



(12) **United States Plant Patent**
Van Swieten

(10) **Patent No.:** **US PP27,509 P2**
(45) **Date of Patent:** **Dec. 27, 2016**

(54) **PHALAEOPSIS ORCHID PLANT NAMED
'PHALDAPUCK'**

(50) Latin Name: *Phalaenopsis* hybrid
Varietal Denomination: **PHALDAPUCK**

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(*) 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.: **14/756,913**

(22) Filed: **Oct. 28, 2015**

(51) **Int. Cl.**
A01H 5/02 (2006.01)

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

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

(56) **References Cited**

PUBLICATIONS

PLUTO Plant Variety Database Sep. 10, 2016, p. 1.*
Enclosure for the Plant Patent application of Anthura BV, 13 pages,
2015.

* cited by examiner

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(57) **ABSTRACT**

A new and distinct variety of *Phalaenopsis* plant named
'PHALDAPUCK', particularly characterized by having
purple flowers with a light lip, 1 to 2 peduncles, an inflo-
rescence that is long and sturdy, leaves that are oblong, and
is propagated by meristem tissue culture is disclosed.

3 Drawing Sheets

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Genus and species: *Phalaenopsis* hybrid.
Variety denomination: 'PHALDAPUCK'.

BACKGROUND OF THE NEW PLANT

The present invention comprises a new and distinct cul-
tivar of *Phalaenopsis* plant, botanically known as *Phalae-
nopsis* of the Orchidaceae family, and hereinafter referred to
by the cultivar name 'PHALDAPUCK'.

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, often with many showy flowers which open in
succession beginning with the lowermost. The flowers pos-
sess 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

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inflorescence. The resulting plants are detached from the
mother plants and may be planted in a suitable substrate.

The new *Phalaenopsis* 'PHALDAPUCK' is particularly
characterized by its attractive and unique purple flowers
with a light lip, economical propagation by tissue culture,
rapid growth, and a plant dimension suitable for packaging
and shipping to the market.

'PHALDAPUCK' is a product of a planned breeding
program conducted by the inventor in Bleiswijk, The Neth-
erlands.

The new *Phalaenopsis* 'PHALDAPUCK' originated from
a cross made in November 2004 in Bleiswijk, The Nether-
lands. The female parent is a light purple dotted *Phalae-
nopsis* pot plant named '07904-0006' (unpatented), while the
male parent is a white dotted *Phalaenopsis* pot plant named
'03274-0002' (unpatented). A single plant was selected in
December 2007 and has been asexually reproduced repeat-
edly by meristem tissue culture in Bleiswijk, The Nether-
lands over a 4.5-year period. The new variety has been found
to retain its distinctive characteristics through successive
asexual propagations.

Asexual reproduction of 'PHALDAPUCK' by tissue cul-
ture was first performed in March 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 Sep. 29, 2014. 'PHALDAPUCK' 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 distinguish-
ing characteristics of this new cultivar when grown under
normal horticultural practices in Bleiswijk, The Nether-
lands.

- 1) Purple flowers with a light lip;
- 2) 1 to 2 peduncles;
- 3) Inflorescence is long and sturdy;
- 4) Shape of the leaf is 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 July 2015.

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

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

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

DESCRIPTION OF THE NEW VARIETY

The following detailed description sets forth the distinctive characteristics of 'PHALDAPUCK'. 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 a nursery tray 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 July 2015. 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.) (1995).

DETAILED BOTANICAL DESCRIPTION

Classification:

Family.—Orchidaceae.

Botanical.—*Phalaenopsis* hybrid.

Common name.—*Phalaenopsis*.

Variety name.—'PHALDAPUCK'.

Parentage:

Female parent.—*Phalaenopsis* cultivar '07904-0006' (unpatented).

Male parent.—*Phalaenopsis* cultivar '03274-0002' (unpatented).

Propagation:

Type.—Meristem 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.

Height (including pot, including inflorescence).—63.0 cm to 73.0 cm.

Width (measured from leaf tips).—32.0 cm to 36.0 cm.

Vigor.—Strong.

Roots:

Root description.—Greyed-green colored roots with branching lateral roots having light green and light purple colored root tips.

Leaves:

Mature leaves.—Quantity per plant: 6 to 8 leaves are produced before flowering. Length (fully expanded): 16.0 cm to 20.0 cm. Width: 7.5 cm to 8.5 cm. Shape: Oblong. Base shape: Moderately elongated. Apex: Unequal obtuse. Leaf blade angle with the petiole (measured from the horizontal position): Between 20 degrees and 60 degrees. Leaf margin: Entire. Color: Upper surface: RHS 147A with small edge RHS 187A. Lower surface: RHS 147B with edge RHS 187A. Texture: Smooth. Thickness: 2.5 mm to 3.0 mm. Venation: Pattern: Parallel. Color of the mid-vein: Upper surface: RHS 147A. Lower surface: RHS 187A.

Peduncle:

Quantity per plant.—1 to 2.

Number of flowers per peduncle.—8 to 10.

Length.—54.0 cm to 59.0 cm.

Diameter.—6.2 mm to 6.5 mm.

Strength.—Strong.

Aspect.—Upright.

Texture.—Smooth.

Color.—Mix of brown (RHS 200A) and green (RHS 147B).

Internode length.—33.0 mm to 43.0 mm.

Callosities.—None.

Inflorescence description:

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

Inflorescence size.—Height (from base to tip): 230.0 mm to 280.0 mm. Diameter: 4.2 mm to 4.5 mm.

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

Flower.—Height: 71.0 mm to 76.0 mm. Diameter: 85.0 mm to 90.0 mm. Depth of lip: 22.0 mm to 24.0 mm.

Flower longevity.—On the plant: 10 to 12 weeks.

Fragrance.—Absent.

Flower bud.—Average size: Medium to large. Length: 24.0 mm to 26.0 mm. Width: 20.0 mm to 22.0 mm. Shape: Egg shaped. Color: Purple (RHS 71A) and greyed-purple (RHS 183B).

Petals.—Arrangement: Open/free. Shape: Semi-circular. Apex: Emarginated asymmetric. Margin: Entire. Length (from base to tip): 38.0 mm to 40.0 mm. Width: 53.0 mm to 55.0 mm. Color (when fully opened): Upper surface: Basic color: Purple (RHS 78A) with a small light purple center (RHS 78D). Over color: Absent. Lower surface: Basic color: Purple (RHS 78A). Over color: Purple (RHS 78B).

Dorsal sepal.—Shape: Elliptic. Apex: Rounded symmetric. Margin: Entire. Length (from base to tip): 40.0 mm to 42.0 mm. Width: 29.0 mm to 31.0 mm. Color (when fully opened): Upper surface: Basic color: Purple (RHS 78A) and light purple at the base (RHS 78D). Over color: Absent. Lower surface: Basic color: Purple (RHS 78A to 78B). Over color: Red-purple (RHS 70A).

Lateral sepals.—Shape: Ovate. Apex: Obtuse asymmetric. Margin: Entire. Length (from base to tip): 40.0 mm to 42.0 mm. Width: 25.0 mm to 27.0 mm. Color (when fully opened): Upper surface: Basic color: Purple (RHS 78A) and dotted at the base (RHS 72A). Over color: Slightly greyed-green towards the base (RHS 195B). Lower surface: Basic

color: Purple (RHS 78A to 78B). Over color: Greyed-green (RHS 195B).

Labellum (lip).—Margin: Entire. Whiskers: Present. Length of whiskers: 20.0 mm to 22.0 mm. Color of whiskers: Light purple (RHS 78C to 78D) with yellow tips (RHS 4C). Pubescence on the lip: Absent.

Lateral lobe.—Shape: Type V (as described in the International Union for the Protection of New Varieties of Plants (UPOV) Test Guidelines for *Phalaenopsis*); spatulate. Length (from base to tip): 22.0 mm to 24.0 mm. Width: 16.0 mm to 18.0 mm. Color: Light purple (RHS 76C) with purple edge (RHS 78B) and greyed-red (RHS 178A and 185C); with touch of yellow (RHS 9A) and dark stripes at the base (RHS 187B).

Apical lobe.—Shape: Triangular. Length (from base to tip): 20.0 mm to 22.0 mm. Width: 23.0 mm to 25.0 mm. Color: Mix of white (RHS 155C) and light purple (RHS 78B to 78C) and greyed-red-purple at the base (RHS 178A and 185A) with a touch of yellow (RHS 8A).

Callus.—Average size: Medium. Height: 0.5 cm to 0.7 cm. Length: 0.5 cm to 0.7 cm. Width: 0.3 cm to 0.5 cm. Color: Yellow (RHS 12A) dotted (RHS 187B).

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: 5.6 mm to 5.9 mm. Color: Purple (RHS 78B).

Pollinia.—Quantity: 2. Size: 1.0 mm to 1.2 mm. Color: Orange (RHS 26A).

Ovary.—Part of the pedicel with small ribs towards the column. Length: 10.0 mm to 12.0 mm. Diameter: 2.7 mm to 2.9 mm.

Pedicel.—Length: 36.0 mm to 38.0 mm. Diameter: 3.1 mm to 3.4 mm. Color: Mix of dark green (RHS 147B) and dark greyed-purple (RHS 187B) from the inflorescence; towards the flower light purple (RHS 75A and 75D).

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 of about 30° C.

COMPARISON WITH PARENTAL AND COMMERCIAL VARIETIES

‘PHALDAPUCK’ differs from female parent plant ‘07904-0006’ (unpatented) in that ‘PHALDAPUCK’ has an apical lobe of the lip that is even and flowers that are not dotted, whereas ‘07904-0006’ has an apical lobe of the lip that is dotted and flowers that are dotted. Additionally, ‘PHALDAPUCK’ has a darker colored flower than ‘07904-0006’.

‘PHALDAPUCK’ differs from male parent plant ‘03274-0002’ (unpatented) in that ‘PHALDAPUCK’ has a purple flower bud and flowers that are purple and not dotted, whereas ‘03274-0002’ has a green flower bud and flowers that are white and dotted.

‘PHALDAPUCK’ differs from commercial variety ‘PHALCOMWOM’ (unpatented) in that ‘PHALDAPUCK’ has petals that are even and whiskers that are light purple with yellow tips, whereas ‘PHALCOMWOM’ has petals that are partially dotted at the base and whiskers that are white. Additionally, ‘PHALDAPUCK’ has shorter whiskers than ‘PHALCOMWOM’.

I claim:

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

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FIG. 1

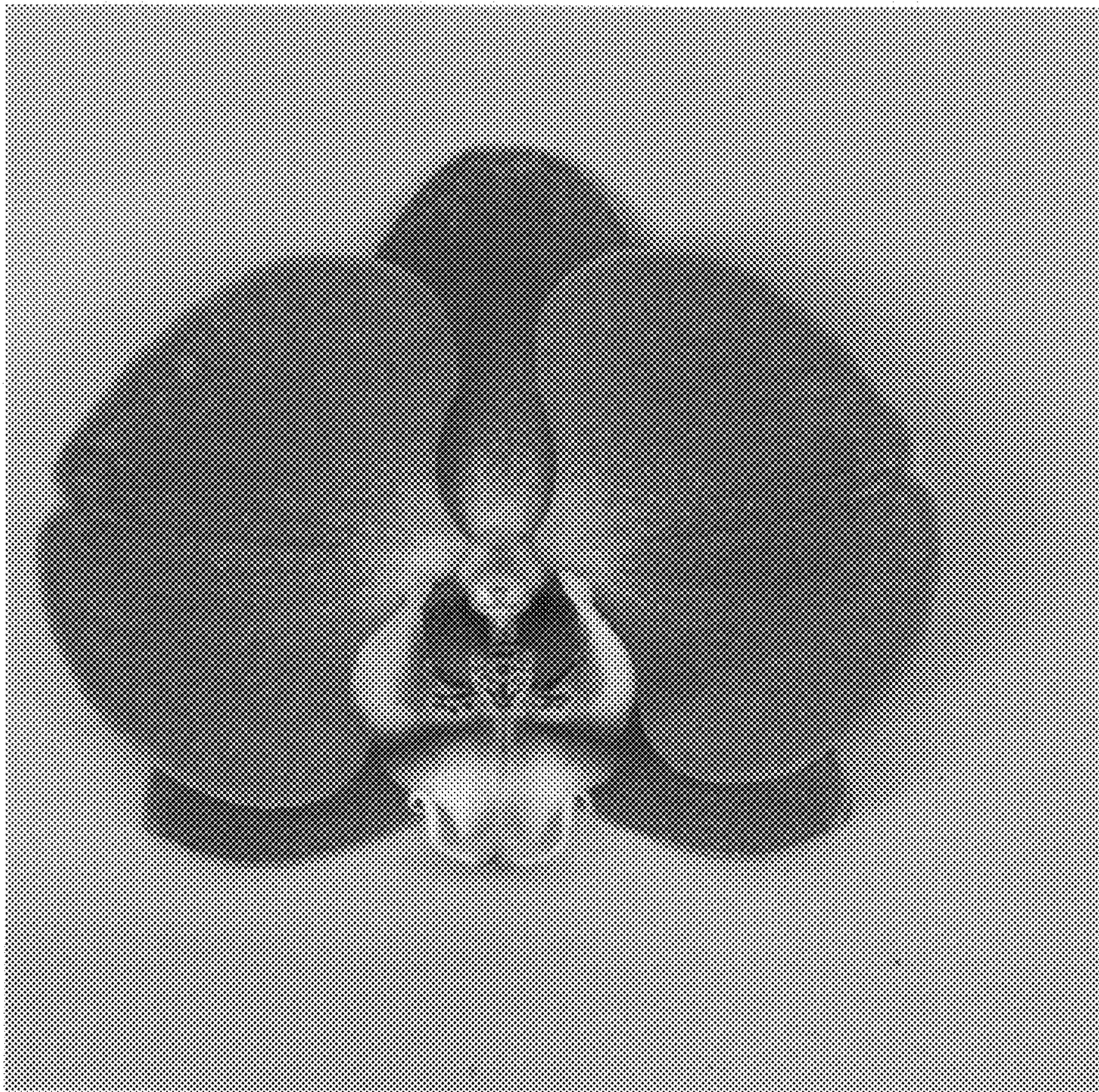


FIG. 2



FIG. 3