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Victoria and Paradise Nurseries, Upper Holloway, was opened yesterday (Wednesday), and will be continued until June 25th. The large span-roof house, 100 feet long by 22 feet wide, is devoted to the Orchids, which are tastefully arranged with foliage plants, and comprise a number of rare and beautiful species and varieties. There are, as usual, many other attractions in the nursery at the present time. We learn that Mr. B. S. Williams has been awarded two gold medals and prize of honour for collection of Orchids, new and rare plants, Cyclamen, *Amaryllis*, *Imantophyllums*, books, &c., exhibited by him at the Dresden International Horticultural Show, which was opened on the 7th inst.

— BY the accident of inserting the figure 8 instead of 3 in our reference to MR. SIMPSON'S WATERPROOF LABELS on page 354 last week, these labels are represented as being 8 inches long. Their length is 3 inches—a much more convenient size for use in gardens.

— LEWISHAM AND DISTRICT FLORAL SOCIETY.—The usual quarterly meeting of this Society took place on Friday evening last, when an excellent paper on the cultivation of the "Zonal Pelargonium" was read by Mr. Bryant in the absence of Mr. T. W. Sanders. Mr. Sanders dealt with his subject in masterly style, and treated fully on the culture of the plant from the cutting and seed to the exhibition table. At the close of the paper a discussion ensued, in which Messrs. Jupp, Drake, Needs, and Nunn took part. An additional interest attached to the meeting in the shape of a highly creditable display of plants and flowers exhibited by the members. Notably among these was a fine group put up by Mr. Needs of Catford, consisting of Zonal Pelargoniums, *Cinerarias*, *Spiraeas*, *Arum*, *Lilies*, tree *Carnations*, and foliage plants. Mr. Searle showed some very pretty *Cinerarias*, *Azaleas*, together with some neat little foliage *Begonias*. Mr. Drake, the indefatigable Hon. Secretary, was represented by some good specimens of *Azaleas* very fully flowered, his plant of *Ceres* being specially fine. Messrs. H. Cannell & Sons of Swanley showed some splendid trusses of Zonal Pelargoniums and remarkable spikes of *Mignonette*, as well as beautiful blooms of the *Pride of Penhurst*, yellow *Carnation*. Votes of thanks were accorded to the various exhibitors, also to Mr. Sanders for his paper.

— "THE rich FLORA OF THE PHILIPPINE ISLANDS has hitherto been most imperfectly known," says *Nature*, "in fact it has been practically only represented in European herbaria by the collections of Cuming, which, though rich, were made in a limited area. It was only therefore to be expected that the explorations made by Dr. Sebastian Vidal, of Soler, director of the Botanic Garden at Manila, and of the Commission for studying the forest flora, would add to our knowledge a profusion of new and interesting species. Dr. Vidal has on two occasions visited Kew with his collections, which have quite realised the expectations that had been formed of them. There was some reason to fear that the work might, on financial grounds, have to be interrupted. But from a communication made to Kew by the Spanish Minister, we are glad to learn 'that although the Botanical Survey Commission intrusted to Dr. Sebastian Vidal had been at one time suppressed in the Budget of 1887-88, it was afterwards re-established in view of the great importance of the work.'"

— AMONGST the fifteen candidates nominated for election as Fellows of the ROYAL SOCIETY on June 9th, the two following are well-known botanists and naturalists:—George King, M.B., F.L.S., superintendent of the Royal Botanical Gardens, Calcutta, and of the Government *Cinchona* plantations of Darjeeling; formerly superintendent of the Botanical Gardens of Saharunpur; author of "Notes on the Lion of Aboo" (*Proc. Asiat. Soc. Beng.*, 1868); "On the Birds of the Goona District" (*Journ. Asiat. Soc. Beng.*, 1868); "Notes on the Vegetable Products and Farm Foods of Rajpootana and Marwan"; "Observations on the genus *Ficus*, and on the Fertilisation of *F. hispida*"; "A Monograph of Indian *Fici*" (in course of publication). Eminent as an Indian botanist and quinologist, and for the services he has rendered to botanists and naturalists in India. Sir John Kirk, G.C.M.G., M.D., F.L.S.; H.M. Agent and Consul-General, Zanzibar; chief officer and naturalist of Dr. Livingstone's Government expedition to the Zambesi, Nyassa Country (1858-63), during which he made large collections, observations, and drawings of great scientific value; author of numerous contributions to the botany, zoology, and geography of Eastern Tropical Africa, published in the Journals of the Linnean and Zoological Societies, the "Ibis," &c. During Sir John Kirk's residence of nearly twenty

years in Zanzibar he has rendered most important services to the various expeditions despatched by English and foreign Governments and by private bodies for the exploration of Central Africa, directing their routes, superintending their equipments, and encouraging them in the formation and transmission of zoological, botanical, and ethnological collections.

— It is stated in a recent issue of *Le Jardin* that during fêtes of the Battle of Flowers at Nice this year, about 80,000 francs were expended in flowers in two days, chiefly Roses (*Safrano* and *Comte Bobrinsky*), *Chrysanthemum Etoile d'Or*, *Anemones*, *Wallflowers*, *Roman Hyacinths*, *Jonquils*, *Pinks*, *Violets*, and *Acacia dealbata*. The decoration of one *Victoria* required 1500 dozens of *Jonquil* flowers and 300 dozen bunches of artificial *Cherries*. On the 1st of January this year there arrived at the Halles in Paris from Nice 18 millions of *Roses*, 1,200,000 *Camellias*, and 15,000 trusses of *Lilac*.



ORCHIDS AT CAMBRIDGE LODGE.

IF there are any lingering doubts that Orchids can be successfully grown in the metropolitan district they would be effectually dispelled by a visit to the celebrated collection in the possession of R. J. Measures, Esq., Cambridge Lodge, Camberwell, which is remarkable not only for the number of rare, valuable, and beautiful forms it contains, but also for the fresh vigorous health of the plants, so well grown by the gardener, Mr. Simpkins. The garden is within three miles of Charing Cross, and is, we believe, the most centrally situated collection of Orchids in London, where fogs and smoke are far too abundant to be agreeable. Nearly the whole of the available space is covered with well-built and well-designed houses, of which no less than sixteen are exclusively devoted to Orchids, and it is becoming difficult to accommodate the frequent additions being made to the collection. Mr. Measures has not filled his houses with common species or varieties, but has made a most careful selection of the rarest obtainable, the value of which in many instances is increasing annually; and especially is this the case with the hybrid *Cypripediums* and others like the celebrated *C. Stonei platytanum*. *Cypripediums* are indeed a speciality at Cambridge Lodge, for the collection now comprises 235 species, hybrids and varieties, some of the better known being represented by exceptionally large handsome specimens, while all are distinguished by their fine condition. One house devoted to *Cypripediums* in flower was very attractive at the time of our visit, the plants being arranged with Ferns and a few light graceful Palms like *Cocos Weddelliana*. The house is a small one, span-roofed, and not much more than 12 feet square, with a side stage extending from the door round the house and projecting in the centre opposite the door, where a beautiful bank is formed. Amongst those in flower were *C. lævigatum*; *Dauthieri*; *Warneri* and variety *biflorum*; *Harrisianum*; *caudatum* and the varieties *Warszewiczii* and *roseum*; *callosum*; *barbatum pulcherrimum*; a very interesting plant, apparently a natural hybrid between *Hookeri* and *hirsutissimum*, the leaves resembling the former and the flowers the latter; *Boxalli atrata*, a handsome plant of this richly coloured dark variety; *calurum superbum*, beautifully coloured; *Curtisi*; *euryndum* with six fine flowers; *Argus*; *Hookeri* and the light variety *Bullerianum*; *niveum*, and the rare variety *punctatissimum*; *vernixium*; *Lowi*; *Boxalli superba*; *callosum*; *ciliolare*, a very handsome variety of this fine *Cypripedium*; *insigne sylhetense*, the summer-flowering variety of *insigne*; *barbatum*, a grand variety like one of the best *Lawrencianums*; *tonsum*; *Argus mosaica* with large flowers and richly spotted petals; *Pearcei*; *superciliare*; *Warneri*; and *Swannianum*. Most of these were flowering freely, and in other houses were more plants, the principal collection containing the rarities being in a long house in another portion of the gardens; and there is a large plant of *C. Wallisi* with three spikes, one of which produced three flower buds, one has two buds, and the third has one; when the flowers are expanded the plant will be remarkably handsome. There are scores of other rare and beautiful plants, but two deserve special notice; these are *Cypripedium Cambridgeanum* and *C. Ernestianum*, which are represented in figs. 66 and 67. These are imported plants, and have flowered for the first time this year. *C. Cambridgeanum* was imported by Messrs. Hugh Low & Co., Clapton, and flowered last March. It is very suggestive of *C. oenanthem* both in shape and colouring, the dorsal sepal being particularly beautiful, heavily veined, with dark crimson and a slight white margin, the lip greenish with a purple tinge, and the petals similar but darker, and with a slight fringe of hairs near the base. *C. Ernestianum* is a very striking form of the *Dayanum* type, which was introduced by Messrs. Shuttleworth & Carder, and flowered last February. The dorsal sepal is of elegant shape, white distinctly veined with bright green, the petals tinged with green at the base, veined with pale crimson, white at the tip,

and margined with slight purplish hairs. The lip is long, green, marbled with a darker shade, tending to yellowish brown, the throat near the staminode being dotted with rose. It is a bold handsome form, and if it be regarded as a variety of *C. Dayanum* it is quite distinct from the ordinary types, and superior to the majority.

The houses, which are filled with so many other orchidic treasures, are all well constructed and admirably adapted for the culture of these plants. The details of arrangement inside with regard to stages, supply of water, &c., have been carefully considered and judiciously carried out. In the majority the side stages are formed of an iron framework and supports, with cross pieces of T iron, about 9 inches apart, supporting slabs of Portland cement. Upon this is spread a layer of fine coal, which has been preferable to several other materials employed in a similar way, retaining moisture and not providing a harbour for insects or encouraging the growth of *confervæ*. In several cases a small water pipe is taken along beneath the stage, a short pipe with a tap passing through it in a convenient position, so that the shelves can be readily flooded with water at any time. This is a great advantage, saving much labour and rendering it easy to have a constant moisture rising beneath the plants, which adds greatly to their health. Tanks are provided under

The collection of *Masdevallias* is a full one, comprising fifty-four distinct forms, and including plants of such valuable types as *Normani* and *Bulls' Blood* with the best of all the others obtainable. *Phalaenopsis*, *Chysis bractescens*, *Saccolabiums*, and the beautiful *Phaius tuberculatus* are found in another structure. The *Chysis* is evidently quite at home, the principal point in its treatment being a season of three or four months thorough rest. That it appreciates this is evident, for some of them have spikes with ten flowers, others with eight. The *Phaius* has also been exceptionally good, the plant having this season borne a raceme of ten flowers. In the *Dendrobium* house is a good general collection, together with several exceptional specimens, one of which is *D. Griffithianum* with 300 pseudo-bulbs, no doubt the grandest plant in cultivation and the value of which would run into three figures. This specimen has nine racemes showing, and another but slightly smaller has six. *Brymerianum*, *Schröderi*, *fimbriatum oculatum*, *suavissimum Cambridgeanum*, *alto sanguineum*, *crassinode*, and *Wardianum* are all well represented.

The *Cattleya* house, about 70 long, contains a most valuable collection of the best *Cattleyas* and *Lælias*, the mere enumeration of which would fill a small volume, and it must suffice to say that they include several

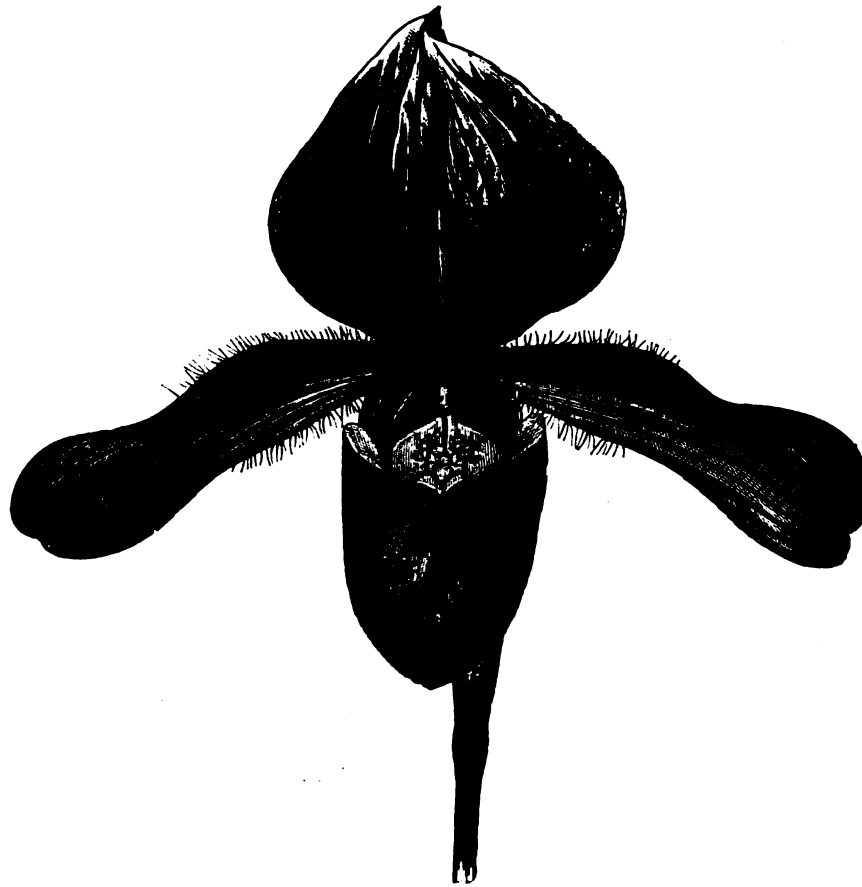


Fig. 66.—*CYPRIPEDIUM CAMBRIDGEANUM*.

all the stages at the sides of the walks, and as much rain water as possible is caught and used almost exclusively for supplying the plants, and to this some portion of the success of the plants is attributed, the beneficial results being also evident in the fresh bright green appearance of the sphagnum used in surfacing, especially in the cool houses. In some open lattice stages are employed, but the others, which were constructed on the design of Mr. Ernest Measures, are much better suited to the plants. Light hexagon netting blinds are employed for the roofs of the houses, while for the sides where much exposed similar material nailed on light frames a few feet square and easily secured by small bolts top and bottom have proved very useful. Indeed, one of the notable features of the garden is the prevailing neatness and thoughtfulness manifested in the most minor details, all of which, however, conduce to the success achieved.

It would be impossible to give a full description of this collection in one notice, and we hope to revert to it again, but a few words will serve to show its general character. The *Cymbidium* house contains some grand specimens of *Cymbidium Lowianum*, one of which has six racemes with nineteen to twenty-three flowers each, the variety a highly coloured one, the lip being especially rich. *Aerides* and *Vandas* of the choicest species and varieties have a house devoted to them, the former comprising thirty or forty forms. Of the best *Ceologyne cristata* varieties there are some large plants, one of *C. cristata alba* being one of the best we have seen.

specimens exceeding 100 guineas in value, and all are distinguished by most robust health. Then, too, in the *Odontoglossum* house is a collection which would alone render a garden noted, and there are several other houses similarly well occupied. Altogether Mr. Measures has every reason to be proud of his Orchids and their fine healthy condition.—L. CASTLE.

THE SALE OF ORCHIDS AT DOWNSIDE.

THE sale of surplus plants in Mr. W. Lee's collection at Downside, Leatherhead, attracted a large number of orchidists on Tuesday and Wednesday, May 3rd and 4th, the prices realised being astonishingly high, and proved how well the value of the best and rarest Orchids is maintained. The sale was conducted by Messrs. Protheroe & Morris, and the principal purchasers were Baron Schröder, Sir Trevor Lawrence, A. H. Smee, Esq., Sidney Courtauld, Esq., R. J. Measures, Esq., R. H. Measures, Esq., with Messrs. J. Veitch & Sons, B. S. Williams, J. Sander, W. Thomson, Ireland & Thomson, Thibaut & Keteleer, Vervaeke, and Jules Hye. The great sensation was the plant of *Cypripedium Stonei platytenium*, which was sold to Baron Schröder for 310 guineas, the highest sum ever paid for one Orchid. The total amount realised in the two days' sale was nearly £6000.

The following are some of the principal plants, with the prices obtained:—

Cattleya Trianae var. *Atalanta*, fine strong plant, twenty bulbs, four

leads, from the Brentham collection; not the same as described in Mr. B. S. Williams' Manual, but finer; £23 2s. *Cattleya Trianae Percivaliana*, fine healthy specimen covered with foliage, one of the very best varieties, with over 200 bulbs and thirty leads; £26 5s. *Laelia elegans* var. *alba*, large plant in teak basket, 26 inches by 21 inches, grand specimen, from Mr. F. Sander; £42. *Masdevallia*, the original Bull's Blood, part of the plant certificated at the Botanic Gardens, Regent's Park, May 8th, 1873, and then called *Denisoniana*; a superb variety; £32 11s. *Cattleya Trianae* var. *eboracensis*, thirteen bulbs, three leads, from Messrs. Backhouse; £42. *Cattleya Trianae Dayana*, twelve bulbs, two leads, splendid variety, named in honour of Mr. John Day; £56 14s. *Masdevallia Normanni*, considered by some to be finer than Bull's Blood; £27 6s. *Cattleya Trianae Emperor*, thirteen bulbs, two leads; £46 4s. *Cattleya Trianae Colemanii*, twelve bulbs, two leads, the finest *Trianae* in the late Mr. Coleman's collection of

dark variety; part of the plant figured in Mr. B. S. Williams' "Album," vol. iv., plate 187. This variety is very scarce. From Messrs. J. Veitch and Sons; £52 10s. *Cypripedium Morganiae*, eleven growths, grand specimen, showing flower spikes; Messrs. J. Veitch & Sons' hybrid *C. Veitchi* x *C. Stonei*; the finest of all hybrid *Cypripediums*, from Messrs. Veitch; £178 10s. *Cattleya Trianae Emiliae*, thirty-seven bulbs, nine leads, fine plant, charming variety; £32 11s. *Coelogyne cristata* *alba*, twelve leads; the flowers this year exceeded in size every other *cristata*; from Mr. Wm. Bull; £57 15s. *Cattleya Trianae Osmani*, six bulbs, one lead, part of Mr. Dodgson's celebrated plant; £94 10s. *Cattleya Trianae Lecana*, thirteen bulbs, two leads; £199 10s. *Oncidium superbiens*, strong plant, in 11-inch pot, figured in "Album," vol. vi., plate 276; £23 2s. *Cypripedium oenanthem superbum*, Messrs. J. Veitch & Sons' hybrid *Harrisianum* x *insigne Maulei*, Veitch's special variety, figured in "Lindenia," vol. i., plate 33, from Messrs. Veitch;

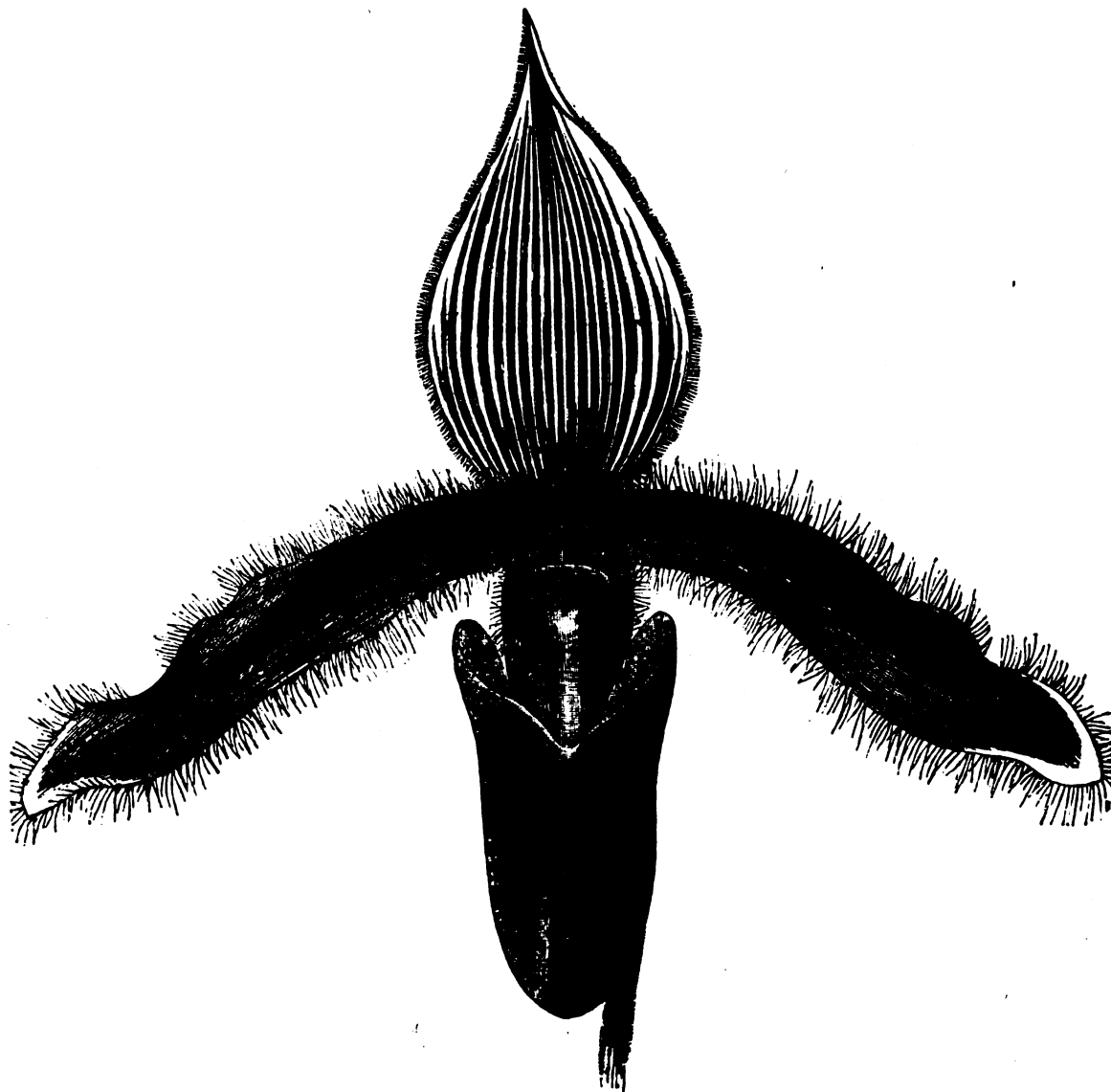


Fig. 67.—CYPRIPIEDIUM ERNESTIANUM.

Stoke Park; £24 3s. *Laelia elegans Wolstenholmiae*, seven bulbs, one lead, fine plant, figured in Mr. Warner's "Select Orchids," part 2, plate 29; from Mr. Day's sale; £42. *Cattleya Skinneri oculata*, splendid specimen in basket, 30 inches by 30 inches. 314 bulbs and 60 leads; exhibited in splendid condition at the Orchid Conference, 1885; £73 10s. *Cattleya Amesiana*, six bulbs, one lead; Messrs. J. Veitch & Sons' hybrid *crispa* x *maxima*, a splendid rival of *Cattleya exoniensis*, figured in "Orchid Album," vol. vi., plate 253, from Messrs. J. Veitch & Sons; £68 5s. *Cypripedium microchilum*, five growths, Messrs. J. Veitch and Sons' hybrid *niveum* x *Druryi*; figured in "Lindenia," vol. i., plate 50, from Messrs. J. Veitch & Sons; £25 4s. *Cypripedium javanicum* x *superbiens*, seven growths, Continental hybrid of Monsieur Bleu's; not named; £44 2s. *Cypripedium Wallisi*, four growths and breaks; the white *caudatum*, from Messrs. Low & Co., scarce; £61 10s. *Dendrobium Phalaenopsis*, four bulbs, one lead, has flowered at Downside, the fine

£28 7s. *Cattleya Trianae Dodgsoni*, eight bulbs, two leads, part of the original plant; in no other collection; figured in "Album," vol. vi., plate 249; £73 10s. *Cymbidium giganteum*, large specimen; £23 2s. *Saccolabium Harrisonianum* (or *giganteum album*), in large basket, eighteen growths, 119 leaves. This plant bore sixteen spikes of its lovely white flowers this year. It is a splendid specimen, and probably the largest in cultivation; £162 15s. *Laelia bella*, six strong bulbs with leaves, one lead. This plant is in grand condition; it is one of Messrs. J. Veitch & Sons' most splendid hybrids, *purpurata* x autumn-flowering *labiata*. Baron Schröder had R.H.S. certificate, April 14th, 1885. Bought from Messrs. Veitch; £180. *Cypripedium vexillarium*, splendid plant, eleven growths, Messrs. J. Veitch & Sons' hybrid, *barbatum* x *Fairieanum*, from Messrs. Veitch; £33 12s. *Cattleya Trianae Osmani*, four bulbs, one lead, part of Mr. Dodgson's celebrated plant; £63. *Cypripedium grande*, seventeen growths and breaks, grand specimen, in

18-inch pot, Messrs. J. Veitch & Sons' hybrid *C. Roezlii* × *caudatum*, from Messrs. Veitch; this plant was exhibited at the Orchid Conference; £68 5s. *Cattleya Skinneri alba*, twenty-eight bulbs, seven leads, fine plant, and pure white var., without any trace of colour; £33 12s. *Cypripedium tessellatum porphyreum*, Messrs. J. Veitch and Sons' selected best variety, hybrid *barbatum* × *concolor*, figured in "Lindenia," vol. i., plate 41, very scarce, bought from Messrs. J. Veitch and Sons; £78 15s. *Cymbidium Lowianum*, grand specimen; £21. *Angraecum caudatum*, four fine growths. This is one of the finest specimens, and is in splendid condition; figured in "Botanical Magazine," vol. lxxiv., t. 437°; £37 16s. *Laelia elegans Turneri*, twenty-three bulbs, three leads, fine variety; £31 10s. *Odontoglossum Hrubbyanum*, three breaks, flowered this year with a spike of fifty-one of its fine white flowers. R.H.S. certificate to Mr. Lee, February 10th, 1885. A very rare plant; £29 8s. *Cypripedium Harrisianum superbum*, four growths, Messrs. J. Veitch & Sons' grand variety; bought from Messrs. Veitch; £27 6s. *Masdevallia Harryana rugosa*, flowers deeply furrowed; a very grand flower, crimson-blue, in shades of colour probably in no other collection; fine plant, in 13-inch pot; £48 6s. *Masdevallia Harryana Russelliana*, in pan over 2 feet in diameter, very fine specimen and very grand variety, has borne 130 expanded flowers at one time; £52 10s.

Cattleya Amesiana, eight bulbs, one lead, Messrs. J. Veitch & Sons' hybrid *crispa* × *maxima*. A splendid rival to *Cattleya exoniensis*, figured in "Album," vol. vi., plate 253; bought from Messrs. J. Veitch and Sons; £94 10s. *Cypripedium selligerum majus*, true, twelve growths; Messrs. J. Veitch & Sons' fine var. hybrid *C. barbatum* × *C. lavigatum*, figured in "Lindenia," vol. i., plate 49, bought from Messrs. Veitch; £44 2s. *Vanda suavis*, splendid specimen, and best variety, six growths, the tallest with twenty pairs of leaves; £21. *Cattleya Trianae alba*, eighteen bulbs, three leads, fine and true; £21. *Cattleya Trianae Osmani*, seven bulbs, one lead, part of Mr. Dodgson's celebrated plant; £105. *Trianae Emilie*, ten bulbs; £24 3s. *Laelia elegans var. marginata*, fine specimen, seventy bulbs, twelve leads, from Mr. F. Sander; fine variety; £35 14s. *Laelia elegans Turneri*, twenty-seven bulbs, five leads, grand variety from Messrs. Low; £33 12s. *Saccolabium Heathi*, the white *Blumei majus*, five growths, forty leaves, strong healthy plant in grand condition, in basket. This is said to be the only plant ever found, though the forest where it was discovered has been carefully searched; £157 10s. *Cymbidium Parishii*, six bulbs and growths, a very fine plant, figured in "Album," vol. i., plate 25; 52s. 10s. *Cattleya exoniensis*, seventeen bulbs, two leads, very strong plant, and the very finest variety; from Mr. B. S. Williams, 1878; £105. *Cypripedium marmorophyllum*, nine growths, this plant was exhibited by Mr. Lee at the Orchid Conference, and was much admired as being a very fine variety; Messrs. J. Veitch & Sons' hybrid *Hookerae* × *barbatum*; £21. *Cypripedium Leeanum superbum*, nine growths, Messrs. J. Veitch and Sons' hybrid, *insigne Maulci* × *Spicrianum*, part of the original plant as figured in "Album," vol. v., plate 223; £32 11s.; *Cypripedium Stonei platytanum*, four growths, from Mr. Day's collection, figured in "Warner's Third Series," plate 14. This plant was exhibited in flower at the Orchid Conference, and is flowering now. It was bought after a spirited competition by Baron Schröder for £325 10s., the highest price yet paid for an Orchid. *Laelia purpurata var. Williamsi*, twenty-seven bulbs, five leads, figured in "Album," vol. i., plate 9 and 10. A grand variety; £67 4s. *Cattleya Trianae Exoniensis* lip variety, thirty bulbs, six leads; a splendid variety, bought from Messrs. J. Veitch & Sons; £21. *Laelia grandis*, large specimen, perhaps the finest in the country, eighty-six bulbs, fourteen leads; bought from Mr. F. Sander, figured in "Album," vol. 3, plate 123; £94 10s. *Cattleya Mardeli*, nine bulbs, one lead, Messrs. J. Veitch & Sons' hybrid *speciosissima* × *Devoniensis*, fine healthy plant, received R.H.S. Certificate, May 13th, 1884, bought from Messrs. Veitch; £44 2s. *Odontoglossum Jenningsianum* (Reichenbach) described in Messrs. Veitch's Manual, page 26; £21.

JUSTICIA FLAVICOMA.

THE fashion for flowers has called into recognition all free-flowering useful, durable plants, but, unfortunately, this is still neglected, being seldom seen in gardens in quantity, but more frequently as a solitary specimen in the stove struggling between life and death. This is regrettable, for it is easy of culture, durable for decoration either in the stove, intermediate house, or conservatory. It can be had in bloom by the middle of December, and a succession can be maintained until the end of May or beginning of June. Its plumes of the brightest of yellow flowers just above the darkest of green foliage render it one of the most telling plants that can be employed for decoration. The *Celosia* with its golden plume is strikingly effective, but this *Justicia* surpasses it both for beauty and usefulness. To have fine plumes the former grows moderately tall, and is only useful for certain arrangements and positions, while the last can be produced any height from 6 to 18 inches clothed with foliage down to the rim of the pot, and therefore suitable for any place, even for standing singly in vases in the dwelling room. It may here be mentioned that after the first plumes fade the plants must not be thrown away or the faded plume removed. The decaying flowers should be removed, and in a few weeks the old plume will produce fresh flowers and again be in full beauty; it will do this even a third time, and each time the plume will be larger and finer than the first. It will therefore be seen that with a few plants a long succession can be produced. The yellow heads of this plant have a

charming appearance rising above the flowers of Zonal Pelargoniums, Cyclamens, Primulas, Heaths, and such like plants. An arrangement casually made struck me as very effective the other day, and which has been admired by several. In a small house some fifty or sixty of these plants were being forced into bloom, and some *Calanthe Veitchi* were dropped in amongst them and elevated in pots; the rose-coloured flowers of the latter rising above the groundwork of dark green and yellow were very ornamental.

Old plants can be retained for growing on for another year, but for many purposes they are not so good as young stock raised annually from cuttings. Old plants lose their foliage at the base, in fact to the place where the young shoots start from. They do not attain the same vigour as young plants, and therefore produce less flowers, and are more susceptible to the attacks of insects during the growing season. After flowering old plants should be cut back, and when they have broken into growth the roots may be partially reduced and the plants placed into the same size pots or those of a slightly larger size. Subsequent treatment is the same as will be advised for young plants.

After flowering the plants grow rapidly in a temperature of 60° to 65°. They will do in much cooler quarters, but are longer before they start, and then grow more slowly. When the young shoots are a few inches long they are suitable for cuttings. These should be cut clean below a joint and the lower pair of leaves inserted. They may either be inserted singly or a number together in 5 and 6-inch pots in sandy soil; the last is invariably practised here, but the cuttings as soon as they are rooted must be placed singly into 3-inch pots. The cuttings root quickly and freely under bell-glasses, as in the propagating frame, where the temperature ranges about the same as advised for starting them. Those who do not possess these conveniences can root cuttings in a hotbed prepared for Cucumbers and Melons. After insertion give a good watering, keep the cuttings close and shaded from strong sun until they are rooted. Cuttings may be inserted as early as they can be obtained, and in succession until the end of June.

This plant does not naturally branch freely—that is, in its early stages of growth, and to induce it to do so pinch the young plants when well established in their first pots, and only a few inches high. The majority will not make more than two shoots, but pinching is not advised a second time; indeed, it is only recommended for those plants that are rooted during the months of March, April, and the early part of May. The later cuttings should not be stopped, and often from these—in fact, generally—the largest plumes are produced. If larger plants are required than can be produced by growing them singly, five cuttings may be inserted in a 3-inch pot, and then grown together afterwards.

After the young plants are established in their first pots and pinched they will break into growth again by the time they are ready for placing into 5-inch pots, which is large enough for single plants. If five are grown together 7-inch pots should be employed; for late-struck plants 3 and 4-inch may be used, only potting the plants once—that is, from the cutting pots, or they may be inserted in the pots in which they are to be grown. The pots should be moderately drained, and the soil, especially for the last potting, pressed firmly in. They succeed well in a compost of fibry loam three parts, the other part being composed of leaf mould; to this may be added one-sixth of decayed manure and sufficient sand to keep the whole porous.

From the time they are established in their first pots they may be grown in a night temperature of 60°, with a rise by day of 5° or 10°, principally from sun heat, until they are placed in their largest pots. They will do very well plunged in a hotbed such as has been mentioned, in a heated pit, or even in a light position in a vinery. For ten days or a fortnight after potting keep them perfectly close until the roots have taken possession of the new soil, when the night temperature may be gradually reduced. By the end of June or beginning of the following month they can be placed in cold frames if the heated pit is required for other plants; if not, they can be grown in it with the heat shut off. Later plants must be gradually hardened, and afterwards subjected to the same treatment as those rooted earlier.

The treatment in cold frames is simple. Arrange the plants moderately close to the glass, the pots standing upon ashes or other moisture-holding material. For two or three weeks no air need be admitted by tilting the lights, for sufficient will enter by opening the frame for watering and syringing twice daily. Light shade must be applied during bright days for a few hours only. Under this treatment the plants will grow rapidly and sturdily, but from this time a little air may be admitted daily, except on very bright drying occasions. By the end of August very little shade need be employed, and it can be dispensed with by the end of the month. Throughout the following month the plants may be exposed during the day to more ventilation to harden them and bring growth to a standstill. By the end of September they should be dwarf sturdy plants with large bold foliage, nearly black, overhanging the rim of the pots.

When housing them provide a light position where the night temperature will not fall below 55°; no harm will really result if the temperature falls 5° lower. If wanted in flower by the middle of December place them in a temperature of 60° from the time they have completed their growth; by the cooler system of treatment they will flower about the middle of the following month. Those who cannot give so much heat need not despair of cultivating this plant, for it will remain in good condition in a house that is kept close where the temperature on cold occasions does not fall below 45°, but with this treatment they will be much later before they flower.