



US00PP27204P3

(12) **United States Plant Patent**
Van Swieten(10) **Patent No.:** US PP27,204 P3
(45) **Date of Patent:** Sep. 27, 2016

- (54) **PHALAENOPSIS ORCHID PLANT NAMED 'PHALDOTWEL'**
- (50) Latin Name: *Phalaenopsis* Hybrid
Varietal Denomination: Phaldotwel
- (71) Applicant: **ANTHURA B.V.**, Bleiswijk (NL)
- (72) Inventor: **Martinus Nicolaas Gerardus Van Swieten**, The Hague (NL)
- (73) Assignee: **ANTHURA B.V.**, Bleiswijk (NL)
- (*) Notice: Subject to any disclaimer, the term of this patent is extended or adjusted under 35 U.S.C. 154(b) by 25 days.

(21) Appl. No.: **14/544,667**(22) Filed: **Feb. 2, 2015**(65) **Prior Publication Data**

US 2016/0227692 P1 Aug. 4, 2016

- (51) **Int. Cl.**
A01H 5/02 (2006.01)
- (52) **U.S. Cl.**
USPC **Plt./311**
- (58) **Field of Classification Search**
USPC Plt./263.1, 311
See application file for complete search history.

Primary Examiner — Susan McCormick Ewoldt*Assistant Examiner* — Karen Redden(74) *Attorney, Agent, or Firm* — Jondle & Associates, P.C.(57) **ABSTRACT**

A new and distinct variety of *Phalaenopsis* plant named 'PHALDOTWEL', particularly characterized by having yellow flowers, 2 peduncles, a peduncle that is long and moderate, leaves that are narrow oblong, and is propagated by tissue culture is disclosed.

3 Drawing Sheets**1**

Genus and species: *Phalaenopsis* Hybrid.
Variety denomination: 'PHALDOTWEL'.

BACKGROUND OF THE NEW PLANT

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

Phalaenopsis comprises a genus of about 60 species of herbaceous perennials many of which, or the hybrids thereof, are suitable for cultivar 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 12 to 20 cm to over 60 cm. 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 or panicles, 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 petals, called the labellum, are three-lobed and are 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 off-shoots which arise from the lower bracts of the inflorescence. The resulting plants are detached from the mother plants and may be planted in a suitable substrate.

The new *Phalaenopsis* 'PHALDOTWEL' is particularly characterized by its attractive and unique yellow flowers,

2

economical propagation by tissue culture, rapid growth, and a plant dimension suitable for packaging and shipping to the market.

'PHALDOTWEL' is a product of a planned breeding program conducted in Bleiswijk, The Netherlands.

The new *Phalaenopsis* 'PHALDOTWEL' originated from a cross made in June 2005 in Bleiswijk, The Netherlands. The female parent is a yellow *Phalaenopsis* pot plant named 'Anthura Gold' (U.S. Plant Pat. No. 12,639), while the male parent is a white *Phalaenopsis* pot plant named '00001-1749' (unpatented). A single plant was selected in October 2008 and has been asexually reproduced repeatedly by meristem tissue culture in Bleiswijk, The Netherlands over a 3-year period. The new variety has been found to retain its distinctive characteristics through successive asexual propagations.

Asexual reproduction of 'PHALDOTWEL' by tissue culture was first performed in September 2011 in Bleiswijk, The Netherlands and has demonstrated that the new cultivar is firmly fixed and retained through successive generations of asexual reproduction.

Plant Breeder's Rights for this variety have been applied for in Europe on Apr. 25, 2014. 'PHALDOTWEL' has not been made publicly available or sold anywhere in the world more than one year prior to the filing date of this application.

SUMMARY OF THE INVENTION

The following are the most outstanding and distinguishing characteristics of this new cultivar when grown under normal horticultural practices in Bleiswijk, The Netherlands.

- 1) Yellow flowers;
- 2) 2 peduncles;
- 3) Peduncle is long and moderate;

- 4) The shape of the leaf is narrow oblong; and
 5) Plants are propagated by meristem tissue culture.

DESCRIPTION OF THE PHOTOGRAPHS

This new *Phalaenopsis* plant is illustrated by the accompanying photographs which show the overall plant habit including blooms, buds and foliage of the plant; the colors shown are as true as can be reasonably obtained by conventional photographic procedures. The photographs are of a 50-week old plant grown in a greenhouse in Bleiswijk, The Netherlands in May 2014.

FIG. 1 shows the overall plant habit, including blooms, buds and foliage of 'PHALDOTWEL'.

FIG. 2 shows a close-up of a flower of 'PHALDOTWEL'.

FIG. 3 shows a close-up of the leaves of 'PHALDOTWEL'.

DESCRIPTION OF THE NEW VARIETY

The following detailed description sets forth the distinctive characteristics of 'PHALDOTWEL'. The data which define these characteristics were collected from asexual reproductions carried out in Bleiswijk, The Netherlands. The plant history was taken on 50-week old plants which were planted from tissue culture in 12 centimeter pots and grown in a greenhouse between 27° C. to 29° C. for 30 weeks, continued by a cooling period of 8 weeks between 18° C. to 20° C. and 12 weeks in a greenhouse of 21° C. Observations were made in May 2014. Color readings were taken under 4-6000 lux natural light in the greenhouse. Color references are primarily to The R.H.S. Colour Chart of The Royal Horticultural Society of London (R.H.S.) (2001).

DETAILED BOTANICAL DESCRIPTION

Classification:

Family.—Orchidaceae.

Botanical.—*Phalaenopsis* Hybrid.

Common name.—*Phalaenopsis*.

Variety name.—'PHALDOTWEL'.

Parentage:

Female parent.—*Phalaenopsis* cultivar 'Anthura Gold' (U.S. Plant Pat. No. 12,639).

Male parent.—*Phalaenopsis* cultivar '00001-1749' (unpatented).

Propagation:

Type.—Tissue culture.

Plant:

Crop time (time to produce a finished flowering plant).—48 to 50 weeks for a 12 cm pot.

Growth habit of peduncle.—Standard, green leaves, raceme to panicle.

Height (including pot, including inflorescence).—51.0 cm to 61.0 cm.

Width (measured from leaf tips).—25.0 cm to 30.0 cm.

Vigor.—Moderate.

Roots:

Root description.—Grey-green-colored roots with branching lateral roots having grey-green colored root tips.

Leaves:

Mature leaves.—Quantity per plant: 6 to 7 leaves are produced before flowering. Length (fully expanded): 12.0 cm to 16.0 cm. Width: 6.2 cm to 7.2 cm. Shape: Narrow oblong. Base shape: Moderately elongated.

Apex: Unequal mucronate. Leaf blade angle with the petiole: Between 15 degrees and 30 degrees. Leaf margin: Entire. Color: Upper surface: RHS 146A. Lower surface: RHS 148B and 187A. Texture: Rough. Thickness: 2.2 mm to 2.6 mm. Venation: Parallel. Color of the midvein: Upper surface: RHS 187A. Lower surface: RHS 187A.

Peduncle:

Quantity per plant.—2.

Number of flowers per peduncle.—10 to 14.

Length.—42.0 cm to 46.0 cm.

Diameter.—3.7 mm to 4.1 mm.

Strength.—Moderate.

Aspect.—Upright to pendent.

Texture.—Smooth.

Color.—Green-brown (RHS 148B and 187A).

Internode length.—30.0 mm to 40.0 mm.

Callosities.—None.

Inflorescence description:

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

Inflorescence size.—Height (from base of first flower to tip of inflorescence): 160.0 mm to 210.0 mm. Diameter (diameter of peduncle of inflorescence): 3.3 mm to 3.5 mm.

Flowering time.—First flowers can be expected 10 to 11 months after planting in a 12 cm pot.

Flower.—Height: 66.0 mm to 71.0 mm. Diameter: 69.0 mm to 73.0 mm. Depth of lip: 16.0 mm to 18.0 mm.

Flower longevity.—On the plant: 7 to 11 weeks.

Fragrance.—Absent.

Petals.—Arrangement: Free. Shape: Semi-circular. Apex: Emarginate and slightly asymmetric. Margin: Entire. Length (from base to tip): 39.0 mm to 41.0 mm. Width: 38.0 mm to 40.0 mm. Color (when fully opened): Main color: Yellow (RHS 10C). At the base: Yellow (RHS 10C).

Dorsal sepal.—Shape: Elliptic. Margin: Entire. Length (from base to tip): 35.0 mm to 37.0 mm. Width: 23.0 mm to 25.0 mm. Color (when fully opened): Main color: Yellow with light shading (RHS 10C and 162B). At the base: Yellow with light shading (RHS 10C and 162B).

Lateral sepals.—Shape: Ovate. Margin: Entire. Length (from base to tip): 35.0 mm to 37.0 mm. Width: 22.0 mm to 24.0 mm. Color (when fully opened): Main color: Yellow (RHS 10C); slightly dotted at the base (RHS 162B and 60A). At the base: Yellow (RHS 10C); slightly dotted at the base (RHS 162B and 60A).

Labellum (lip).—Margin: Entire. Length: 20.0 mm to 22.0 mm. Width: 17.0 mm to 19.0 mm. Whiskers: Present. Length of whiskers: Short.

Lateral lobe.—Shape: Type IV (as described in the International Union for the Protection of New Varieties of Plants (UPOV) Test Guidelines for *Phalaenopsis*). Color: White-yellow dotted (RHS 155C, 14B and 59B).

Apical lobe.—Shape: Between obdeltoid and ovate. Color: White-yellow dotted (RHS 155C, 14B and 60A).

Callus.—Color: Yellow dotted (RHS 17A and 60A).

Pedicel.—Length: 27.0 mm to 29.0 mm. Diameter: 2.5 mm to 2.7 mm.

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 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.

Column.—Length: 10.0 mm to 12.0 mm. Diameter: 4.6 mm to 5.6 mm. Color: White/light lilac (RHS 155C and 69C).

Pollinia.—Quantity: 2. Size: 0.9 mm to 1.1 mm. Color: Orange (RHS 26A).

Ovary.—Length: 8.0 mm to 10.0 mm. Diameter: 2.0 mm to 2.4 mm.

Disease, pest, and stress resistance: No specific resistance or susceptibility observed.

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

COMPARISON WITH PARENTAL AND COMMERCIAL VARIETIES

⁵ ‘PHALDOTWEL’ differs from female parent ‘Anthura Gold’ (U.S. Plant Pat. No. 12,639) in that ‘PHALDOTWEL’ has a taller plant height and wider petals, whereas ‘Anthura Gold’ has a shorter plant height and thinner petals. Additionally, ‘PHALDOTWEL’ has a white-yellow dotted apical lobe of the lip, whereas ‘Anthura Gold’ has a yellow and greyed-orange apical lobe of the lip.

¹⁰ ‘PHALDOTWEL’ differs from commercial variety ‘PHALDRAXIP’ (U.S. Plant patent application Ser. No. 13/987,761) in that ‘PHALDOTWEL’ has smaller flowers and shorter whiskers of the lip, whereas ‘PHALDRAXIP’ has larger flowers and longer whiskers of the lip. Additionally, ‘PHALDOTWEL’ has an obdeltoid to ovate shaped apical lobe, whereas ‘PHALDRAXIP’ has a trullate shaped apical lobe.

I claim:

¹⁵ ²⁰ 1. A new and distinct variety of *Phalaenopsis* plant named ‘PHALDOTWEL’, substantially as described and illustrated herein.

* * * * *



FIG. 1

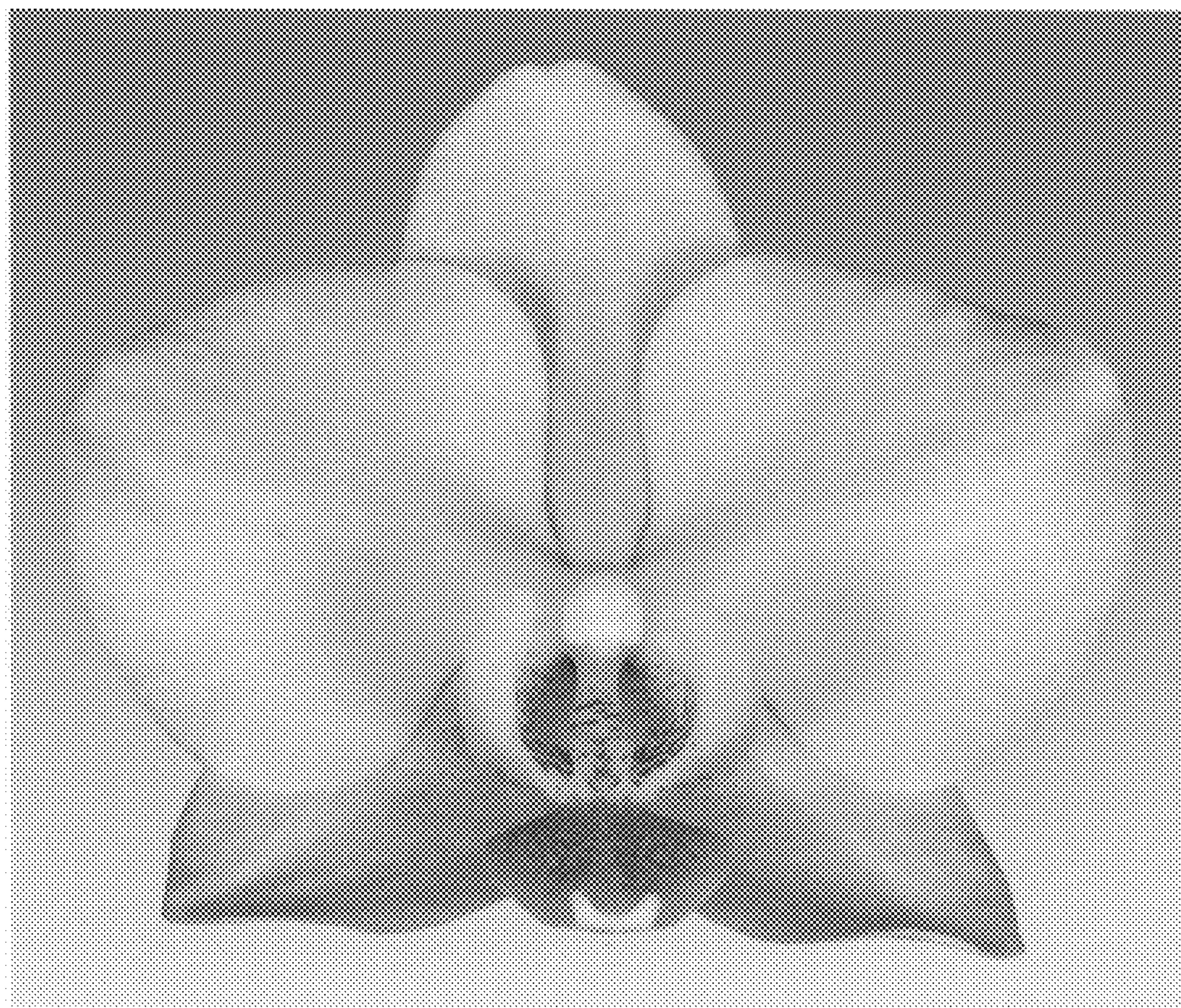


FIG. 2

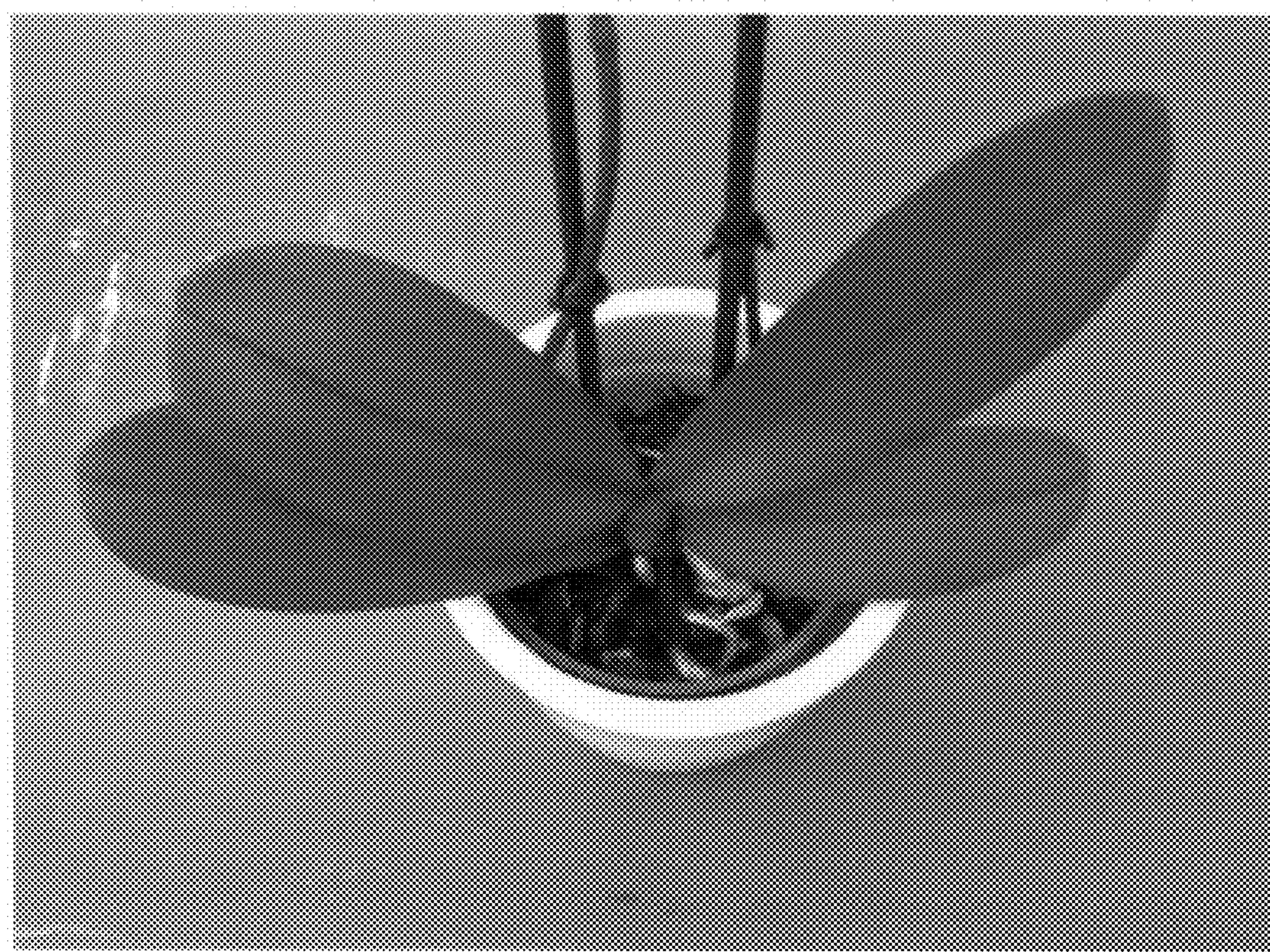


FIG. 3