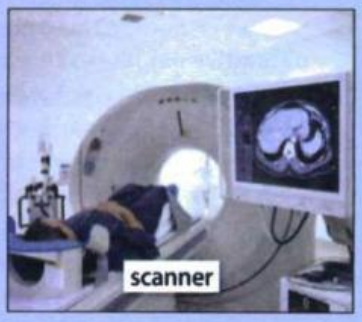
48 Medical advances

A **revolutionary era** in medical **advances**

In recent decades, we have seen **radical** changes in **conventional** medicine:

- 60 years ago, **scanners** did not exist. **Diagnostic** tools were **restricted** to basic X-ray machines.
- Children suffered from **infectious** diseases, for which there was no effective **cure**. Now **vaccines** have **eradicated** some of these illnesses and diseases.
- In the past, if you had a major **operation**, you would be **confined to bed** for weeks. Today, many operations use **procedures** requiring day **surgery** only.
- In the past, the **mortality rate** for patients with **organ** failure, such as heart, lung or **kidney** failure, could be 100%. Today, **transplants enable** many patients to **resume** a normal life.
- The **survival** rate for many cancers has improved considerably over the last forty years.
- **Vitamins** and **minerals** are necessary for good health. There are more **supplements** on the market now for people who do not get enough of certain vitamins or minerals from their normal diet.



GLOSSARY

revolutionary	producing great changes **revolution** *n*
era	a period of time that has a particular quality or character
advance (in sth)	progress made in science, medicine, technology, etc.
radical	new, different and likely to have a great effect
conventional	usual or traditional; not new or different **convention** *n*
diagnostic	used for finding out what physical or mental problem sb has **diagnose** *v*; **diagnosis** *n*
restrict	limit the size, number or amount of sth **restriction** *n*
infectious	(of a disease / an illness) can easily be passed on to another person **infection** *n*; **infect** *v*
cure	a medical treatment that makes a sick person well again **cure** *v*
vaccine	a substance which is put into the blood and protects the body from disease. The process of giving **vaccine** is **vaccination**. **vaccinate** *v*
eradicate *formal*	destroy or get rid of sth completely SYN **wipe (sth) out**
be confined to bed / a wheelchair	have to stay in bed / a wheelchair
procedure	a medical operation that may or may not require your body to be cut open
rate	the number of times sth happens within a particular period: ***survival rate***, ***birth rate***, ***mortality rate***
organ	a part of the body that has a particular function e.g. the heart, the brain
transplant	an operation in which a damaged organ is replaced with one from a **donor** (= sb who gives part of their body, blood, etc.) **transplant** *v*
enable sb/sth to do sth	make it possible for sb/sth to do sth
resume *formal*	begin sth again after an interruption
vitamin	one of several substances in certain foods that help us grow and be healthy, e.g. ***vitamin C***, ***vitamin D***
mineral	a natural substance, such as coal, salt, etc. Some **minerals** are present in food and drink and important for good health.
supplement	sth that is added to sth else. **Vitamin supplements**, usually taken in the form of tablets, add vitamins to your diet.

SPOTLIGHT *surgery*

Surgery is medical treatment in which your body is cut open so that a part can be removed or repaired. SYN **an operation**, **operate** *v*. The place where this happens is an **operating theatre**, and the person who does it is a **surgeon**. **surgical** *adj*

LIVEWORKSHEETS

1 Is the pronunciation of the underlined letters the same or different? Write *S* or *D*. Use the APP to help you.

1 revolutionary era .....
2 vitamin mineral .....
3 radical diagnose .....
4 vaccine vaccinate .....
5 confined vaccine .....
6 confined conventional .....
7 era enable .....
8 revolutionary advances .....
9 resume infectious .....

2 Complete the table.

NOUN	VERB	ADJECTIVE
revolution	-	.....
.....	restrict	-
surgery	-	.....
vaccine, ...	.....	-
diagnosis	.....	.....
.....	transplant	-
infection	.....	.....

3 *Yes* or *No*?

1 If a disease is eradicated, does it mean it has been restricted? .....
2 Does an organ donor receive an organ from someone else? .....
3 Does a radical change mean a very big change? .....
4 If you have a disease which is diagnosed, does it mean you are better? .....
5 Does it matter if your diet doesn't contain any vitamins? .....
6 Is conventional medicine new and different? .....
7 If a disease is infectious, can you catch it? .....
8 Does surgery involve an operation? .....

4 Complete the sentences.

1 Her injuries were serious, so they took her straight to the operating ..... .
2 There are prizes for the most important technological ..... .
3 Most people get the vitamins and minerals they need, but doctors recommend ..... for some people if they lack certain things in their diet.
4 Many changes have taken place since the Victorian ..... .
5 I wanted to know the current survival ..... for breast cancer.
6 The ..... involves inserting a tube into the ear to reduce infection.
7 His life was saved thanks to an organ ..... .
8 Some foods contain a lot of vitamins and ..... .
9 There are some treatments available, but sadly no effective ..... .
10 Alongside conventional ....., other forms of treatment have become popular in recent years.

5 Complete the dialogues.

1 Polio has been ....., I believe. ~ Yes, it's been almost completely ..... .
2 In some areas, lung cancer treatment is ..... to non-smoking patients only. ~ Yes, I think that may be true for patients needing an organ ..... as well.
3 The government has a policy to ..... the elderly against flu. ~ I know, but there's often a shortage of the appropriate ..... when it's needed.
4 I don't like all these drugs some doctors give you. I don't trust ..... medicine. ~ Really? But there have been some fantastic ..... in drugs in recent decades.
5 Are hospitals much cleaner places than they were many years ago? ~ Yes. Better hygiene has greatly reduced the spread of ..... .
6 The surgeons had to ..... on Jason; it was a difficult ..... . ~ Yes, he was ..... to bed for ages. Fortunately he's now recovering.
7 My aunt is having a ..... new procedure for her damaged hip. ~ I know. If it succeeds, she'll be able to walk again and ..... a normal life.
8 Why did doctors fit the tube in Malcolm's throat? ~ I think it ..... him to breath more easily.

TEST YOURSELF

LIVEWORKSHEETS