent goes into the first draft, and the art into the drafts that follow. For this reason also the writer, like any other artist, has no resting place, no crowd or movement in which he may take comfort, no judgment from outside which can replace the judgment from within. A writer makes order out of the anarchy of his heart; he submits himself to a more ruthless discipline than any critic dreamed

of, and when he flirts with fame, he is taking time off from living with himself, from the search for what his world contains at its inmost point.

# JOHN LE CARRE What every writer wants from Harper's

New words and expressions 生词和短语

confess

v. 承认

inspiration

n. 灵感

Kashmir

n. 克什米尔

interweave

v. 交织

afresh

adv. 重新

discern

v. 辨明,领悟

indescribable

adj. 无法描述的

blur

v. 使...模糊不清

yeast

n. 激动

fathom

v. 领悟,彻底了解

interminably

adv. 没完没了地

winkle

v. 挖掘

incidentally

adv. 顺便说一下

pertinent

adj. 中肯的

flirt

v. 调情

inmost

adj. 内心深处

#### 参考译文

我的认识的作家寥寥无几,然而凡是我所认识和尊敬的作家,都立即承认在他们动笔时,不清楚要写什么,怎么写。他们心中只在一个或两个角色。他们处于急切不安的状态,而被当作是灵感。他们无不承认,一旦"旅程"开始,"目的地"常有急剧的变化。据我所知,有位作家花了9个月的时间写了一部关克什米尔的小说,后来却把整个故事背景换成了苏格

兰高地。我从未听说过任何一位作家像我们在学校那样,动笔前先列什么提纲。作家在剪裁修改、构思时间、穿插情节、以至从头重写的过程中,会领悟到素材中很多东西是他刚动笔时所未意识到的。这种有机的加工过程往往达到不寻常自我发现的境界,具有难以言表的构思魅力。一个朦胧的形象出现在作家的脑海里,他左添一笔,右添一笔,形象反而消逝了;可是,好像还有什么东西存在着,不把它捕捉到,作家是不会罢休的。有时,一个作家一本书写完了,但兴奋仍不消散。我听说一些作家,除了自己的书外,别的书一概不读,犹如希腊神话中那位漂亮的少年,站在镜前,不能辨认自身的真面目。由于这个原因,作家喋喋不休地谈论自己的书,挖掘其隐晦的含义,询问周围人的反应。作家如此行事当然被人误解。他还不如给人讲一个犯罪案件或一个恋爱故事。顺便说一句,他也是个不可饶恕的令人厌烦的人。

这种企图消除自己和读者之间距离的作法,企图用不了解自己的人的观点来研究自己塑造的形象的作法,会导致作家的毁灭,因为他已经开始为取悦他人而写作了。

一两年前,一位年轻的英国作家发表了中肯的看法。他说,初稿是才华,以后各稿是艺术。也是由于这个原因,作家同任何艺术家一样,找不到可休息的场所,找不到伙伴和活动使自己得到安逸。任何局外人的判断也比不上他内心的正确判断。一旦作家从内心的紊乱中理出头绪,就应该按任何评论家想像不到的无情规范约束自己写作;当他沽名钓誉时,他就脱离了自我生活,脱离了对自己灵魂最深处世界的探索。

Lesson 39 Waves 海浪

First listen and then answer the following question. 听录音,然后回答以下问题。

What false impression does an ocean were convey to the observer?

Waves are the children of the struggle between ocean and atmosphere, the ongoing signatures of infinity. Rays from the sun excite and energize the atmosphere of the earth, awakening it to flow, to movement, to rhythm, to life. The wind then speaks the message of the sun to the sea and the sea transmits it on through waves -- an ancient, exquisite, powerful message.

These ocean waves are among the earth's most complicated natural phenomena. The basic features include a crest (the highest point of the wave), a trough (the lowest point), a height (the vertical distance from the trough to the crest), a wave length (the horizontal distance between two wave crests), and a period (which is the time it takes a wave crest to travel one wave length).

Although an ocean wave gives the impression of a wall of water moving in your direction, in actuality waves move through the water leaving the water about where it was. If the water was moving with the wave, the ocean and everything on it would be racing in to the shore with obviously catastrophic results.

An ocean wave passing through deep water causes a particle on the surface to move in a roughly circular orbit, drawing the particle first towards the advancing wave, then up into the wave, then forward with it and then -- as the wave leaves the particles behind -- back to its starting

point again.

From both maturity to death, a wave is subject to the same laws as any other 'living' thing. For a time it assumes a miraculous individuality that, in the end, is reabsorbed into the great ocean of life.

The undulating waves of the open sea are generated by three natural causes: wind, earth movements or tremors, and the gravitational pull of the moon and the sun. Once waves have been generated, gravity is the force that drives them in a continual attempt to restore the ocean surface to a flat plain.

from World Magazine (BBC Enterprises)

New words and expressions 生词和短语

signature

n. 签名,标记

infinity

n. 无穷

ray

n. 光线

energize

v. 给与...能量

rhythm

n. 节奏

transmit

v. 传送

exquisite

adj. 高雅的

phenomena

n. 现象

crest

n. 浪峰

trough

n. 波谷

vertical

adj. 垂直的

horizontal

adj. 水平的

actuality

n. 现实

catastrophic

adj. 大灾难的

particle

n. 微粒

maturity

n. 成熟

undulate

- v. 波动,形成波浪
  - tremor
- n. 震颤

gravitational

adj. 地心吸力的

# 参考译文

海浪是大海和空气相斗的产物,无限的一种不间断的标志。太阳光刺激了地球的大气层,并给予它能量;阳光使空气开始流动,产生节奏,获得生命。然后,风把太阳的住处带给了大海,海洋用波浪的形式传递这个信息 -- 一个源过流长、高雅而有力的信息。

这些海浪属于地球上最复杂的自然现象。它们的基本特征包括浪峰(波浪的最高点)、波谷(最低点)、浪高(从波谷到浪峰的垂直距离)、波长(两个浪峰间的水平距离)和周期(海峰走过一个波长所需的时间)。虽然,海浪给人的印象是一堵由水组成的墙向你压过来,而实际上,浪从水中移过,而水则留在原处。如果水和浪一起移动的话,那么大海和海里所有的东西就会向岸边疾涌过来,带来明显的灾难性后果。

穿过深水的海浪使水面上的一个微粒按照一种近乎圆形的轨道移动,先把微粒拉向前移动的海浪,然后推上波浪,随着波浪移动,然后 -- 当波浪把微粒留在身后时 -- 又回到出发点。

从成熟到消亡,波浪和其他任何"活动中"的东西一样,都受制于共同的法则。一度它获得非凡的个性,但最终又被重新融进生命的大洋。

公海上起伏的波浪是由 3 个自然因素构成的: 风、地球的运动或震颤和月亮、太阳的引力。一旦波浪形成,地球引力是持续不断企图使海面复原为平面的力量。

Lesson 41 Training elephants 训练大象

First listen and then answer the following question. 听录音,然后回答以下问题。

At what point does the training of a captive wild elephant begin?

Two main techniques have been used for training elephants, which we may respectively the tough and the gentle. The former method simply consists of setting an elephant to work and beating him until he does what is expected of him. Apart from moral considerations this is a stupid method of training, for it produces a resentful animal who at a later stage may well turn man-killer. The gentle method requires more patience in the early stages, but produces a cheerful, good-tempered elephant who will give many years of loyal service.

The first essential in elephant training is to assign to the animal a single mahout who will be entirely responsible for the job. Elephants like to have one master just as dogs do, and are capable of a considerable degree of personal affection. There are even stories of half-trained elephant calves who have refused to feed and pined to death when by some unavoidable circumstance they

have been deprived of their own trainer. Such extreme cases must probably be taken with a grain of salt, but they do underline the general principle that the relationship between elephant and mahout is the key to successful training.

The most economical age to capture an elephant for training is between fifteen and twenty years, for it is then almost ready to undertake heavy work and can begin to earn its keep straight away. But animals of this age do not easily become subservient to man, and a very time man, and a very firm hand must be employed in the early stages. The captive elephant, still roped to a tree, plunges and screams every time a man approaches, and for several days will probably refuse all food through anger and fear. Sometimes a tame elephant is tethered nearby to give the wild one confidence, and in most cases the captive gradually quietens down and begins to accept its food. The next stage is to get the elephant to the training establishment, a ticklish business which is achieved with the aid of two tame elephants roped to the captive on either side.

When several elephants are being trained at one time, it is customary for the new arrival to be placed between the stalls of two captives whose training is already well advanced. It is then left completely undisturbed with plenty of food and water so that it can absorb the atmosphere of its new home and see that nothing particularly alarming is happening to its companions. When it is eating normally, its own training begins. The trainer stands in front of the elephant holding a long stick with a sharp metal point. Two assistants, mounted on tame elephants, control the captive from either side, while others rub their hands over his skin to the accompaniment of a monotonous and soothing chant. This is supposed to induce pleasurable sensations in the elephant, and its effects are reinforced by the use of endearing epithets. The elephant is not son', or 'ho! my father', or 'my mother', according to the age and sex of the captive. The elephant is not immediately susceptible to such blandishments, however, and usually lashes fiercely with its trunk in all directions. These movements are controlled by the trainer with the metal-pointed stick, and the trunk eventually becomes so sore that the elephant curls it up and seldom afterwards uses it for offensive purposes.

# RICHARD CARRINGTON Elephants

New words and expressions 生词和短语

technique

n. 技术

tough

adi. 强硬的

resentful

adj. 忿恨不满的

assign

v. 分配,指派

mahout

n. 驯象人

calf

n. 幼仔

pine

v. 消瘦

underline

- v. 着重说明,强调 keep
- n. 生计

subservient

adj. 屈从的 plunge

v. 向前冲

tame

adj. 养驯服了的

tether

v. (用绳)拴

ticklish

adj. 难对付的,棘手的 alarming

adj. 引起惊恐的 accompaniment

n. 伴奏

soothe

v. 镇定

chant

n. 单调的歌 reinforce

v. 加强

endearing

adj.惹人喜爱的

epithet

n. 称呼

susceptible

adj. 易受感动的

blandishment

n. 奉承

lash

v. 猛烈地甩

curl

v. 使卷曲

# 参考译文

驯象有两种主要的方法,我们分别称之为强硬法和温柔法。强硬法就是驱象去干活,把它打顺从为止。且不说道义问题,这本身就是一种愚蠢的训练方法,因为这种方法训练会使动物反感,在以后某个时期可能会变成伤人的动物。温柔法要求在最初阶段保持较大的耐心,但这种方法可以训练出性情愉快、脾气温顺,能忠实为人服务多年的大象。

驯象中至关生要的是指派一名专门的驯象员,全面负责这项工作。大象和狗一样,喜欢有一个专一的主人,而且会对主人产生相当深厚的私人感情。甚至有这样的故事:训练了一半的小象,由于不可避免的情况与他们的主人分离后,竟拒绝吃食,消瘦至死。这种极端的

事例虽不可全信,但强调了一项基本原则,象和驯象员之间的关系是驯象成功与否的关健。

捕捉 15 至 20 岁之间年龄的大象进行驯象最为经济。这个年龄的象差不多已能干重活,可以很快挣回饲养它的开支。但这个年龄的象不易驯服,因此开始阶段需要有一位强有力的老手。捕来拴在树上的大象,每当有人走近它时,就会向前猛冲并发出尖叫,甚至一连几于都由于愤怒和恐惧而拒绝进食。有时,把一头已驯服的象拴在旁边能给野象以信心。在大多数情况下,刚博来的象会慢慢静下来,接着开始吃食。下一步就是把象带到训练场所,这是一件棘手的事,需要在它两侧拴上两头驯服的大象才能完成。

几只象同时训练时,通常是把新到的安置在两头训练得很好的大象的象厩中间,然后给它以充足的食物和水,一定不要惊扰它,以便让他能适应新居的气氛,并且看到自己的同伴身上没有发生让自己担惊受怕的事。当它进食正常了,训练就开始。驯练员手持一根有锋利金属尖头的长棒,站在象前。两位助手骑在驯服的象的背上,从两侧控制新捕的象,其他人唱着单调的歌声用手抚摸象的皮肤。据说这是为了使象产生愉快的感觉,为了加强这种效果,人闪还按象的年龄性别,给以亲切的外号,如"嗬!我的孩子"、"嗬!我的爸爸"、"嗬!我的妈妈"。然而大象不会立刻被这些讨好的括感动,而往往是用鼻子朝各个方向猛烈地甩动。训练员要用有锋利金属尖的长棒控制它的这种举动,象鼻子最后疼得卷了起来,以后它就很少用鼻子去进攻了。

Lesson 42 Recording an earthquake 记录地震

First listen and then answer the following question. 听录音,然后回答以下问题。

What does a pen have to do to record on paper the vibrations generated by an earthquake?

An earthquake comes like a thief in the night, without warning. It was necessary, therefore, to invent instruments that neither slumbered nor slept. Some devices were quite simple. One, for instance, consisted of rods of various lengths and thicknesses with would stand up end like ninepins. When a shock came, it shook the rigid table upon which these stood. If it were gentle, only the more unstable rods fell. If it were severe, they all fell. Thus the rods, by falling, and by the direction in which they fell, recorded for the severe, they all fell. Thus the rods, by falling, and by the direction in which they fell, recorded for the slumbering scientist the strength of a shock that was too weak to waken him, and the direction from which it came.

But instruments far more deliecate than that were needed if any really serious advance was to be made. The ideal to be aimed at was to devise an instrument that could record with a pen on paper, the movements of the ground or of the table as the quake passed by. While I write my pen moves, but the paper keeps still. With practice, no doubt, I could in time learn to write by holding the pen still while the paper moved. That sounds a silly suggestion, but that was precisely the idea adopted in some of the early instruments (seismometers) for recording earthquake waves. But when table, penholder and paper are all moving, how is it possible to write legibly? The key to a solution of that problem lay in an everyday observation. Why does a person standing in a bus or

train tend to fall when a sudden start is made? It is because his feet move on, but his head stays still. A simple experiment will help us a little further. Tie a heavy weight at the end of a long piece of string. With the hand to and fro and around but not up and string so that the weight nearly touches the ground. Now move the hand to and fro and around but not up and down. It will be found that the weight a piece of string. With the hand held high in the air, hold the string so that the weight nearly touches the ground. Now move the hand to and fro and around but not up and down. It will be found that ten weight moves but slightly or not at all. Imagine an earthquake shock shaking the floor, the paper, you and your hand. In the midst of all this movement, the weight and the pen would be still. But as the paper moved from side to side under the pen point, its movement would be recorded in ink upon its surface. It was upon this principle that the first instruments were made, but while the drum was being shaken, the line that the pen was drawing wriggled from side to side. The apparatus thus described, however, records only the horizontal component of the wave movement, which is, in fact, much more complicated. If we could actually see the path described by a particle, such as a sand grain in the rock, it would be more like that of a bluebottle path described by a particle, such as a sand grain in the rock, it would be more like that of a bluebottle buzzing round the room; it would be up and down, to and fro and from side to side. Instruments have been devised and can be so placed that all three elements can be recorded in different graphs.

When the instrument is situated at more than 700 miles from the earthquake ce

ntre, the graphic record shows three waves arriving one after at short intervals. The first records the arrival of longitudinal vibrations. The second marks the arrival of transverse vibrations which travel more slowly and arrive several minutes after the first. These two have travelled through the earth. It was from the study of these that so much was learnt about the interior of the earth. The third, or main. The third, or main wave, is the slowest and has travelled round the earth through the surface rocks.

#### H.H,SWINNERTON The Earth beneath Us

New words and expressions 生词和短语 earthquake

n. 地震

slumber

v. 睡眠

ninepin

n. 九柱戏中的木柱

rigid

adi. 坚硬的

delicate

adj. 灵感的

seismometer

n. 地震仪 penholder

n. 笔杆

legibly

adv. 字迹清楚地

drum

n. 鼓状物

wriggle

v. 扭动

bluebottle

n. 绿头苍蝇

graph

n. 图表

graphic

adi. 图示的

longitudinal

adj. 纵向的

transverse

adj. 横向的

# 参考译文

地震就像夜间的小偷,不打招呼就来了。因此,有必要发明一种仪器,既不打盹儿,也不睡觉。有些装置非常简单。例如,有一种装置是由一些长短、粗细不同的木棒组成,就像九柱戏的木棒一样坚立着,一旦有地震,就会震动竖立在坚硬的桌上的木棒。如果地震轻微,只有不稳定的木棒倒下,如果地震剧烈,所有的木棒都会例下。由于地震太弱而未惊醒科学家时,木棒倒下的多少和倒下的方向就为科学家记录下了地震的强度和地震方向。

但是,如果要取得真正重大的进展,需要有比这种装置精细得多的仪器。理想的目标是 设计出这样一种仪器: 当地震发生时,它能用笔在纸上记录下大地和桌子运动情况。我写字 时,笔是移动的,纸是静止的。毫无疑问,经过练习,我最终能够学会笔不动而纸动来写字。 这听起来似乎是一种愚蠢的想法,但是早期记录地震波的仪器(地震仪)正是采用了这中思 路。可是,当桌子、夹笔装置、纸都在移动时,怎么能书写得清楚呢?可以从我们的日常生 活观察中找到这个问题的答案。一个站在公共汽车或火车上,当车突然开动时,他为什么会 倾倒呢?这是因为他的脚动了,而他的头保持着静止。再做一个简单的实验可以帮助我们进 一步理解这个问题。把一个生物拴在一根长绳子的一端,把手高高举在空中握住绳子,让重 物几乎接触地面。然后把手前后左右以及旋转摆动,但不要上下摆动。结果会发现,重物是 动了,但动得很小,甚至没动。假定把一支笔拴在重物上,笔尖落在地板上的一张纸上,假 定地震发生了,地板、纸、你和你的手都会动,重物和笔却不动。由于纸在笔下来回运动, 纸的表面就会用墨水记录下地板运动的情况。根据这一原理,制造出了最初的地震仪器,但 是纸是卷在慢慢放置的圆筒上的。只要一切都是静止的,笔就会划出一条直线;但是,圆筒 受到震动,笔所画出的线就会就会左右摆动。然而,这里所说的仪器记录下来的只是地震波 运动中的水平部份, 地震波的运动实际比这要复杂得多。 假如我们真能看到诸如岩石中一个 沙粒子的运动轨迹,那就像一只嗡嗡叫的绿头苍蝇在屋内飞行的轨迹,呈现出上上下下、来 来回回、左左右右3种性质的运动。已经设计出了一些仪器,它按照一定的安放方式就可测 绘出这三种运动的曲线图。

如果把这种仪器安装在距震源 700 多英里远的地方,曲线记录就能显示出前后相同的这 3 种地震波。首先记录下的是纵向波的到达;然后记录下的是横向波的到达,横向波比纵向波传播得慢,在纵向波到过几分钟后能到达。这珍两种波都是穿过地球而来的。正是从这两

种波中的研究中,我们可以了解到地球内部的许多情况。第三种波,即主波,是最慢的,是围绕地球通过表面岩石传来的。

# Lesson 43 Are there strangers in space? 宇宙中有外星人吗?

First listen and then answer the following question. 听录音,然后回答以下问题。

What does the 'uniquely rational way' for us to communicate with other intelligent beings in space depend on?

We must conclude from the work of those who have studied the origin of life, that given a planet only approximately like our own, life is almost certain to start. Of all the planets in our solar system, we ware now pretty certain the Earth is the only one on which life can survive. Mars is too dry and poor in oxygen, Venus far too hot, and so is Mercury, and the outer planets have temperatures near absolute zero and hydrogen-dominated atmospheres. But other suns, start as the astronomers call them, are bound to have planets like our own, and as is the number of stars in the universe is so vast, this possibility becomes virtual certainty. There are one hundred thousand million starts in our own Milky Way alone, and then there are exist is now estimated at about 300 million million.

Although perhaps only 1 per cent of the life that has started somewhere will develop into highly complex and intelligent patterns, so vast is the number of planets, that intelligent life is bound to be a natural part of the universe.

If then we are so certain that other intelligent life exists in the universe, why have we had no visitors from outer space yet? First of all, they may have come to this planet of ours thousands or millions of years ago, and found our then prevailing primitive state completely uninteresting to their own advanced knowledge. Professor Ronald Bracewell, a leading American radio astronomer, argued in Nature that such a superior civilization, on a visit to our own solar system, may have left an automatic messenger behind to await the possible awakening of an advanced civilization. Such a messenger, receiving our radio and television signals, might well re-transmit them back to its home-planet, although what impression any other civilization would thus get from us is best left unsaid.

But here we come up against the most difficult of all obstacles to contact with people on other planets -- the astronomical distances which separate us. As a reasonable guess, they might, on an average, be 100 light years away. (A light year is the distance which light travels at 186,000 miles per second in one year, namely 6 million million miles.) Radio waves also travel at the speed of light, and assuming such an automatic messenger picked up our first broadcasts of the 1920's, the message to its home planet is barely halfway there. Similarly, our own present primitive chemical rockets, though good enough to orbit men, have no chance of transporting us to the nearest other star, four light years away, let alone distances of tens or hundreds of light years.

Fortunately, there is a 'uniquely rational way' for us to communicate with other intelligent beings, as Walter Sullivan has put it in his excellent book, We Are not Alone. This depends on the precise radio frequency of the 21-cm wavelength, or 1420 megacycles per second. It is the natural frequency of emission of the hydrogen atoms in space and was discovered by us in 1951; it must be known to any kind of radio astronomer in the universe.

Once the existence of this wave-length had been discovered, it was not long before its use as the uniquely recognizable broadcasting frequency for interstellar communication was suggested. Without something of this kind, searching for intelligences on other planets would be like trying to meet a friend in London without a pre-arranged rendezvous and absurdly wandering the streets in the hope of a chance encounter.

ANTHONY MICHAELIS Are There Strangers in Space? from The Weekend Telegraph

New words and expressions 生词和短语

Mercury

n. 水星

hydrogen

n. 氢气

prevailing

adj. 普遍的

radio astronomer

射电天方学家

uniquely

adv. 唯一地

rational

adj. 合理的

radio frequency

无线电频率

cm

n. 厘米

megacycle

n. 兆周

emission

n. 散发

intersteller

adj.星际的

rendezvous

n. 约会地点

#### 参考译文

根据研究生命起源的人们所作的工作,我们必然会得出这样的结论:如果设想有一颗行星和我们地球的情况基本相似,那几乎肯定会产生生命。我们目前可以肯定的是,在我们太阳系的所有行星中,地球是生命能存在的唯一行星。火星太干燥又缺氧,金星太热,水星也

一样。除此之外,太阳系的其他行星的温度都接近绝对零度,并围绕着以氢气为主的大气层。但是,其他的太阳,既天文学家所说的恒星,肯定会有像我们地球一样的行星。因为宇宙中恒星的数目极其庞大,所以存在着产生生命星球的这种可能性是肯定无疑的。仅我们的银河系就有1000亿颗星,况且在宇宙中还有30亿个天河,即银河系。因此,我们所知道的现有恒星数目估计约有30亿X1000亿颗。

虽然在已经产生生命的某个地方,可能只有1%会发展成高度复杂有智力的生命形态,但是行星的数目是那么庞大,有智力的生命必然是宇宙的自然组成道听部分。

既然我们如此坚信宇宙中存在着其他有智力的生命,那么我们为什么还未见到外层空间来访的客人呢?首先,他们可能在几千年前或几百年前已来过我们地球,并且发现我们地球汉时普遍存在着的原始状态同他们的先进的知识相比是索然无味的。美国一位重要的射电天文学家罗纳德.布雷斯韦尔教授在《自然》杂志上提出了这样的观点:假如有如此高级文明生命访问了我们的太阳系,很可能会在离开太阳系时留下自动化信号装置,等待先进文明的觉醒。这种自动化信息装置,在接收到我们的无线电和电视信号后,完全有可能把这些信号发回到原来的行星。至于其他文明行星对我们地球会有什么印象,还是不说为好。

然而,在和外星人联系中我们遇到的最大困难是分隔我们的天文距离。据合理推算,外星人离我们平均距离也有 100 光年之远(1 光年是光以每秒 186,000 英里的速度在一年内走的距离即 6 万亿英里)。无线电波也是以光速传播的。假定外星人的这种自动化信息装置接收了我们二十世纪二十年代的第一次广播信号,那么这个信号在发回到原来的行星途中刚刚走了一半路程。同样,我们目前使用的原始化学火箭,虽然把人送入轨道,但尚不能把我们送到离我们最近、相距 4 光年的其他星球上去,更不用说几十光年或几百光年远的地方了。

幸运的是,有一种我们可以和其他智力生命通迅联系的"唯一合理的方法",正如活尔特.沙利方在其杰作《我们并不孤独》中阐述的。这种通迅联系要靠 21 厘料波段,即每秒 1420 兆周的精确无线电频率。这个频率是空间氢原子释放的自然频率,是在 1951 年被人类发现的。这个频率是宇宙中任何射电天文学家都应该熟悉的。

一旦这种波长的实际存在被发现,提出把它作为星际间唯一可辨认的广播频率就为期不远了。没有这手段,要想寻觅其他星球上的智力生命,就如同去伦敦见一位朋友,事先未约定地点,而荒唐地在街上游逛,以期待碰巧遇上一样。

Lesson 44
Patterns of culture
文化的模式

First listen and then answer the following question. 听录音,然后回答以下问题。

What influences us from the moment of birth?

Custom has not commonly been regarded as a subject of great moment. The inner workings of our won brains we feel to be uniquely worthy of investigation, but custom, we have a way of thinking, is behaviour at its most commonplace. As a matter of fact, it is the other way around. Traditional custom, taken the world over, is a mass of detailed behaviour more astonishing than what any one person can ever evolve in individual actions, no matter how aberrant. Yet that is a

rather trivial aspect of the matter. The fact of first-rate importance is the predominant role that custom plays in experience and in belief, and the very great varieties it may manifest.

No man ever looks at the world with pristine eyes. He sees it edited by a definite set of customs and institutions and ways of thinking. Even in his philosophical probing he cannot go behind these stereotypes; his very concepts of the true and the false will still have reference to his particular traditional customs. John Dewey has said in all seriousness that the part played by custom in shaping the behaviour of the individual, as against any way in which he can affect traditional custom, is as the proportion of the total vocabulary of his mother tongue against those words of his own baby talk that are taken up into the vernacular of his family. When one seriously studies the social orders that have had the opportunity to develop autonomously, the figure becomes no more than an exact and matter-of-fact observation. The life history handed down in his community. From the moment of his birth, the customs into which he is born shape his experience and behaviour. By the time he can talk, he is the little creature of his culture, and by the time he is grown and able to take part in its activities, its habits are his habits, its beliefs his beliefs, its impossibilities his impossibilities. Every child that is born into his group will share them with him, and no child born into one on the opposite side of the globe can ever achieve the thousandth part. There is no social problem it is more incumbent upon us to understand than this of the role of custom. Until we are intelligent as to its laws and varieties, the main complicating facts of human life must remain unintelligible.

The study of custom can be profitable only after certain preliminary propositions have been accepted, and some of these propositions have been violently opposed. In the first place, any scientific study requires that there be no preferential weighting of one or another of the items in the series it selects for its consideration. In all the less controversial fields, like the study of cacti or termites or the mature of nebulae, the necessary method of study is to group the relevant material and to take note of all possible variant forms and conditions. In this way, we have learned all that we know of the laws of astronomy, or of the habits of the social insects, let us say. It is only in the relevant material and to take note of all possible variant forms and conditions. In this way, we have learned all that we know of the laws of astronomy, or of the habits of the social insects, let us say. It is only in the study of man himself that the major social sciences have substituted the study of one local variation, that of Western civilization.

Anthropology was by definition impossible, as long as these distinctions between ourselves and the primitive, ourselves and the barbarian, ourselves and the pagan, held sway over people's minds. It was necessary first to arrive at that degree of sophistication where we no longer set our own belief against our neighbour's superstition. It was necessary to recognize that these institutions which are based on the same premises, let us say the supernatural, must be considered together, our own among the rest.

#### **RUTH BENEDICT Patterns of Culture**

New words and expressions 生词和短语 commonplace adj. 平凡的 aberrant

adj. 脱离常轨的,异常的 trivial

- adj. 微不足道的,琐细的 predominant
- adj. 占优势的,起支配作用的 manifest
- v. 表明 pristine
- adj. 纯洁的,质朴的 stereotype
- n. 陈规
  - vernacular 方言
- n. 方言 accommodation
- n. 适应
  - incumbent
- adj. 义不容辞的,有责任的 preliminary
- adj. 初步的 proposition
- n. 主张 preferrential
- adj. 优先的 controversial
- adj. 引起争论的
  - cactus
- n. 仙人掌
- termite n. 白蚁
- nebula
- adj. 星云 variant
- n. 不同的
  - barbarian
- n. 野蛮人
  - pagan
- n. 异教徒
  - sophistication
- n. 老练
  - premise
- n. 前提
  - supernatural
- adj. 超自然的

风俗一般未被认为是什么重要的课题。我们觉得,只有我们大脑内部的活动情况才值得研究,至于风俗呢,只是些司空见惯的行为而已。事实小,情况正好相反。从世界范围来看,传统风俗是由许多细节性的习惯行为组成,它比任何一个养成的行为都更加引人注目,不管个人行为多么异常。这只是问题的一个次要的侧面。最重要的是,风俗在实践中和信仰上所起的举足轻重的作用,以及它所表现出来的极其丰富多采的形式。

没有一个人是用纯洁而无偏见的眼光看待世界。人们所看到的是一个受特定风俗习惯、制度和思想方式剪辑过的世界。甚至在哲学领域的探索中,人们也无法超越这此定型的框框。人们关于真与伪的概念依然和特定的传统风俗有关。约翰.杜威曾经非常严肃地指出:风俗在形成个人行为方面所起的作用和一个对风俗的任何影响相比,就好像他本国语言的总词汇量和自己咿呀学语时他家庭所接纳的他的词汇量之比。当一个人认真地研究自发形成的社会秩序时,杜威的比喻就是他实事求是观察得来的形象化的说法。个人的生活史首先是适应他的社团世代相传形成的生活方式和准则。从他呱呱坠地的时刻起,他所生于其中的风俗就开始塑造他的经历和行为规范。到会说话时,他就是传统文化塑造的一个小孩子;等他长大了,能做各种事了,他的社团的习惯就是他的习惯,他的社团的信仰就是他的信仰,他的社团不能做的事就是他不能做的事。每一个和他诞生在同一个社团中的孩子和他一样具有相同的风俗;而在地球的另一边。诞生在另一个社团的孩子与他就是少有相同的风俗。没有任何一个社会问题比得上风俗的作用问题更要求我们对它理解。直到我们理解了风俗的规律性和多样性,我们才能明白人为生活中主要的复杂现象。

只有在某些基本的主张被接受下来、同时有些主张被激烈反对时,对风俗的研究才是全面的,才会有收获。首先,任何科学研究都要求人们对可供考虑的诸多因素不能厚此薄彼,偏向某一方面。在一切争议较小的领域里,如对仙人掌、白议或星云性质的研究,应采取的研究方法是。把有关各方面的材料汇集起来,同时注意任何可能出现的异常情况和条件。例如,用这种方法,我们完全掌握了天文学的规律和昆虫群居的习性。只是在对人类自身的研究。只要我们同原始人,我们同野蛮人,我们同异教徒之间存有的区别在人的思想中占主工导地位,那么人类学按其定义来说就无法存在。我们首先需要达到这样一种成熟的程度:不用自己的信仰去反对我们邻居的迷信。必须认识到,这些建立在相同前提基础上的风俗,暂且可以说是超自然的东西,必须放在一起加以考虑,我们自己的风俗和其他民族的风俗都在其中。

Lesson 45
Of men and galaxies
人和星系

First listen and then answer the following question. 听录音,然后回答以下问题。

What is the most influential factor in any human society?

In man's early days, competition with other creatures must have been critical. But this phase of our development is now finished. Indeed, we lack practice and experience nowadays in dealing with primitive conditions. I am sure that, without modern weapons, I would make a very poor show of disputing the ownership of a cave with a bear, and in this I do not think that I stand alone.

The last creature to compete with man was the mosquito. But even the mosquito has been subdued by attention to drainage and by chemical sprays.

Competition between our selves, person against person, community against community, still persists, however; and it is as fierce as it ever was.

But the competition of man against man is not the simple process envisioned in biology. It is not a simple competition for a fixed amount of food determined by the physical environment, because the environment that determines our evolution is no longer essentially physical. Our environment is chiefly conditoned by the things we believe. Morocco and California are bits of the Earth in very similar latitudes, both on the west coasts of continents with similar climates, and probably with rather similar natural resources. Yet their present development is wholly different, not so much because of different people wish to emphasize. The most important factor in our environment is the state of our own minds.

It is well known that where the white man has invaded a primitive culture, the most destructive effects have come not from physical weapons but from ideas. Ideas are dangerous. The Holy Office knew this full well when it caused heretics to be burned in days gone by. Indeed, the concept of free speech only exists in our modern society because when you are inside a community, you are conditioned by the conventions of the community to such a degree that it is very difficult to conceive of anything really destructive. It is only someone looking on from outside that can inject the dangerous thoughts. I do not doubt that it would be possible to inject ideas into the modern world that would utterly destroy us. I would like to give you an example, but fortunately I cannot do so. Perhaps it will suffice to mention the unclear bomb. Of making the effect on a reasonably advanced technological society, one that still does not possess the bomb, of making it aware of the possibility, of supplying sufficient details to enable the thing to be constructed. Twenty or thirty pages of information handed to any of the major world powers around the year 1925 would have been sufficient to change the course of world history. It is a strange thought, but I believe a correct one, that twenty or thirty pages of ideas and information would be capable of turning the present-day world upside down, or even destroying it. I have often tried to conceive of what those pages might contain, but of course outside the particular patterns that our brains are conditioned to, or, to be more accurate, we can think only a very little way outside, and then only if we are very original.

#### FRED HOYLE Of Men and Galaxies

New words and expressions 生词和短语

dispute

v. 争夺

mosquito

n. 蚊子

subdue

v. 征服

drainage

n. 下水系统 envision

n. 预想

Morocco

n. 摩洛哥

latitude

n. 纬度

heretic

- n. 异教徒,异端邪说 conceive
- v. 想像

suffice

v. 足够

nuclear

adi. 原子弹的

original

adj.有独到见解的

#### 参考译文

在人类早期,人类与其他生物的竞争一定是必不可少的。但这个发展阶段已经结束。确实,我们今天缺乏对付原始环境的实践和经验。我断定,如果没有现代化的武器,要我和一只熊去争洞穴,我会出洋相的;我也相信,出洋相者并非我一人。能与竞争的生物最后只有蚊子,然而即使蚊子,也由于我们注意清理污水和喷洒化学药品就被制服了。

然而人类之间的战争,人与人,团体与团体,依然在进行着,而且和以前一样激烈。

但是,人与人的竞争并不像生物生物学中想像的那样是一个简单过程。它已不是为争得物质环境所决定的东西所决定。摩洛哥和加利福尼亚是地球上纬度极其相似的两个地方,都在各自大陆的西海岸,气候相似,自然资源也可能相似。但是,这两个地方目前的发展程度完全不一样。这倒不是因为人民不同,而是由于居民头脑中的思想不同。 这是我要强调的论点。我们环境中最重要的因素就是我们的思想状况。

众所周知,凡是白人侵入原始文化的地方,破坏作用最大的不是杀人的武器,而是思想。思想是危险的。宗教法庭对此是非常清楚的,因此从前它总是把异教徒烧死。的确,言论自由的概念只存在于我们现代社会中,因为当你生活在一个社团中时,社团的风俗习惯会严格地制约你,使你很难有破坏性的想法。只有外部的旁观者才能灌输危险的思想。向现代世界灌输一种思想以便摧毁我们人类是可能的事,对此我并不怀疑。我愿为你举个例子,但幸亏我举不出。也许提一下核弹就足以证明了。对一个沿未拥有核弹、但科技相当发达的社会,如果告诉它制造核弹的可能性,而且向它提供制造核弹的细节,那么可以设想,这将对这个社会产生何等的影响。如果把二三十页的情报交给1952年前后的任何一个世界强国,就足以改变世界历史的进程。二三十页材料中的思想和情报会便当今的世界翻天覆地,甚至毁灭这个世界。这是个离奇的想法。不过我认为这个想法是正确的。我常常试图想像这些纸上所写的东西,不过我是做不到的,因为我和你们大家一样,是当今世界上的凡人。我闪不能脱离我们大脑所限定的模式去问题,我们只能稍微离开一点儿,就这也需要我们独创的思想。

Lesson 46 Hobbies 业余爱好 First listen and then answer the following question. 听录音, 然后回答以下问题。

Who, according to the author, are 'Fortune's favoured children'?

a gifted American psychologist has said, 'Worry is a spasm of the emotion; the mind catches hold of something and will not let it go.' It is useless to argue with the mind in this condition. The stronger the will, the more futile the task. One can only gently insinuate something else into its convulsive grasp. And if this something else is rightly chosen, if it really attended by the illumination of another field of interest, gradually, and often quite swiftly, the old undue grip relaxes and the process of recuperation and repair begins.

The cultivation of a hobby and new forms of interest is therefore a policy of the first importance to a public man. But this is not a business that can be undertaken in a day or swiftly improvised by a mere command of the will. The growth of alternative mental interests is a long process. The seeds must by carefully chosen; they must fall on good ground; they must be sedulously tended, if the vivifying fruits are to be at hand when needed.

To be really happy and really safe, one ought to have at least two or three hobbies, and they must all be real. It is no use starting late in life to say: 'I will take an interest in this or that.' Such an attempt only aggravates the strain of mental effort. A man may acquire great knowledge of topics unconnected with his daily work, and yet get hardly any benefit or relief. It is no use doing what you like; you have got to like what you do. Broadly speaking, human beings may be divided into three classes: those who are toiled to death, those who are worried to hard week's sweat and effort, the chance of playing a game of football or baseball or Saturday afternoon. It is no use inviting the politician or the professional or business man, who has beer working or worrying about serious things for six days, to work or worry about trifling things at the weekend.

As for the unfortunate people who can command everything they want, who can gratify every caprice and lay their hands on almost every object of desire -- for them a new pleasure, a new excitement if only an additional satiation. In vain they rush frantically round from place to place, trying to escape from avenging boredom by mere clatter and motion. For them discipline in one form or another is the most hopeful path.

It may also be said that rational, industrious, useful human being are divided into two classes: first, one. Of these the former are the majority. They have their compensations. The long hours in the office or the factory bring with them as their reward, not only the means of sustenance, but a keen appetite for pleasure even in its simplest and most modest forms. But Fortune's of sustenance, but a keen appetite for pleasure even in its simplest and modest forms. But Fortune's favoured children belong to the second class. Their life is a natural harmony. For them the working hours are never long enough. Each day is a holiday, and ordinary holidays, when they come, are grudged as enforced as enforced interruptions in an absorbing vocation. Yet to both classes, the need of an alternative outlook, of a change of atmosphere, of a diversion of effort, is essential. Indeed, it may well be that those work is their pleasure are those who and most need the means of banishing it at intervals from their minds.

WINSTON CHURCHLL Painting as a Pastime

New words and expressions 生词和短语

gifted

adj. 有天才的

psychologist

n. 心理学家

spasm

n. 一阵(感情)发作

futile

adj. 无用的

insinuate

v. 便潜入,暗示

convulsive

adj. 起痉挛的

illumination

n. 启发, 照明

undue

adj. 不造当的

grip

n. 紧张

recuperation

n. 休息

improvise

v. 临时作成

sedulously

adv. 孜孜不倦地

vivify

v. 使生气勃勃

aggravate

v. 加剧

trifling

adj. 微小的

gratify

v. 便满意

caprice

n. 任性

satiation

n. 满足

frantically

adv. 狂乱地

avenge

v. 替…报复

boredom

n. 厌烦

clatter

n. 喧闹的谈话

sustenance

- n. 生计
  - appetite
- n. 欲望
  - grudge
- v. 怨恨
  - absorbing
- adj. 引人入胜的
  - banish
- v. 排除,放弃

# 参考译文

一位天才的美国心理学家曾经说过:"烦恼是感情的发作,此时脑子纠缠住了某种东西又不肯松手。"在这种情况下,你又和头脑争吵让它松手是无济于事的。这种意志越是强烈,这种尝试越是徒劳。你只能缓和而巧纱地让另一种东西进入痉挛僵持的头脑中。如果选得合适,而且的确受到别的领域的情趣的启迪,那么渐渐地,往往也是很顺利地,原先不适当的紧张就会松弛下来,恢复和修整的过程就会开始。

因此,对一个从事社会活动的人来说,培养一种业余爱好和各种新的兴趣是关等重要的作法。但这并非一日之功,也不是单凭一蹴而就的事。精神上多种情趣的培养是一个长期的过程。要想在需要的时候可随手摘取充满生机的果实,那就必然从选良种做起,然后将其植入肥沃的土地,还需要勤勉地护理。

一个人要想真正感到幸福和平安,至少应有两三种爱好,而且都比较实际。到了晚年才开始说:"我会对这些人或那个人发生兴趣",已没有用了。这种愿望只能加剧精神紧张。一个人可能会获得与其日常工作无关的某些课题的渊博知识,而没有从中得到什么实益或宽慰。干你所喜欢的事是没有用的,你喜欢你所干的事。泛泛地说,人可以分为3类:劳累至死的人、忧虑至死的人、无聊至死的人。对于流汗出力干了一周苦活的体力劳动者来说,让他们在星期六下午再踢足球或打垒球是不合适的;同样,对于为严肃的公务操劳或烦恼了6天的政界人士、专业人员、商人来说,在周未再让他们为琐事而动脑子和忧虑也是无益的。

至于那些能任意支配一切的"可怜的人",他们能够恣意妄为,能染指一切追求的目标。 对这种人来说,多一种新的乐趣、多一种新的刺激只是增加一分厌腻而已。他们到处奔乱跑, 企图以闲聊和乱窜来摆脱无聊对他们的报复,但这是徒劳的。对他们来说,用某种形式的纪 律约束他们一下才能有希望使他们走上正道。

也可以这样说,理智的,勤劳的、有用的人可以分为两类:第一类是他分清工作是工作,娱乐是娱乐的人;第二类人的工作和娱乐是一回事。这两类人当中,第一类人是大多数,他们能够得到补偿。在办公室或工厂里长时间工作给他们带来了酬劳,这不仅是谋生的手段,而且还带来了寻找乐趣的强烈欲望,那怕是最简单的、最低等的乐趣。但是,命运之神的宠儿是第二类人,他们的生活是一种自然的和谐,对他们来说,工作时间总不会太长,每天都是假日,而通常的假期来到,他们却惋惜这假期强制打断了他们埋头从事的工作。然而对这两种人来说,都需要换一换脑子,改变一下气氛,转移一下注意力,这是不可缺少的。说实在的,把工作当作享受的那些人最需要每隔一段时间把工作从头脑中撇开。

The great escape 大逃亡

First listen and then answer the following quesion.

听录音, 然后回答以下问题。

What is one of the features of modern camping where nationality is concerned?

Economy is one powerful motive for camping, since after the initial outlay upon equipment, or through hiring it, the total expense can be far less than the cost of hotels. But, contrary to a popular assumption, it is far from being the only one, or even the greatest. The man who manoeuvres carelessly into his twenty pounds' worth of space at one of Europe's myriad permanent sites may find himself bumping a Bentley. More likely, Ford Escort will be hub to hub with Renault or Mercedes, but rarely with bicycles made for two.

That the equipment of modern camping becomes yearly more sophisticated is an entertaining paradox for the cynic, a brighter promise for the hopeful traveler who has sworn to get away from it all. It also provides-and some student sociologist might care to base his thesis upon the phenomenon -- an escape of another kind. The modern traveller is often a man who dislikes the Splendide and the Bellavista, not because he cannot afford, or shuns their material comforts. but because he is afford of them. Affluent he may be, but he is by no means sure what to tip the doorman or the chambermaid. Master in his own house, he has little idea of when to say boo to a maitre d'hotel.

From all such fears camping releases him. Granted, a snobbery of camping itself, based upon equipment and techniques, already exists; but it is of a kind that, if he meets it, he can readily understand and deal with. There is no superior 'they' in the shape of managements and hotel hierarchies to darken his holiday days.

To such motives, yet another must be added. The contemporary phenomenon of car worship is to be explained not least by the sense of independence and freedom that ownership entails. To this pleasure camping gives an exquisite refinement.

From one's own front door to home or foreign hills or sands and back again, everything is to hand. Not only are the means of arriving at the holiday paradise entirely within one's own command and keeping, but the means of escape from holiday hel (if the beach proves too crowded, the local weather too inclement) are there, outside -- or, as likely, part of -- the tent.

Idealists have objected to the package tour, that the traveller abroad thereby denies himself the opportunity of getting to know the people of the country visited. Insularity and self-containment, it is argued, go hand in hand. The opinion does not survive experience of a popular Continental camping place. Holiday hotels tend to cater for one nationality of visitors especially, sometimes exclusively. Camping sites, by contrast, are highly cosmopolitan. Granted, a preponderance of Germans is a characteristic that seems common to most Mediterranean sites; but as yet there is no overwhelmingly specialized patronage. Notices forbidding the open-air drying of clothes, or the use of water points for car washing, or those inviting 'our camping friends' to a dance or a boat trip are printed not only in French or Italian or Spanish, but also in English, German and Dutch. At meal times the odour of sauerkraut vies with that of garlic. The Frenchman's breakfast coffee competes with the Englishman's bacon and eggs.

Whether the remarkable growth of organized camping means the eventual death of the more

independent kind is hard to say. Municipalities naturally want to secure the campers' site fees and other custom. Police are wary of itinerants who cannot be traced to a recognized camp boundary or to four walls. But most probably it will all depend upon campers themselves: how many heath fires they cause; how much litter they leave; in short, whether or not they wholly alienate landowners and those who live in the countryside. Only good scouting is likely to preserve the freedoms so dear to the heart of the eternal Boy Scout.

NIGEL BUXTON The Great Escape from The Weekend Telegraph

New words and expressions 生词和短语

assumption

n. 假定

manoeuvre

v. (驱车)移动

myriad

adj. 无数的

paradox

n. 自相矛盾的呈

cynic

n. 愤世嫉俗者

sociologist

n. 社会学家

shun

v. 避开

affluent

adj. 富有的

chambermaid

n. 女招待员

boo

b. 呸的一声

maitre d'hotel

n. [法语]总管

snobbery

n. 势利

hierarchy

n. 等级制度

entail

v. 便成为必要

inclement

adj. 险恶的

package tour

由旅行社安排一切的一揽子诱游

insularity

n. 偏狭

cater

- v. 迎合
  - exclusively
- adv. 排他地
  - cosmopolitan
- adj. 世界的
  - preponderance
- n. 优势
  - overwhelmingly
- adv. 以压倒优势地,清一色地
  - patronage
- n. 恩惠,惠顾
  - sauerkraut
- n. 泡菜
  - vie
- v. 竞争
  - municipality
- n. 市政当局
  - itinerant
- n. 巡回者
  - heath
- v. 荒地
  - alienate
- v. 便疏远
  - eternal
- adj. 永久的

#### 参考译文

图省钱是露营的一个主要动机,因为除了开始时购置或是租借一套露营装备外,总费用 算起来要比住旅馆开支少得多。但是,和一般的看法相反,这决非是仅有的,甚至不是最主 要的动机。如果一位游客漫不经心地驾车驶入欧洲无数常年营地之一,花 20 镑租用一个空 位,那么他可能会碰见一辆本特利汽车,更可能会望见一辆福特.康索尔或一辆雷诺或一辆 梅塞迪斯并排停放着,不过双人自行车则不容易看到。

现代露营装备一年比一年讲究,这对那些厌世嫉俗者来说是一件有趣的自相矛盾的事情。而对于发誓用露营来摆脱烦恼的人来说,却带来了更光明的前景。学社会学的大学生来露营是另一种形式的摆脱现实,他们的目的很可能是根据观察到的露营现象去写论文。现代露营旅游的人往往讨厌在"斯普兰迪德"和"贝拉维斯塔"这样的大酒店,这并不是因为他们付不起钱,也不是为了躲避物质享受,而是因为他们害怕酒店。他们可能很富有,但给看门人和房间女服务叫多少小费,心中却根本没有数;他们在家可能是主人,但不知道什么时候才能对酒店的经理表示不满。

露营便人们免除了这些忧虑。诚然,露营地本身也存在以露营装备和方式取人的势利现象,但如果有这种情况,露营者也容易理解,知道如何对付,但在露营地里根本不会有管人的"人上人"和酒店里的等级制度来种露营者的假日过得阴郁低沉。

除上以动机外,还应加上一个。当前崇拜汽车现象可以用与所有权相伴的独立和自由意

识来解释。因此开车去露营会给这种快乐意识增加一种优雅意境。

从自己的家门出发到国内国外的山区或沙滩上露营然后返回,一切都很便利。完全在自己掌握之中的私人汽车不仅是到达假日天堂的工具,而且也是逃离假日地狱(如海滩太挤,当地天气恶劣)方便工具,因为汽车就停在帐篷外面,或者汽车本身可能就是露营帐篷的一个组成部分。

理想主义者像反对旅行社安排一切的一揽子旅游一样反对露营的作法,说这种封闭的作法使到国外旅游者失去了了解所去国家人民的机会。他们争论说,心胸狭窄和自我封闭是并存的。但这种说法在受人欢迎的欧洲露营地是站不住脚的。假日旅馆有只接待来自一个国家的旅游者的倾向,有时会达到排他的程度。而露营驻地则相反,是高度世界性的。在大多数地中海露营地里,德国人占优势似乎是个普遍现象,确实如此,但并没有特别的优待。禁止露天晒衣服、禁止用水龙头冲洗汽车的布告和邀请露营朋友参加舞会、乘船观光的招贴不仅印志法语、意大利语、西班牙语,而且也印成英语、德语、荷兰语。用饭的时候,德国泡菜味和大蒜味争相散发,法国人的早点咖啡和英国人的咸肉煎蛋竞相比美。

有组织的露营活动的明显发展是否意味着较独立的自我封闭式露营的最终消失,还很难说。市政当局当然希望获得露营者的场地费和其他光临的好处,警察则对那些查不出有固定营地或住处的游荡者保持警惕。但最重要的或许是露营者自己,即他们引起了多少场野火,留下了多少垃圾。总之,他们是否弄得土地的主人和乡间的居民同他们反目。只有优良的童子军活动才能保持不朽的童子军所衷心热爱的各项自由。

# Lesson 48 Planning a share portfolio 规划股份投资

First listen and then answer the following question. 听录音,然后回答以下问题。

How does the older investor differ in his approach to investment from the younger investor?

There is no shortage of tipsters around offering 'get-rich-quick' opportunities. But if you are a serious private investor, leave the Las Vegas mentality to those with money to fritter. The serious investor needs a proper 'portfolio' -- a well-planned selection of investments, with a definite structure and a clear aim. But exactly how does a newcomer to the stock market go about achieving that?

Well, if you go to five reputable stock brokers and ask them what you should do with your money, you're likely to get five different answers, -- even if you give all the relevant information about your age age, family, finances and what you want from your investments. Moral? There is no one 'right' way to structure a portfolio. However, there are undoubtedly some wrong ways, and you can be sure that none of our five advisers would have suggested sinking all (or perhaps any) of your money into Periwigs\*.

So what should you do? We'll assume that you have sorted out the basics -- like mortgages, pensions, insurance and access to sufficient cash reserves. You should then establish your own

individual aims. These are partly a matter of personal circumstances, partly a matter of psychology.

For instance, if you are older you have less time to recover from any major losses, and you may well wish to boost your pension income. So preserving your capital and generating extra income are your main priorities. In this case, you'd probably construct a portfolio with some shares (but not high risk ones), along with gilts, cash deposits, and perhaps convertibles or the income shares of split capital investment trusts.

If you are younger, and in a solid financial position, you may decide to take an aggressive approach -- but only if you're blessed with a sanguine disposition and won't suffer sleepless nights over share prices. If portfolio, alongside your more pedestrian in vestments. Once you have decided on your investment aims, you can then decide where to put your money. The golden rule here is spread your risk -- if you put all of your money into Periwigs International, you're setting yourself up as a hostage to fortune.

\*'Periwigs' is the name of a fictitious company.

#### INVESTOR'S CHRONICLE, March 23 1990

New words and expressions 生词和短语

portfolio

n. 投资组合

tipster

n. (以提供证券投机等内部消息为主的)情报贩子

Las Vegas

n. 拉斯韦加斯

fritter

v. 挥霍, 浪费

reputable

n. 享有声望的

broker

n. 经纪人

finance

n. 资金,财源

mortgage

n. 抵押贷款

pension

n. 养老金

priority

n. 优先权

gilt

n. 金边证券(高度可靠的证券)

convertible

n. 可换证券

sanguine

adj. 乐观的

heady

adj. 令人陶醉的 alongside prep. 在······旁边,和······一起 pedestrian adj. 平淡无奇的,乏味的

# 参考译文

我们周围不乏情报贩子,向人们提供迅速发财致富的机遇。但是,如果你是一个认真的私人投资者,就把拉斯韦加斯的心态留给那些有钱可供挥霍的人。认真的投资者需要一份正规的投资组合表 -- 一种计划很周密的投资选择,包括你的投资结构和明确的目标。但是,一个股票市场的新手又如何能做到这一点呢?

如果你去向 5 位有威望的股票经纪人咨询,询问你应该如何使用你的资金,你可能得到 5 种不同的答复,即便你提供了有关于你的年龄、家庭、财源和你想从投资中获得好处的信息。这是个道德问题吗?没有一种完全"正确"的方法来排列这种投资组合,然而,却毫无疑问地有几种错误的方法。可以相信 5 位经纪人中不会有人建议你把全部(或一部份)资金投入佩里威格斯公司。

那么你该怎么做呢?我们假定你已把基本情况弄清楚了,如抵押贷款、养老金、保险金和动用现金储备的机会。然后,你一定要建立起自己的目标。这里一方面是个所处的环境,另一方面是个心理学的问题。

比如说,如果你年纪较大,你从重大投资损失中恢复过来的时间就较少,你就很希望能够提高你的养老金收入。因此,你的首要任务就是保护你的资金和引发额外的收入。在这种情况下,你大概想制定一份包括某些股份(但不是风险很大的股份)的投资组合,同时还有高度可靠的证券、现金储蓄,可能还有可换证券,或分割资本投资信托公司的所得股。

如果你年轻一些,并且经济状况可靠,你可能会采取一种积极进取的方式 -- 你必须性格开朗,不会因股票价格的浮动而夜不能眠。如果你觉得你的情况是这样的话,你可在投资组合中包括几项有令人陶醉的增值前景的增长股,和其他比较平淡的投资项目放在一起。一旦你的投资组合中包括几项有令人陶醉的增值前景的增长股,和其他比较平淡的投资项目放在一起。一旦你的投资目标确立以后,你就可以决定你的钱投向何处。这里的指导原则是:分散你的投资风险。如果你把所有资金投入佩里威格斯国际公司,你就把自己当成了命运的人质。