

(12) **United States Plant Patent**
Schoone

(10) **Patent No.:** **US PP25,458 P3**
(45) **Date of Patent:** **Apr. 21, 2015**

(54) **PHALAENOPSIS ORCHID PLANT NAMED**
'PAPAGAYO'

(50) Latin Name: *Phalaenopsis hybrida*
Varietal Denomination: **Papagayo**

(71) Applicant: **Floricultura**, Heemskerk (NL)

(72) Inventor: **René Schoone**, Assendelft (NL)

(73) Assignee: **Floricultura**, Heemskerk (NL)

(*) Notice: Subject to any disclaimer, the term of this patent is extended or adjusted under 35 U.S.C. 154(b) by 0 days.

(21) Appl. No.: **13/988,000**

(22) Filed: **Sep. 23, 2013**

(65) **Prior Publication Data**

US 2014/0090127 P1 Mar. 27, 2014

Related U.S. Application Data

(60) Provisional application No. 61/704,979, filed on Sep. 24, 2012.

(30) **Foreign Application Priority Data**

Sep. 27, 2012 (NL) PBR OPS955

(51) **Int. Cl.**
A01H 5/00 (2006.01)

(52) **U.S. Cl.**
USPC **Plt./311**

(58) **Field of Classification Search**
USPC Plt./311
See application file for complete search history.

Primary Examiner — Kent L Bell

(74) *Attorney, Agent, or Firm* — Foley & Lardner LLP; Sunit Talapatra

(57) **ABSTRACT**

A new and distinct *Phalaenopsis* plant named 'Papagayo' particularly characterized by flowers which are yellow with a red/purple pattern and a purple labellum; plants which may be propagated economically and uniformly using tissue culture; plants which produce more than one inflorescence; long and sturdy inflorescences; and relatively short, dark-green foliage.

3 Drawing Sheets

1

Latin name of the genus and species of the plant claimed:
Phalaenopsis hybrida.

Variety denomination: 'Papagayo'.

BACKGROUND OF THE INVENTION

The present invention relates to a new and distinct cultivar of *Phalaenopsis* plant, botanically known as *Phalaenopsis* of the Orchidaceae family, and hereinafter referred to by the cultivar name 'Papagayo'.

Phalaenopsis comprises a genus of about 55 species of herbaceous perennials many of which, or the hybrids thereof, are suitable for cultivation in the home or greenhouse. *Phalaenopsis* is predominantly epiphytic or rock-dwelling, and is native to tropical Asia, the Malay Archipelago, and Oceania. The species typically has 2-ranked, fleshy, oblong or elliptic leaves affixed to a short central stem (monopodial growth), which vary in size from 5 to 8 inches to over 2 feet. The leaves may be entirely green or mottled with silver grey.

Phalaenopsis orchids, often referred to as 'Moth Orchids' in the horticultural trade, are frequently used to furnish cut flowers for the florist trade or sold as flowering potted-plants for home or interiorscape.

Phalaenopsis produces upright or pendent lateral racemes, often with many showy flowers which open in succession beginning with the lowermost. The flowers possess three sepals and three petals; the lateral ones being alike. The lowermost petal, called the labellum, is three-lobed and is often more brightly-colored than the other flower segments. Flower colors include various shades of pink, white, yellow and red-brown.

Phalaenopsis orchids are typically propagated from seeds. Asexual propagation of *Phalaenopsis* is often done from

2

off-shoots which frequently arise from the lower bracts of the inflorescence. The resulting plants are detached from the mother plant and may be planted in a suitable substrate.

The new *Phalaenopsis* 'Papagayo' is a product of a controlled breeding program conducted by the inventor, René Schoone, in Strengweg, Heemskerk, The Netherlands. The objective of the breeding program was to develop a new *Phalaenopsis* cultivar particularly characterized by its attractive and unique colored flowers, economical propagation via tissue culture, rapid growth, and a plant dimension suitable for packaging and shipping to the market.

The new *Phalaenopsis* 'Papagayo' originated from a cross made by the inventor in 2000 in Strengweg, Heemskerk, The Netherlands. The female or seed parent is the *Phalaenopsis* cultivar designated. 'King Shiang's Rose', unpatented. The male or pollen parent is the *Phalaenopsis* cultivar designated 'King Shiang's Star', mutant B, unpatented. The new *Phalaenopsis* 'Papagayo' was discovered and selected by the inventor as a single flowering plant within the progeny of the stated cross in a controlled environment in 2008 in Strengweg, Heemskerk, The Netherlands.

Asexual reproduction of the new *Phalaenopsis* cultivar by tissue culture (mericlone) was first performed in July, 2008 in Cieweg 13, Heemskerk, The Netherlands, and has demonstrated that the combination of characteristics as herein disclosed for the new cultivar are firmly fixed and retained through successive generations of asexual reproduction. The new cultivar asexually reproduces true-to-type.

BRIEF DESCRIPTION OF THE INVENTION

The following traits have been repeatedly observed and are determined to be unique characteristics of 'Papagayo', which in combination distinguish this *Phalaenopsis* as a new and distinct cultivar:

1. flowers which are yellow with a red/purple pattern and a red/purple labellum;
2. plant produces more than one inflorescence;
3. plants may be propagated economically and uniformly using tissue culture;
4. inflorescences are long and sturdy; and
5. relatively short, dark-green foliage.

In comparison with the parental cultivars of 'Papagayo', the female parent 'King Shiang's Rose' has purple/lilac flowers, the male parent 'King Shiang's Star, mutant B' has yellow colored flowers, whereas the flowers of 'Papagayo' are yellow with a red/purple pattern.

Presently, the commercial cultivar to which 'Papagayo' can be meaningfully compared is the *Phalaenopsis* orchid 'FLOR170430' (U.S. patent application Ser. No. 13/998, 013). The flowers of 'Papagayo' are yellow with a red/purple pattern, whereas the flowers of 'FLOR170430' are a lighter yellow with a red/purple pattern.

BRIEF DESCRIPTION OF THE PHOTOGRAPHS

The accompanying photographs illustrate the overall appearance of the new *Phalaenopsis* 'Papagayo' showing the colors as true as is reasonably possible with colored reproductions of this type. Colors in the photographs may differ slightly from the color values cited in the detailed botanical description, which accurately describe the color of 'Papagayo'.

FIG. 1 shows a side view perspective of a typical flowering plant of 'Papagayo' in a 12 cm pot, at 16 months of age.

FIG. 2 shows a close-up view of the typical flower of 'Papagayo'.

FIG. 3 shows a close-up view of the typical leaves of 'Papagayo'.

DETAILED BOTANICAL DESCRIPTION

The new *Phalaenopsis* cultivar 'Papagayo' has not been observed under all possible environmental conditions. The phenotype of the new cultivar may vary with variations in environment such as temperature, light intensity, and day length without any change in the genotype of the plant.

The aforementioned photographs, together with the following observations, measurements and values describe plants of 'Papagayo' as grown in a greenhouse in Strengweg, Heemskerk, The Netherlands, under conditions which closely approximate those generally used in commercial practice. Initially, the ideal temperature to grow plants of 'Papagayo' is 27° C. during the day and at night. Then, during the flowering phase of 'Papagayo', the ideal growing temperature is 20-22° C. during the day and 18° C. at night. Light levels for growing 'Papagayo' are a minimum of 5,000 lux and a maximum of 10,000 lux. A balanced fertilizer with level of 200 ppm N, 87 ppm P, 168 ppm K is applied. Duration of growth of 'Papagayo' from potting size is between 10 and 14 months.

Color references are made to The Royal Horticultural Society Colour Chart (R.H.S.), 2007 edition, except where general colors of ordinary significance are used. Color values were taken under daylight conditions at approximately noon in Zaandammerweg, Assendelft, The Netherlands. The age of the 'Papagayo' plants described is 12 months after potting.

Classification:

Botanical.—*Phalaenopsis hybrida*.

Parentage:

Female or seed parent.—*Phalaenopsis* cultivar designated 'King Shiang's Rose', unpatented.

Male or pollen parent.—*Phalaenopsis* cultivar designated 'King Shiang's Star', mutant B, unpatented.

Propagation:

Type.—Tissue culture (mericlone).

Rooting habit and description.—Approximately 3 mm-6 mm wide and grey/green (RHS 193C) in color; freely branching. It takes 12 weeks for plants growing in tissue culture to initiate roots.

Plant:

Size at maturity.—Height (from bottom of pot to highest flower): about 58 cm. Spread: about 65 cm.

Growth habit.—Standard; green (RHS N137C) leaves and a relatively normal raceme.

Vigor.—Moderate.

Crop time.—Following asexual propagation, at about 26 weeks 2 leaves appear; at about 30 weeks 3-4 leaves appear; after a cold treatment of about 4-8 weeks at a temperature of about 19° C. about 1-3 racemes with flowers appear.

Foliage:

Quantity per plant.—About 6 to 8 leaves are produced before flowering.

Arrangement and attachment.—Half up/horizontal and on two sides.

Overall shape of leaf.—Oval, the tip is little pointy and asymmetric.

Texture (both surfaces).—Smooth and leathery.

Pubescence.—None.

Mature leaf length.—About 17 to 23 cm.

Mature leaf width.—About 6 to 8 cm.

Mature leaf thickness.—About 2 mm.

Mature leaf color.—Upper side: RHS N137C. Under side: RHS 137C.

Leaf base.—Acute.

Margin.—Entire.

Venation.—Pattern: parallel. Color of midvein: upper side: green (RHS N137A). Under side: green (RHS 137C).

Raceme:

Quantity per plant.—About 1 to 3.

Number of flowers per raceme.—About 10 to 20.

Length.—About 40 to 60 cm.

Diameter.—About 5 mm.

Strength.—Strong.

Aspect.—Upright.

Texture.—Glabrous and smooth.

Color.—Brown (RHS 200C) with yellow/green (RHS 146A).

Internode.—Length: about 35 mm.

Inflorescence description:

Appearance.—Upright to slightly pendant, racemose inflorescence with bilaterally symmetrical flowers that open in succession beginning with the lowermost flower.

Buds.—Height (from base to tip): about 7 to 10 mm. Diameter (at midpoint): about 5 to 7 mm. Shape: oval/egg-shaped. Color: yellow (RHS 11C & RHS 11D) with some purple (RHS N81B).

Flowering time.—For an untreated plant (flowering plant that has not undergone cold-treatment where the

plant grows at a temperature of 18° C. to 19° C. for about 4 to 8 weeks after a period of about 30 weeks at a temperature of 25° C.), 1 to 3 racemes appear with flower buds and flowers. First flowers can be expected approximately 4 to 6 months after planting a plant with a leaf diameter of 3 to 5 cm. Flowers persistent.

Flowering longevity.—On the plant: about 4 to 6 months; lastingness of cut flowers: has not been observed.

Fragrance.—No fragrance.

Flower.—Rate of opening: Flowers fully opened about 2 to 3 days after petal and sepal separation. Orientation at opening: slanted upward and outward. Shape: Typical shape of *Phalaenopsis* orchid, see FIG. 2. Size: Height: about 55 mm to 60 mm. Diameter: about 60 mm to 70 mm.

Petals.—Quantity and arrangement: three petals and three sepals that are trimerous, overlapping and arranged in 2 whorls. Petals are more pronounced than sepals. Arrangement: Inner whorl of petals comprises 3 petals: 2 lateral petals and labellum. 2 lateral petals: Overall shape: broadly ovate, little triangular and weakly cupped. Apex: oval/round. Margin: entire and weakly undulate. Base: broadly ovate. Length: about 29 mm. Width: about 32 mm. Texture: Upper surface: smooth and satiny. Under surface: smooth and satiny. Color (when fully opened): upper surface: At the base white (RHS NN155C). Main color is yellow (RHS 11C, some flowers RHS 14C). On upper edge red/purple (RHS 70A). All over red/purple spots and stripes (RHS 70A). Under surface: Main color is yellow (RHS 10D). Upper edge and spots and stripes are red/purple (RHS 70B).

Labellum.—Overall shape: 3-lobed with 2 prominent callosities at central junction of the lateral lobes and base of the midlobe. Lateral lobes of labellum fold upward about the column; the midlobe extends forward and is terminated by 2 short stubs appendages at the apex. Lateral lobes of the labellum are ovate in shape while the midlobe is triangular with a bump and a rib on it. Margin: entire and weakly undulate. Apex: oval. Length: about 18 mm. Width (not flattened): about 17 mm. Depth of tube (made from lateral lobes): about 9 mm. Texture: Upper & under surface: smooth and satiny. Color (when fully opened): Midlobe, upper surface: From base red/purple (RHS 59B) which runs into RHS 72A. Under surface: From bottom to top white (RHS NN155C). Line in the center on the edges are red/purple (RHS 72A and RHS 59A) with some yellow/orange (RHS 17A). Lateral lobes, upper surface: Lower edge is red/purple (RHS 59A) which runs to the center into red/purple (RHS 72A). From inside to upper edge white (RHS NN155B) with

some yellow (RHS 13A). Also some red/purple stripes (RHS 59A). Under surface: From base white (RHS NN155C) which runs into RHS 71A and then into RHS 59A. Cirrhi: small (about 3 mm). color: red/purple (RHS 72A). Pestle (Callosities): Length: about 5 mm. Width (not flattened): about 6 mm. Color: yellow/orange (RHS 17A). Sides have some white (RHS NN155B) and red/purple (RHS 59B) spots.

Sepals.—Arrangement: Outer whorl comprises 3 sepals. Overall shape: elliptical and weakly cupped. Margin: entire and weakly undulate. Length: about 30 mm. Width: about 23 mm. Apex: oval/round. Dorsal sepal has small notch. Texture: Upper & under surface: smooth and satiny. Color (when fully opened): Dorsal, upper surface: White at the base (RHS 155C) and after that some yellow (RHS 10C). Edges and spots/stripes are red/purple (RHS 72A). Under surface: White (RHS NN155B) with yellow/green (RHS 154C) and on the edges red/purple (RHS 70B). Some flowers are yellow/green (RHS 1C & RHS 151D). Lateral, upper surface: At the base white (RHS 155C), rest is yellow (RHS 10C). Edges and spots/stripes are red/purple (RHS 72A). Under surface: white (RHS NN155B) with yellow/green (RHS 154D). Some flowers are yellow/green (RHS 1C & RHS 151D).

Pedicel.—Length: about 36 mm. Diameter: about 3 mm. Texture: glabrous and smooth. Color: Close to the flower white (RHS NN155C) which runs into yellow/green (RHS 146D).

Reproductive organs:

Arrangement.—The stamens, style and stigmas are fused into a single, short structure called the column, possessing one terminal anther with pollen grains united into a pollinia, which are covered by an anther cap. The stigma is located under the column behind the pollinia. The ovary is inferior with three carpels present. The plant has not produced seed.

Column.—Length: about 9 mm. Diameter: about 5 mm. Color: white (RHS NN155C) with a red/purple haze (RHS 72A).

Pollinia.—Quantity: Two. Diameter: about 2 mm. Color: yellow/orange (RHS 17A).

Ovary.—Length: about 3 mm. Diameter: about 2 mm. Color: white (RHS NN155B).

Disease/pest resistance/susceptibility: No specific resistance or susceptibility observed.

Temperature tolerance: Tolerant to a low temperature of about 15° C. and to a high temperature about 30° C.

What is claimed is:

1. A new and distinct *Phalaenopsis* plant named 'Papa-gayo', as illustrated and described herein.

* * * * *

FIG. 1



FIG. 2

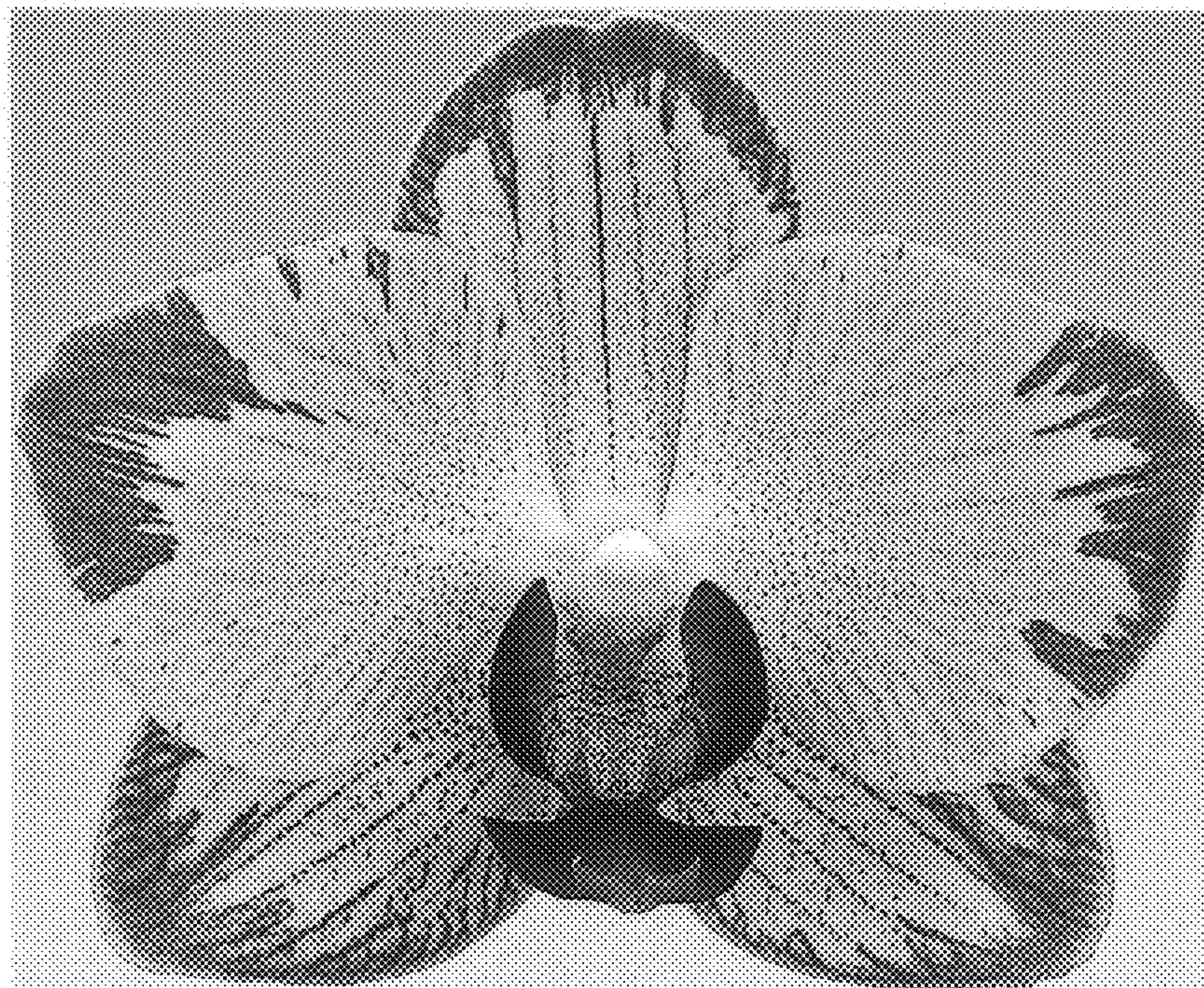


FIG. 3

