

译 者 前 言

《农业英语》是美国科利尔·麦克米伦公司 (Collier MacMillan International, Inc.) 为具有一定英语程度的外国人编辑出版的丛书——《专业英语》(Special English) 中的农业部分。该丛书的这一部分是在特邀编辑、美国农业部前首席农艺师考夫曼 (F. A. Coffman) 主持下编写的。全书三册：第一册，土壤，共十八课；第二册，大田作物，共二十一课；第三册，园艺和畜牧，共二十四课。每课有对话或课文，专业词汇注释和例句，课堂或自学练习等几个部分。对话或课文是各课的核心部分，密切结合有关专业，言简意赅。考虑到目前我国还没有系统的农业英语会话书籍，我们把这三本书翻译出来，以英汉对照的形式出版，希望能够满足农业大专院校教学上的需要，以及读者们的自学需要。

在翻译过程中，我们碰到了一些问题。例如同义词的翻译问题。在英语中同义词往往有好几个，但其中有一些很难找到与之对应的汉译。在这个问题上，我们的原则是尽可能用对应的汉语译义加以区分，实在不能区分的，也不勉强。例如 grain crops 和 cereal crops, beard 和 awn，我们分别译作谷类作物和谷物作物，须芒和芒，而 pig, hog, swine 一般则一律译作猪；surface soil, topsoil 一律译作表土。其次，对一些外来语，我们采取了音译加注的办法，如 carabao, water buffalo 译作卡拉宝 水牛 (菲律宾语——译注)。原书对有些词汇所作解释，译成汉语时显得多余，如 ant, small insect, 蚂蚁：小昆虫；beef, the meat of a mature

animal of the cow family, 牛肉：成熟的牛科动物的肉；
cattle: animal of the cow family 牛 牛科动物 等等 为了忠于原作，还是照译了。各课为读者安排的练习（Check-Up），鉴于有些如译出来便失去了它的意义，故未译。至于书后的词汇表，其内容已包括在各课中，因此也略而未译。

本书的译文，不是范文，只不过是试图为初学者提供一点帮助。在使用本书时，读者如能借助译文，结合原文认真思考，很可能做到对原文更确切的理解。我们恳切地希望读者能对译文中可能的错误和不妥之处提出宝贵的意见。

本书第一册由青松译；第二册由文立译；第三册由齐警译。

1980年5月

PREFACE

Special English is a series designed for use by non-native speakers of English who have already learned enough English to carry on a conversation on general matters or to read with only infrequent reference to a dictionary, except for technical words.

This book is the first of two that provide specialized advanced English instruction for students interested in the field of agriculture. The lessons have been prepared in such a way as to give the student practice in using the vocabulary of agriculture in context.

Agriculture, Book 1 deals mainly with soils and irrigation, *Book 2* with the most important field crops. *Book 1* consists of 18 lessons, each of which is based on a dialogue or reading. In each lesson there are definitions of technical words used in the text and supplementary sentences that present these words in context; all the words defined are to be found in an appended glossary. In each lesson there are exercises for classroom work or self-study. A key to these exercises is provided. Abundant illustrations add meaning and interest to the text.

To provide the student with valuable practice in the comprehension, pronunciation, and expression of spoken English as it relates to agriculture, there is available a number of pre-recorded tapes based on the text.

Special English is a series within the Collier Macmillan English Program prepared by the Materials Development Staff of English Language Services, Inc., under the co-direction of Edwin T. Cornelius, Jr., and Willard D. Sheeler. Oliver Rice served as Project Editor, assisted by George Sheldon. Technical content was provided by F. A. Coffman, formerly Principal Agronomist of the United States Department of Agriculture.

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LESSON 1

GENERAL DISCUSSION

A. Dialogue

Friend: Agriculture means more than the cultivation of fields, doesn't it?

Farm Adviser: Yes. As we use it now, the term covers every aspect of soils, agronomy, horticulture, forestry, and animal husbandry. The study of agriculture also considers the tools and machines used in farm operations, as well as the storage of seeds and plant and animal products on the farm.

Friend: I guess the study of agriculture should begin with the soil.

Farm Adviser: That's right.

Friend: I know that soil is formed partly by the breaking up of rocks. But I suppose there's a lot more to it than that.

Farm Adviser: Oh, yes. The breaking up of rocks forms inorganic material. But soil also contains organic material. This is created by the rotting of plant and animal material, with the help of water, wind, air, temperature changes, and tiny soil organisms.

Friend: I understand that forestry is concerned with trees. But what's the difference between horticulture and agronomy?

Farm Adviser: Well, the basic difference is in the type of area cultivated. Agronomy concerns the crops which are grown in large, open fields, and horticulture those which are grown in smaller, protected areas.

Friend: You mentioned animal husbandry. Does that include poultry?

Farm Adviser: Speaking generally, yes.

第一 课

一 般 讨 论

A. 对 话

朋 友 : 农业并不仅指大田耕作, 不是吗?

农业顾问: 是的。我们现在所说的农业, 包括土壤、农作、园艺、林业和畜牧业等各个方面。研究农业, 还要考虑到耕作机具, 以及农场中的种子和农畜产品的贮藏。

朋 友 : 我想, 研究农业似乎应该从土壤开始。

农业顾问: 说得对。

朋 友 : 我知道土壤部分是由岩石粉碎而成的。但是我想它比这个要复杂得多。

农业顾问: 哦, 说得对, 岩石粉碎后形成无机物质。但是土壤里还含有有机物质。这是由动植物经过水力、风力、空气、温度变化和土壤微生物的作用腐烂而成的。

朋 友 : 就我所知, 林业讲的是树木。但是园艺和农学有什么区别呢?

农业顾问: 嗯, 它们之间的根本区别在于栽培面积的类型。农学是在大面积的露天地上栽培的作物, 而园艺涉及的是那些在得到保护的小块地上栽培的作物。

朋 友 : 你刚才提到畜牧业。不知它包括不包括养禽业?

农业顾问: 一般说来, 包括。

- Friend:* There have been great improvements in farm machinery in recent years, haven't there?
- Farm Adviser:* Definitely. Hand tools were still in general use to cut and thresh grain as late as a century ago, and many implements used today were unknown fifty years ago.

B. Terminology Practice

agriculture: the work of cultivating soil, producing crops, and raising farm animals

Agriculture includes more than the cultivation of fields.

Many millions of people are employed in agriculture.

Do you think agriculture is a good career for a young man?

agronomy: the work of field crop production; the study of this work

The term covers every aspect of agronomy.

Agronomy is a very old science.

His son is studying agronomy at the university.

crop: a plant product of agriculture, such as grain

Agronomy concerns the crops which are grown in large fields.

Grain is a field crop.

This crop should bring in quite a lot of money.

cultivate: to provide better growing conditions for a crop by working the soil

The basic difference is in the type of area cultivated.

This crop has to be cultivated a lot.

What crops do you have under cultivation?

farm: a piece of land (including buildings) on which crops and animals are grown; concerned with the farm, and with the work of raising crops and animals

There have been great improvements in farm machinery.

He has about half his farm under cultivation.

This farm has excellent soil.

field: a large piece of open land fit or used for crops or pasture

Agronomy concerns the crops which are grown in large, open fields.

The field has a wire fence around it.

If you put a fence across the middle, you'll have two fields.

朋友：近年来，农业机械有了很大改进，不是吗？

农业顾问：当然是这样的。一直到一个世纪以前，收割和脱粒谷物还是用手工工具，而现在使用的许多机具，五十年前听都没有听说过。

B. 术语练习

农业：有关土壤耕作、作物生产和家畜饲养的工作

农业所包括的内容并不仅仅是大田耕作。

千百万人从事于农业。

你是否认为农业是年轻人的一种好的事业？

农艺，农学：有关大田农作物生产的工作；有关这方面的研究

这个术语包括农艺的各个方面。

农学是一门古老的科学。

他的儿子正在大学里攻读农学。

作物：农业中的某一种植物，如谷物

农艺所涉及的是大块农田里栽培的作物。

谷物是一种大田作物。

这种作物定能赚一大笔钱。

耕作：为了给作物提供良好生长条件而对土壤进行的工作

根本区别在于栽培面积的类型。

这种作物必须加强耕作。

你都种了些什么作物？

农场，农作：栽培作物和饲养牲畜的一块土地（包括其上的建筑物），

与农场有关的事物，和与种植农作物、饲养牲畜有关的工作

农业机械有了重大的改进。

他把他农场中的约一半的土地用于耕种。

这个农场拥有优良的土壤。

农田：宜于或用于农田或牧场的一大层空旷土地

农艺所涉及的是在大面积的空旷土地上栽培的农作物。

这块农田周围有一铁丝围栏。

如果你从当中隔上一条栅栏，你就会有两块农田了。

forestry: the cultivation of trees and the production of wood for various uses

The term covers every aspect of forestry.

A person who works at forestry is called a forester.

There's not much forestry in that country.

grain: any of several kinds of grass that produces small, hard seeds used for food or oil; the seed itself

Hand tools were still in general use to thresh grain.

Several grains are grown in this area.

The grain will be stored until next spring.

horticulture: the work of producing crops which grow in smaller, protected areas, such as fruits, vegetables, and flowers; the study of this work

The term covers every aspect of horticulture.

Would you advise me to go into horticulture in this area?

Is this a horticultural crop?

husbandry: the work of farming, caring for plants or animals

You mentioned animal husbandry.

Caring for bees is called bee husbandry.

He has made a special study of sheep husbandry.

implement: a tool or machine

Many implements used today were unknown fifty years ago.

This implement is used only once during the year.

What implements are you thinking of buying?

inorganic: composed of material which is not animal or vegetable

The breaking up of rocks forms inorganic material.

Inorganic chemistry is a specialty in science.

The process begins with inorganic material.

organic: composed of animal or vegetable material

Soil also contains organic material.

The organic material is acted upon by temperature changes.

I took a course in organic chemistry.

organism: a living thing

This is created with the help of tiny soil organisms.

What type of organism is that?

These organisms are necessary in the forming of soil.

poultry: domesticated birds usually used for food or for egg production

Does that include poultry?

They have purchased a poultry farm.

His poultry business is not doing very well.

林业：栽培树木和生产各种用途的木材这个术语包括林业的各个方面

一个从事林业工作的人，叫做林业工作者。

那个国家林业不多。

谷物：几种生产可作粮食和榨油用的小硬粒种子的禾本科植物之中的任何一种；这类种子本身

手工工具过去一直为脱粒所普遍采用。

这一地区种有几种谷类作物。

这批谷物要贮藏到来年春季。

园艺，园艺学：在得到保护的小块地里生产农作物（如水果、蔬菜和花卉等）的工作；这类工作的研究

这一术语包括园艺的各个方面。

你是否建议我在这块土地上搞园艺？

这是一种园艺作物吗？

管理（耕作、饲养）：农事活动，照管作物和牲畜

你曾提到畜牧业。

照料蜜蜂叫做养蜂业。

他对养羊业进行了专门研究。

机具：一种工具或机器

今天使用的许多机具在五十年前听也没听说过。

这种机具一年之中只用一次。

你想购进什么机具？

无机的：由非动植物所构成的

岩石粉碎形成无机物。

无机化学是科学中的一个专业。

这一过程首先由无机物开始。

有机的：由动植物所构成的

土壤里也含有有机物。

有机物受温度变化的影响。

我选了一门有机化学课程。

生物体：一种有生命的东西

这是借助于土壤微生物而形成的。

那是哪一类生物体？

土壤的形成离不开这些生物体。

家禽：常用以生产肉和蛋的驯化了的禽类

那包括家禽吗？

他们购置了一个养禽场。

他从事的养禽业景况不佳。

seed: a specialized structure whose development begins in the flower it remains alive but inactive until, under suitable conditions, it begins to grow into a plant; also, a quantity of seeds

It also includes the storage of seeds.

Follow the instructions when planting the seed.

The crop failed because he used poor seed.

soil: the loose surface of parts of the earth in which plants grow

The study of agriculture should begin with the soil.

The soil on their farm is very good.

It takes a very long time for soil to form.

thresh: separate grain from the rest of the plant

Hand tools were still in general use to thresh grain.

They will thresh next week.

Methods of threshing have changed greatly.

C. Check-Up

Match the terms on the left with their definitions on the right.

- | | |
|--------------|--|
| a. organic | 1. the work of raising field crops |
| b. cultivate | 2. separate grain from the rest of the plant |
| c. field | 3. composed of animal or vegetable material |
| d. poultry | 4. a large piece of land |
| e. agronomy | 5. a product of agriculture, such as grain |
| f. implement | 6. the cultivation of trees |
| g. forestry | 7. take care of soil in growing crops |
| h. husbandry | 8. a tool or machine |
| i. thresh | 9. large birds used for food |
| j. crop | 10. the work of caring for plants or animals |

种子：在花中开始发育的一种特化组织，它处于休眠状态，直到有了适宜条件才开始长成植物；也指一定数量的种子。它也包括种子贮藏。

按照技术指导进行播种。

由于使用劣等种子而糟蹋了庄稼。

土壤，生长作物的地球各部分的疏松表面

研究农业应从土壤开始。

他们农场里的土壤很好。

土壤的形成经历了漫长的时间。

脱粒，把谷粒从农作物的其他部分脱离开来

手工工具过去一直为脱粒所普遍采用。

他们下星期进行脱粒。

脱粒的方法发生了巨大的变化。

C. 练习（略）

LESSON 2

MAJOR SOIL TYPES

A. Dialogue

Dr. Jones: Mr. Schwartz, I understand that you have come to the United States to do graduate study in soils and the methods of soil tillage.

Mr. Schwartz: That's right, sir.

Dr. Jones: Well, I'm sure we'll all profit from an exchange of ideas. Actually, we have the same broad soil groups in Eurasia and in North America.

Mr. Schwartz: That's what I was taught. As I understand it, these groups are the result of differences in vegetative growth, such as the tundra soils in the arctic regions and the podzolic soils of the forested areas in the humid temperate zones.

Dr. Jones: That's quite right. There are six major soil types. Among the more important are the chernozemic soils, which are found in subhumid and temperate zones where grass originally covered the surface of the soil.

Mr. Schwartz: And don't we also speak of desertic soils?

Dr. Jones: Yes. Desertic soils are sparsely covered with shrubs and grass. So are the arid regions in tropical and temperate zones.

Mr. Schwartz: I also remember that there are latosolic soils. Aren't these usually found in areas covered with forests?

Dr. Jones: That's true. They exist in both tropical and subtropical zones.

Mr. Schwartz: In Europe, you know, we use the mountainsides a great deal in farming. I believe these soils are made up of one or more of the types we've mentioned, depending on the elevation and the latitude.

第二课

土壤主要类型

A. 对话

琼斯博士：斯华兹先生，我得知您是来美国进修土壤和土壤耕作方法的。

斯华兹先生：是的，先生。

琼斯博士：那很好，互相交换意见，对彼此肯定都是有益的。实际上，我们在欧亚大陆和北美，都有相同的广土类。

斯华兹先生：这正是我过去学过的。据我所知，这些土类是由不同的植被形成的，例如北极的冰沼土类和湿润温带森林地区的灰化土类。

琼斯博士：说得很对。土类主要有六种。其中比较重要的有黑钙土，这类土可以在半湿润温带找到，那里土表原来是由杂草覆盖的。

斯华兹先生：我们也要谈谈荒漠土不是吗？

琼斯博士：是的。荒漠土上稀稀疏疏地生长着灌木和杂草。热带和温带的干旱地区也是这样的。

斯华兹先生：我记得还有红砖土。它们是不是经常可以在森林覆盖地区找到？

琼斯博士：是这样的。它们存在于热带和亚热带。

斯华兹先生：您知道在欧洲有许多山坡都耕种了。我相信这些土壤是由我们提到的某一种或某几种土类构成的。这种构成随着海拔和纬度而不同。

Dr. Jones: Yes, they do vary. Most of these soil types are also found in South America and in Africa. However, Africa has no tundra soils, and South America has no podzolic.

B. Terminology Practice

arid: very dry

The arid regions in tropic and temperate zones have sparse vegetation.

This crop does not grow in arid regions.

The area often has arid summers.

chernozemic: a type of soil found in subhumid and temperate zones where grass originally covered the surface of the soil

Among the more important are the chernozemic soils.

This area contains mostly chernozemic soils.

Chernozemic soils are excellent for this purpose.

desertic: a type of soil sparsely covered with shrubs and grass

And don't we speak of desertic soils?

You don't find this plant where there are desertic soils,

What can you do to improve desertic soils?

humid: wet

Podzolic soils are found in humid temperate zones.

Tropical forests are often humid.

This crop requires a more humid climate.

latosolic: a type of soil found mostly in areas of high temperature and rainfall

I also remember that there are latosolic soils.

Latosolic soils occur in many tropical regions.

In this region, latosolic soils are more frequent.

podzolic: a type of soil found in most forests in areas of cool or temperate climate

Podzolic soils are found in the humid temperate zones.

There are few areas of podzolic soil on this continent.

Podzolic soils are not very rich.

琼斯博士：是的，它们是有差异的。这些土类中的大部分也可以在
南美洲和非洲找到。然而，非洲没有冰沼土，而南美洲
则没有灰化土。

B. 术语练习

干旱的：很干燥的

热带和温带的干旱地区具有稀疏的植被。

干旱地区不长这种作物。

这个地区的夏季住在干旱。

黑钙土：在半湿润温带地区可以找到的原来长满杂草的一种土类

在比较重要的土类中有黑钙土。

这个地区大部分都是黑钙土。

黑钙土最适于派这个用场。

荒漠土：覆盖着稀疏的灌木和杂草的一种土类

我们不来谈谈荒漠土吗？

在有荒漠土的地方你找不到这种作物。

有什么办法来改良荒漠土？

湿润：潮湿

灰化土可在湿润温带找到。

热带森林通常是湿润的。

这种作物要求一种更湿润的气候。

红砖土：大多出现于高温多雨地区的一种土类

我记得还有红砖土。

红砖土发生在许多热带地区。

这一地区更常见的是红砖土。

灰化土：冷凉或温暖气候地区中潮湿森林里的一种土类

灰化土可在湿润温带找到。

本大陆很少有灰化土区。

灰化土不很肥沃。