

ed Adam's cup, in reference to the cup of the leaf. The name of the genus *Sarracenia*, is derived from Mons. Sarrasin, a French physician, who wrote about the natural history of Canada. No foreign plant, as an object of curiosity, can exceed this native of our own swamps; it is well worth the trouble of cultivation by those who are fond of collecting rare plants.

595. The White Pond Lily, is a splendid American plant, very fragrant and with a larger leaf than almost any other northern plant. The Yellow Pond Lily, though less showy, is equally curious in its structure.

The Poppy is a plant which may be found in almost every garden; it is a good example of this class. It affords a juice, which on being dried becomes opium.

596. In the same class and order is the Tea plant, (THEA;) of this there are two species, the bohea tea (*bohea*) and the green tea (*viridis*.) It is a small evergreen tree or shrub, much branched, and covered with a rough, dark coloured bark. The flowers are white, the leaves are lanceolate and veined, the capsule or seed vessel is three celled, it has three seeds, oblong and brown. This shrub is a native of China and Japan. Some suppose, that in reality, all the teas are taken from the same botanical species, and that the different flavour and appearance of them depend upon the nature of the soil, the culture, and the method of preparing the leaves.

597. Having mentioned under the first twelve classes some of the most important plants which belong to them, I shall not attempt to go farther at present; if you collect flowers, and prepare herbariums according to the directions given in the former part of this book, you will soon have some specimens of the 21 classes;—if you love Botany, you will not wait for your parents, and instructors to ask you to collect and study plants, but will seek every suitable opportunity for so doing. How delightful is the sight of a class of young pupils, engaged in examining flowers, each anxious to be the first to discover to what class and order they belong; and yet glad to have others succeed, where they find difficulties;—For true it is that a real and sincere love of knowledge, serves to render the disposition more amiable;—and it is for this purpose, and for the sake of leading your hearts to commune with your Maker by rendering you familiar with His works, that the friend who has laboured to prepare this book, is so anxious that you may learn to read and admire the great volume of nature, of which God is the Author.

595. What is said of the Pond Lilies?

596. Give an account of the Tea plant.

597. Why is the person who wrote this book, anxious that young persons should study the works of God?

EXERCISES IN PRACTICAL BOTANY

The following descriptions of Genera and Species have been selected from "Familiar Lectures on Botany," for the purpose of furnishing to the Beginner a series of Practical Exercises. Care has been taken to introduce such plants as Teachers can easily procure from the gardens and fields for their classes and which are the most simple for analysis.

DIRECTIONS FOR PRONOUNCING THE NAMES OF PLANTS.

BOTANICAL names of plants are formed according to the analogies of the ancient languages, chiefly the Latin. Some of the most common terminations of names of Genera and Species are *a*, *um*, *us*, and *is*; for example, the generic names, GERARDIA, TRIFOLIUM, PRUNUS, and IRIS; and the specific names *virginica*, *candidum*, *blandus*, and *officinalis*. A great proportion of Botanical names terminate in *a*, in which case it has the sound of *a* in father, as *Rosa*, *Viola*, &c.

The letter *e* at the end of a word is always to be sounded for example, *Anemone*, pronounced *anem'-o-ne*.

The *e* is long before *s* when it ends a word, as *Bicorn' nes* pronounced *Bicorn' nes*.

In words that end in *ides*, the *i* is long, as in *Hesper' ides*.

The vowels *ae* and *oe*, are often used as diphthongs, and then have the sound of *e*, as *Hepatica*, pronounced *Hepat'-i-ce*, and *Di-acia*, pronounced *Di-e-cia*.

C and *g*, as in English, are soft before *e*, *i*, and *y*, and hard before *a*, *o*, and *u*. The soft sound of *c*, is like *s*, the hard sound like *k*. The soft sound of *g*, is like *j*, the hard sound like *g*, in the word *gave*; thus *Algae* is pronounced *Alje*. *Musci* is pronounced *Mussi*.

The letters *ch*, are hard like *k*, as in *Orchis*; pronounced *Or-kis*.

Explanation of Letters and Characters.

The letter *o*, when affixed to the specific description, stands for the Latin *omnibus locis*, in all places, meaning that the plant is common; *r* denotes that the colour of the flower is red. *p*. purple—*y*. yellow—*w*. white—*b*. blue—*g*. green—*Ap*. denotes that the flower blossoms in April—*M*. May—*J*. June—*Ju*. July—*Au*. August—*S*. September—*Oc*. October—*Var*. stands for *Variety*.

The following characters denote the duration of a plant.

⊙ annual—♂ biennial—2 perennial—h woody.

Accent and quantity.

The marks over the generic and specific names have reference not only to the syllable which is to be accented, but to the quantity of the vowel in the accented syllable, as either long or short.

Those syllables over which the single mark is placed have the vowel pronounced long, as in *Fra-ga-ri-a*; those over which the double mark is placed, have the vowel pronounced short, as in *He-pat'-i-ca*; in the latter case, the stress of voice seems thrown upon the consonant; the two marks may, therefore, be considered as indicating that the consonant, as well as vowel, is accented.

The general rule respecting words of two syllables is simple, and renders it unnecessary to prefix to such words the marks for accent and quantity.

Words of two syllables always have the accent on the first, if the syllable end with a vowel it is long, as in *Cro'-cus*; if it end with a consonant it is short, as in *Cac''-tus*.

NOTE—It would be well for the teacher to request the pupil to commit to memory the directions for pronouncing the name of plants—the signification of the letters—and to observe particularly the marks used to point out accent and quantity.

DESCRIPTION OF GENERA OF PLANTS.

CLASS I. MONANDRIA. *One Stamen.*

Order 1. *Monogynia. One pistil.*

SALICOR'NIA. Calyx inflated, entire, 3 or 4-sided, obconic; corolla 0; style 2-cleft; seed 1, enclosed in the calyx.—(sapphire.)

Order 2. *Digynia. Two pistils.*

BLIT'UM. Calyx 3-cleft, or 3-parted, berry-like; corolla 0; seed 1, immersed in the calyx.—(blite.)

CLASS II. DIANDRIA. *Two Stamens.*

Order 1. *Monogynia. One pistil.*

A. *Corolla 1-petaled, inferior, regular; seeds in a drupe or nut.*

CHIONAN'THUS. Calyx 4-parted; corolla 4-parted, with very long divisions: nucleus of the drupe, striate-fibrous.—(fringe-tree.)*

Exotic.

JAS'MINUM. Corolla salver-form, 5 to 8 cleft: berry 2-seeded, each seed solitary, arilled.—(jasmine.)

SYRIN'GA. Corolla salver-form: capsule 2-celled.—(lilac.)

B. *Corolla 1-petaled, inferior, irregular; seeds in capsules.*

VERON'ICA. Calyx 4-parted: corolla cleft into 4 lobes, lower division smaller: capsule obcordate, few-seeded, 2-celled.—(speedwell.)

CATAL'PA. Corolla 4 or 5-cleft, somewhat inflated, bell-form: calyx 2-parted or 2-leaved: stigma 2-lipped: capsule cylindrical, 2-celled.—(catalpa tree.)

C. *Corolla 1-petaled, inferior, irregular; seeds naked.*

MONAR'DA. Calyx cylindrical, striated, 5 toothed: corolla ringent tubular.—(Oswego tea, mountain mint.)

SAL'VIA. Calyx tubular, striated, 2-lipped, under lip 2 to 3-toothed, lower lip 2-cleft: corolla ringent, upper lip concave, lower lip broad, three-lobed, the middle lobe the largest, notched: stamens with two spreading branches, one of which bears a one-celled anther; germ four

* This is an exotic in our region, but grows wild in the southern states.