

英 语

ENGLISH

第 二 册

外语教研室 编

西北电讯工程学院

THE NORTHWEST TELECOMMUNICATION
ENGINEERING INSTITUTE

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外国语是人生斗争的一种武器。

列宁语录

语言是人类最重要的交际工具。

毛主席语录

领导我们事业的核心力量是中国共产党。

指导我们思想的理论基础是马克思列宁主义。

教育必须为无产阶级政治服务，必须同生产劳动相结合。

中国人民有志气，有能力，一定要在不远的将来；赶上和超过世界先进水平。

古为今用，洋为中用。

中国应当对于人类有较大的贡献。

为什么语言要学，并且要用很大的气力去学呢？因为语言这东西，不是随便可以学好的，非下苦功不可。

A Quotation from Marx

A foreign language is a weapon in the struggle of life.

A Quotation from Lenin

Language is the most important means of human intercourse.

Quotations from Chairman Mao Tsetung

The force at the core leading our cause forward is the Chinese Communist Party.

The theoretical basis guiding our thinking is Marxism-Leninism.

Education must serve proletarian politics and be combined with productive labour.

The Chinese people have high aspirations, they have ability and they will certainly catch up with and surpass advanced world levels in the not too distant future.

Make the past serve the present and foreign things serve China.

China ought to have made a greater contribution to humanity.

Why do we need to study language and, what is more, spend much effort on it? Because the mastery of language is not easy and requires painstaking effort.

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Lesson Twenty-One 第二十一课

课文: Electrons and Electric Current

语法: 被动语态 (一)

阅读材料: Electromagnetic Fields and Radio waves

Text 课文

Electrons and Electric Current

The world consists of matter. Matter is formed by atoms. ☆Different kinds of matter are formed by different kinds of atoms. Each atom contains positive and negative charges. ☆Positive charges are called protons. ☆Negative charges are called electrons. The total number of the protons in any atom and the total number of the electrons in it are the same, i.e., the total number of the positive charges in any atom and the total number of the negative charges in it are the same. Therefore, under normal conditions, matter contains no electric charges.

In order to do work, electric charges must move. ☆When electric charges are caused to move, work will be done. ☆Electric charges can do work, only when they are caused to flow. The flow of electric charges is called an electric current.

☆Electric charges will flow in a circuit, when an

electric source is applied to it. Electric charges will flow only when there is an electric circuit. ☆ Conductors are used to form electric circuits. Copper is a good conductor. ☆ It is often used as a wire. electric charges will flow only when there is an electric source. There are various kinds of electric sources. Battery is one of them. ☆ It is often used as the source for a transistor receiver.

Since the flow of electric charges is the flow of electrons, an electric current is, in practice, formed by the movement of electrons. In any electric circuit, electrons flow from the source, through the circuit and back to the source. They flow from the source at the positive end. They flow through the circuit and back to the source at the negative end.

New Words 生 词

1. current	['kʌrənt]	n. 电流
2. form	[fɔ:m]	vt. 形成, 构成
3. by	[baɪ]	prep. 被…、由…; 用…
4. contain	[kən'teɪn]	vt. 包含
5. call	[kɔ:l]	vt. 称作
6. condition	[kən'dɪʃən]	n. 条件; 情况
7. work	[wɜ:k]	n. 工作; 功

8. when	[wen]	conj. 当...的时候
9. cause	[kɔ:z]	vt. 使; 引起, 产生
10. flow	[flou]	vi. 流动
		n. 流
11. circuit	['sə:kit]	n. 电路
12. source	[sɔ:s]	n. 源
13. conductor	[kən'daktə]	n. 导体
14. as	[æz]	prep. 作为
15. wire	['waɪə]	n. 线, 导线
16. battery	['bætəri]	n. 蓄电池, 干电池
17. receiver	[ri'si:və]	n. 接收机
18. since	[sɪns]	conj. 自从...以来; 因为, 由于..., 既然...
19. practice	['præktɪs]	n. 实践
20. back	[bæk]	ad. 返回
21. at	[æt]	prep. 在...
22. through	[θru:]	prep. 通过...

Phrases and Expressions 词组和短语

- to call A B 把 A 称作 B
A is ~ed B A 被称作 B
to be ~ed... 被称作...
- under normal conditions 在正常情况下
- to cause...to (do)... 使... (做)
to be ~d to (do)... 被使得 (做) ...
- to apply A to B 把 A 加到 B 上去

- A is ~ied to B A 被加到 B 上
 to be ~ied to... 被加到... 上
5. to use A as B 把 A 用作 B
 A is ~d as B A 被用作 B
 to be ~d as... 被用作...
6. in practice 实际上
7. at the negative (positive) end 在负(正)端

Grammar 语 法

被动语态 (一)

一、动词过去分词的构成 (复习)

动词过去分词的构成, 与过去式一样, 有规则变化和不规则变化两种。

(1) 规则变化动词的过去分词与过去式完全相同。

动词原形	过 去 式	过去分词
work	worked [wə:kt]	worked
transform	transformed [træns'fɔ:md]	transformed
love	loved [lʌvd]	loved
use	used [ju:zd]	used
increase	increased [in'kri:st]	increased
produce	produced [prə'dju:st]	produced
study	studied ['stʌdɪd]	studied
apply	applied [ə'plaid]	applied

(2) 不规则变化动词的过去分词与过去式不尽相同，要逐个记忆。

动词原形	过去式	过去分词
be	was [wɒz] were [wə:]	been [bi:n]
do	did [dɪd]	done [dʌn]
have	had [həd]	had
make	made [meɪd]	made
build	built [bɪlt]	built
send	sent [sent]	sent

二、谓语动词的被动语态

(1) 一般现在时的被动语态: $\left. \begin{matrix} \text{is} \\ \text{are} \end{matrix} \right\} + \text{过去分词}$

[例1] All the revolutionary people love Chairman Mao.
主语 + 谓语 + 宾语

所有的革命人民都热爱毛主席。

例1的句子结构是“主语+谓语+宾语”。谓语动词“love”的主语即该动词动作的主体；谓语动词“love”的宾语，即该动词动作所及的对象。这种句子我们称为主动句。谓语动词“love”被称为主动语态。迄今为止，我们所学过的句子都是主动句；谓语动词都是主动语态。

如果我们要表达：毛主席为一切革命人民所热爱。即把

原来主动句中的宾语变成主语。也就是说，把谓语动词动作的承受者作为句子的主语。这时，谓语动词要作相应的变化。这样的句子，就被称为“被动句”；谓语动词就被称为“被动语态”。

Chairman Mao is loved by all the revolutionary people. 主语 + 谓语

毛主席为一切革命人民所热爱。

句中的“is loved”即被动语态。它的构成是“助动词 to be 的人称形式 + 过去分词”。一般现在时，主要是用“to be”的第三人称单、复数形式 $\left. \begin{matrix} \text{is} \\ \text{are} \end{matrix} \right\}$ + 过去分词构成被动语态。

注意：这里的“is”和“are”不是“是”的意思。它们在这里，只起构成被动语态的作用。

如果我们要在被动句中表示原来主动句中的主语，就用“by [bai]（被）+ 原来主动句中的主语”放在被动语态的谓语之后。

[例1] 主动句：

All the revolutionary people love Chairman Mao. 主 + 谓 + 宾

被动句：

Chairman Mao is loved by all the revolutionary people. 主 + 谓

[例2] 主动句：

Their factory produces this type of transistors. 主 + 谓 + 宾

他们的工厂生产这种型号的晶体管。

被动句:

This type of transistors are produced by their factory. 主 + 谓

这种型号的晶体管是由他们的工厂生产的。

例1 和例2 中的谓语的时态，都是一般现在时。

(2) 一般将来时的被动语态:

will be + 过去分词

[例3] 主动句:

We shall build a new base of heavy industry.

我们将建设一个新的重工业基地。

被动句:

A new base of heavy industry will be built.

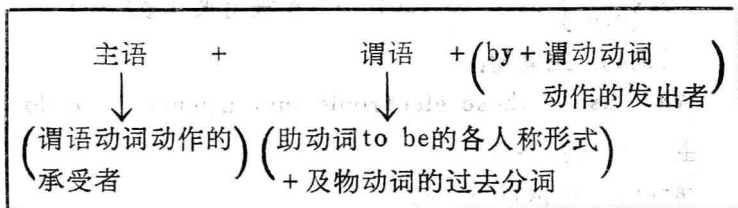
一个新的重工业基地将被建设起来。

上面 3 个例句中的谓语动词，love, produce 和 build 都是及物动词。只有及物动词作谓语时，才有被动语态。

被动语态译成汉语时，常用“被”，“受”，“由”等词来表达。

小结：谓语动词的被动语态

被动句的结构:



注：1. 构成被动语态的助动词“to be”不是“是”的意思。它本身没有词义，只起构成被动语态的作用；

2. “by”可译成“被”、“受”、“由”等；

3. 只有及物动词才有被动语态；

4. 当不必说出谓语动词动作的发出者或句子的重点在谓语动词动作的承受者而不在动作的发出者时，常用被动句。

谓语动词被动语态的一般现在时和一般将来时的各人称形式（以及物动词 to send 为例）

一般现在时			一般将来时		
I	am	}	I	shall	}
You	are		You	will	
He	is		He		
She			She		
It			It		
We	are	}	We	shall	}
You			You	will	
They			They		
sent			be sent		

三、动词词组用作谓语时的被动语态

(1) to use A to (do) ... 变成被动语态为：

A { $\begin{matrix} \text{is} \\ \text{are} \end{matrix} \}$ used to (do) ... (A 被用来 (做) ...)

[例4] 主动句：

We use these electronic instruments to do
主 + 谓 + 宾
various experiments.

我们使用这些电子仪器做各种实验。

被动句:

These electronic instruments are used to do
主 + 谓
various experiments.

这些电子仪器被用来做各种实验。

(2) to apply A to B 变成被动语态为:

A $\left\{ \begin{array}{l} \text{is} \\ \text{are} \end{array} \right\}$ applied to B (A 被运用于 B)

[例 5] 主动句:

We apply Marxism-Leninism to the three great
主 + 谓 + 宾
revolutionary movements.

我们把马列主义运用于三大革命运动。

被动句:

Marxism-Leninism is applied to the three great
主 + 谓
revolutionary movements.

马列主义被运用于三大革命运动。

(3) to call[kɔ:l] A B (把A称作 B) 变成被动语态为:

A $\left\{ \begin{array}{l} \text{is} \\ \text{are} \end{array} \right\}$ called B (A 被称作 B)

[例 6] 主动句:

We call negative charges electrons.
主 + 谓 + 宾

我们把负电荷称作电子。

被动句:

Negative charges are called electrons.

主 + 谓

负电荷被称作电子。

这类词组常常写成被动形式:

to be used to (do) ... 被用来(做) ...

to be applied to ... 被运用于 ...

to be called ... 被称作 ...

像“to be applied to...”这样的词组，我们学过的还有：

1. to change A to (into) B 把A变成B

to be changed to (into) ... 被变成 ...

2. to transform A to (into) B 把A改造为(变成)B

to be transformed to (into) ... 被改造为(变成) ...

3. to send ... to ... 把 ... 送到 ...

to be sent to ... 被送到 ...

Exercises for Grammar

一、划出下列各句中的谓语，并将各句译成汉语

I

1. Our great Party is loved by all the people of China.

2. These good resistors and capacitors are produced by their factory.

3. These new electronic equipments are made in China.

4. More and better new products will certainly be produced for our socialist construction.
5. These new electronic instruments will be used in the production of new products.
6. These new electronic equipments will be used in the development of our electrical and electronic industries.
7. A large number of electrical equipments will be produced for the development of our power industry.
8. A new large power station will be built.

I

1. These new machines are used to make transistors.
2. These new electronic equipments will be used to develop our electronics industry.
3. Those new electrical instruments will be used to do various experiments.
4. Comrade Li will be sent to the institute.

二、划出下列各句中的谓语，说明各组练习中谓语形式的区别，并将各句译成汉语：

1. 1) We use electricity in various fields of our life.
2) Electricity is used in various fields of our life.
2. 1) The students use these electronic instruments of new type in their experiments.

2) These electronic instruments of new type are used by the students in their experiments.

3. 1) Their factory will produce this new type of transistors.

2) This new type of transistors will be produced by their factory.

4. 1) That large radar factory will make a new type of radar set.

2) A new type of radar set will be made by that large radar factory.

5. 1) Our factory will send those new workers to the institute.

2) Those new workers will be sent to the institute.

三、将下面的句子译成英语:

这些新的电子设备是中国制造的。(谓语动词用一般现在时被动语态)

Exercises for Text

一、将课文中带“☆”号的句子译成汉语。

二、写出下列各音标组相应的单词，并写出其词性及相应的词义:

1. ['præktis] 2. [bæk] 3. ['bætəri] 4. [kən'tein]