

V. *A Botanical Description of the Flower and Seed-Vessel of the Plant, called Crocus Autumnalis Sativus, that produces the true English Saffron of the Shops: With a Figure.* By Dr. James Douglas, *Honorary Fellow of the College of Physicians, and Fellow of the Royal Society.*

THE Flower of this curious Plant is of the Lily Kind, monopetalous, infundibuliformis, without any *Calyx* or *Perianthium*, its long fistulous Beginning being afterwards expanded into six beautiful oblong Segments. *Vid. Lit. A. A. Fig. 6.*

It consists of the following Parts, *viz.* the *Petalum*, the *Stamina*, the *Apices*, the *Ovarium*, and the *Stylus*; with its *Capillamenta Tubiformia*, of all which in Order.

P E T A L O N.

The *Petalum* is distinguished into a long, hollow, or fistulous Part, which lies inclosed within the common and proper *Involucra* of the Plant, arising from the Top of the *Ovarium*, or *Seed-Vessel*, and six Segments. *Vid. Lit. a. a.*

While this narrow, tubulous Part runs between the Leaves and Integuments that surround them, it is of a white Colour; but, as soon as it is disengaged from these, it insensibly acquires a Purple Colour, which, a little before its Division, as it begins to be enlarged, and grow more open, inclines to a Red.

Y y y

This

This narrow fistulous Part of the Flower, about 1 or 2 Inches above the *Theca Communis*, forms six foliaceous Segments, or divides into so many oblong Purple-colour'd *Petala*. *Vid. Lit. b. c.*

Three of these Flower-Leaves are larger than the other three, but, in all other Respects, are much alike. *Vid. Lit. c. c. c.*

The Length of the largest is from $1 \frac{1}{2}$, to 2 Inches; the Breadth seldom above $\frac{1}{2}$ Inch: The shorter Leaves are from 1, to $1 \frac{1}{4}$ Inch in Length, their Breadth being something less in Proportion.

The Inside of each *Petalum* is of a Violet Purple-Colour, vein'd with a few small Lines of a deeper Dye, running length-ways, intermixed with White, or the whole is beautifully checquered with Blue and White Colours.

The Outside is of a whiter Blue, with several whitish Risings or Ridges, and just at the Bottom of the Leaf it is of a deeper Blue; the three small Leaves (*Vid. Lit. b. b. b.*) are much of the same Colour, only the Purple seems to be something deeper.

The Number of the *Petala* is, for the most Part, 6; yet, in some Flowers we may observe 7, or 8; but then they are not so large as when they are fewer.

S T A M I N A.

In every Flower there are three *Stamina*, or Chives, (*Vid. Lit. d. d. d.*) properly so called, arising from the inner Surface of the tubular Part of the Flower, just before its Division into the *Petala*, where they make, for some Space, an-apparent Ridge, and then they stand

upright, opposite to the three large Leaves; they are of a whitish Colour, inclining to a light Purple, being but little above $\frac{1}{4}$ of an Inch in Length.

In those Plants that have 7 or more *Petala*, the Number of the *Stamina* is likewise encreased to 5, or more.

A P I C E S.

Each of these *Stamina* has its proper *Apex*, (*Vid. Lit. e. e. e.*) which is a peculiar longish Substance, standing upright, opposite to the larger Flower-Leaves, of a Yellow Colour, forked, not unlike the Tongue of a small Bird, at the lower End, where it is fixed to the *Stamen*; here likewise it is broadest, but as it ascends it becomes narrower, and its upper Extremity is a little crooked, or turned to one Side: It seldom exceeds $\frac{1}{2}$ Inch in Length.

It appears as if it was double, with a longitudinal Furrow in the middle, in which Hollow the *Stamen* seems to be faintly continued for some Space.

When the Plant is full grown, they are all loaded with that Kind of small Dust called *Farina fecundans*.

O V A R I U M.

Called likewise the *Vasculum Seminale*, and *Pistillum* by some. *Vid. Lit. f. f.*

It is a particular Body, which arises from the Top of the *Pedunculus*, (*Vid. Lit. g.*) about $\frac{1}{4}$ of an Inch long, or a little more, of a deep White Colour, three cornered, and divided into three *Loculamenta*, or *Capsula*, in which the Seeds (which however seldom come

Y y 2

to

to Perfection with us) are formed, growing bigger and bigger after the Flower falls off; nay, even in this blooming State, if you cut this Vessel across the middle, you may perceive the whitish Rudiments of the Seeds.

S T Y L U S.

From the upper Part, or *Apex*, of the *Ovarium*, arises the *Stylus*, (*Vid. Lit. b.*) which is a long slender Tube, that lies enclosed within the tubulous or fistular Portion of the Flower, being there of a whitish Colour, but changing into a Yellow before its Division.

This Stylet ordinarily splits into 3 Parts, just opposite to the Top of the *Stamina*, where the *Apices* take their Rise, (*Vid. Lit. i, i, i.*) and thus far it stands upright in the Middle of the *Stamina*; for the sake of which only, this Plant is cultivated, and being prepared, (as shall hereafter be described) makes the true Saffron of the Shops, which we so frequently use in Physick.

I call these Parts of the *Stylus*, from their Figure and Shape, *Capillamenta Tubiformia*, or, *Appendices Styli Salpingoeides*, in as much as they very exactly represent a Trumpet, and are not unlike the *Fallopian Tube* in Women, being narrow at their Origin, and growing gradually larger towards their other Extremity; which, like the common Trumpet, is open and expanded; and, like the *Tubæ Fallopii*, is jagged, or fringed at the Edge. *Vid. Lit. k, k, k.*

It may also be very fitly named *Crocus officinarum*, because that is the Part only that is used in the Shops.

They are of a Yellow Colour, just at their Beginning, continued from the upper Part of the *Stylus*, but
af-

afterwards they are all of a deep Red Colour, only their jagged Extremities are tipped with a White inclining to a Yellow.

These *Tubæ*, or *Capillamenta*, are from 1, to 1 $\frac{1}{2}$ Inch in Length.

The *Stylus*, while undivided, is strong enough to support itself, being enclosed within the tubular Part of the Flower; but the *Capillamenta* being very weak and slender at their Beginning, this occasions them to hang down between the *Petala*.

F I G U R E 6.

Represents a Root of the Saffron-Plant, that has two Stalks enclosed in one common *Vagina*, the whole Flower with the *Stamina* and *Apices* in one, and the *Stylus* only in the other; with the *Leaves*, *Pedunculi*, and *Ovarium* in both, being fairly delineated from the Life.

- A A.* The Flower expanded into six beautiful Segments.
- a a.* The Fistulous Part of the Flower.
- b. c.* The six Petala.
- c. c. c.* The three larger Petala.
- b. b. b.* The three smaller ones.
- d. d.* The three Stamina, or Chives.
- e. e. e.* The three Apices.
- f. f.* The Vasculum Seminale.
- g. g.* The Pedunculi.
- b. b.* The Stylus.
- i. i. i.* The three Capillamenta Tubiformia.
- k. k. k.* The jagged Extremity of the Capillamenta.
- B. B.* The Root.
- C. C.* The Grassy Leaves.

