



US00PP21205P3

(12) **United States Plant Patent**
Blom(10) **Patent No.:** US PP21,205 P3
(45) **Date of Patent:** Aug. 17, 2010

- (54) **CHRYSANTHEMUM PLANT NAMED 'ZANMUSPEN'**
- (50) Latin Name: *Chrysanthemum×morifolium* Ramat.
Varietal Denomination: Zanmuspen
- (75) Inventor: **Wilhelmus Bernardus Blom,**
Leimuiden (NL)
- (73) Assignee: **Chrysanthemum Breeders Association Research B.V.**
- (*) 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.: **12/314,961**(22) Filed: **Dec. 19, 2008**(65) **Prior Publication Data**

US 2010/0162452 P1 Jun. 24, 2010

- (51) **Int. Cl.**
A01H 5/00 (2006.01)
- (52) **U.S. Cl.** **Plt./288**

- (58) **Field of Classification Search** Plt./288
See application file for complete search history.

Primary Examiner—Kent L Bell(74) *Attorney, Agent, or Firm*—Steptoe & Johnson LLP(57) **ABSTRACT**

A *chrysanthemum* plant named 'Zanmuspen' characterized by its medium sized blooms with white ray florets with a cream center and prolific branching; natural season flower date August 25–30 (week 35); blooming for a period of 5 weeks.

3 Drawing Sheets**1****BACKGROUND OF THE INVENTION**

The present invention relates to a new and distinct cultivar of *chrysanthemum* plant, botanically known as *Chrysanthemum×morifolium* Ramat., and hereinafter referred to by the cultivar denomination 'Zanmuspen'. 'Zanmuspen' is a product of a breeding and selection program for outdoor pot mums (garden mums) which had the objective of creating new *chrysanthemum* cultivars with a double type inflorescence, a natural season flower date starting at August 25–30; blooming for a period of 5 weeks. 'Zanmuspen' is a seedling resulting from the crossing of the female parent id 2862 and male parent id 3052. Plants of 'Zanmuspen' differ from plants of the female parent in the color of ray-florets: yellow in the female parent and white in the seedling. Plants of 'Zanmuspen' differ from plants of the male parent in the natural season blooming period; those of the seedling flower 1–2 weeks earlier.

The new and distinct cultivar was discovered and selected as a flowering plant by Wilhelmus Bernardus Blom on a cultivated field in Rijenhout, The Netherlands in 2005. The first act of asexual production of 'Zanmuspen' was accomplished when vegetative cuttings were used from the initial selection in 2005 and propagated further in a controlled environment in Rijenhout, The Netherlands. The new cultivar has been found to retain its distinctive characteristics through successive propagations.

BRIEF DESCRIPTION OF THE DRAWINGS

The present invention of a new and distinct variety of *chrysanthemum* is shown in the accompanying drawings, the color being as nearly true as possible with color photographs of this type.

FIG. 1 shows a plant of the cultivar in full bloom.

FIG. 2 shows the various stages of bloom of the new cultivar.

2

FIG. 3 shows the various stages of foliage of the new cultivar.

DESCRIPTION OF THE INVENTION

The observations and measurements were gathered from plants grown out door in Rijenhout, The Netherlands under natural day length and temperature and planted in week 22 in 2008. The natural blooming date of this crop was August 25–30 (week 35). The average height of the plants was 25 cm. No growth retardants were used. No tests were done on disease or insect resistance or susceptibility. No tests were done on cold or drought tolerance. This new variety produces medium sized blooms with white ray florets and a cream center blooming for a period of 5 weeks.

From the cultivars known to inventor the most similar existing cultivar in comparison to 'Zanmuspen' is 'Zanmustarbu' (U.S. Plant Pat. No. 20,473). When 'Zanmustarbu' and 'Zanmuspen' are being compared the following differences are noticed: The differences of 'Zanmustarbu' and 'Zanmuspen' are (1) Natural season blooming date. (2) Variance in ray-floret length. And (3) Variance in ray-floret width. (1) Under natural conditions, plants of 'Zanmustarbu' flower one week earlier than those of 'Zanmuspen'. (2) There is a larger variation in ray-floret length in 'Zanmustarbu' than in 'Zanmuspen'. (3) There is a larger variation in ray-floret width in 'Zanmustarbu' than in 'Zanmuspen'.

The following is a description of the plant and characteristics that distinguish 'Zanmuspen' as a new and distinct variety.

The color designations are taken from the plant itself. Accordingly, any discrepancies between the color designations and the colors depicted in the photographs are due to photographic tolerances. The color chart used in this description is: The Royal Horticultural Society Colour Chart, edition 2001.

US PP21,205 P3

3

4

TABLE 1

Botanical Description of <i>chrysanthemum</i> plant <i>Chrysanthemum xmorifolium</i> Ramat 'Zanmuspen'	
Bud	
Size	Small; cross-section 0.4 cm, height 0.2 cm
Shape	Oblate
Texture	Pubescent
Outside Color	Greyed-green 191A
Phyllaries	
Number	30, arranged in 3 rows
Shape	Elliptic
Apex	Acute
Base	Truncate
Margin	Entire
Color	Upper side Greyed-green 191A Under side Greyed-green 191C
Length/width	4 mm; 1-2 mm
Texture	Pubescent
Inflorescence	
Type	Double
Height	1.8 cm
Diameter	6 cm
Peduncle length	7 cm
Peduncle color	Greyed-green 191 B to 191C
Peduncle diameter	1.5 mm
Peduncle surface	Pubescent
Number per branch	Approx. 10 inflorescences
Flowering period individual inflorescence	Ca. 4 weeks
Seeds	Produced in small quantities, ovate, Greyed-brown 199A, length 1.5 mm, diameter 0.8 mm
Fragrance	Faint <i>chrysanthemum</i> odor
Color	
Center of inflorescence (ray-florets)	Immature stage: Yellow 10A Mature stage: Yellow 10A
Color of upper surface of mature ray-florets	White 155A
Color of the lower surface of mature ray-florets	White 155D
Tonality from Distance	A garden mum with white inflorescences and a cream center
Color of the ray-florets after aging of the plant	White 155A with sometimes at edges
Ray florets	Gey-Brown 199D
Texture	Upper and lower side smooth
Number	180
Shape	Oblanceolate
Apex	Rounded
Base	Acute
Cross-section	Convex
Longitudinal axis of majonty	Straight
Length of corolla tube	5 mm
Ray-floret margin	Entire
Ray-floret length	2-3 cm
Ray-floret width	3-6 mm
Ratio length/width	High
Disc florets	Absent
Receptacle	
Color	Green 138D
Shape	Conical raised
Height	0.5 cm
Diameter	0.5 cm

TABLE 1-continued

Botanical Description of <i>chrysanthemum</i> plant <i>Chrysanthemum xmorifolium</i> Ramat 'Zanmuspen'	
Reproductive Organs	
5 Androecium	Absent
Gynoecium	Present in ray florets
Style colour	Yellow-green 154C
10 Style Length	3 mm
Stigma colour	Yellow 3A
Stigma Width	1 mm
Ovary	Enclosed in calyx
Plant	
15 Form	Grown as a potmum, outdoor raised and mounded
Growth habit	Spherical shape
Growth rate	Medium
Height	25 cm
Width	40 cm
20 Stem Color	Greyed-brown 199A
Stem Strength	Strong
Stem Brittleness	Not brittle
Stem Anthocyanin Coloration	Not observed
Internode length	1-2 cm
Length of lateral branch	From top to bottom 18 cm
Lateral branch color	Green 137C
25 Lateral branch brittleness	Medium
Lateral branch diameter	2 mm
Branching (average number of lateral branches)	Prolific with 8 breaks after pinching
Natural season blooming date	August 25-30 to September 22-27
Foliage	
30 Leaf color	Upper side: Green N138B Lower side: Green N138C
Color midvein	Upper side: Yellow-green 147D Lower side: Yellow-green 148D
Size	Small.; length 4-6 cm, width 3.5-4 cm
35 Quantity (number per lateral branch)	24-26
Shape	Elliptic
Texture upper side	Sparsely pubescent
Texture under side	Pubescent
Venation arrangement	Palmate
40 Shape of the margin	Serrated
Shape of Base of Sinus	Rounded
Between Lateral Lobes	
Margin of Sinus Between	Converging
Lateral Lobes	
Shape of Base	Truncate
Apex	Mucronulate
45 Petiole length	0.3-1 cm
Petiole diameter	2-3 mm
Petiole color	Yellow-green 147D

TABLE 2

Differences with the comparison variety		
	'Zanmuspen'	'Zanmustarbu'
55 Natural season blooming date	August 25-30 (week 35)	August 18-23 (week 34)
Variance in ray-floret length	2-3 cm	2-3.5 cm
Variance in ray-floret width	3-6 mm	2-7 mm

60 I claim:

1. A new and distinct variety of *chrysanthemum* plant as described and illustrated.

* * * * *

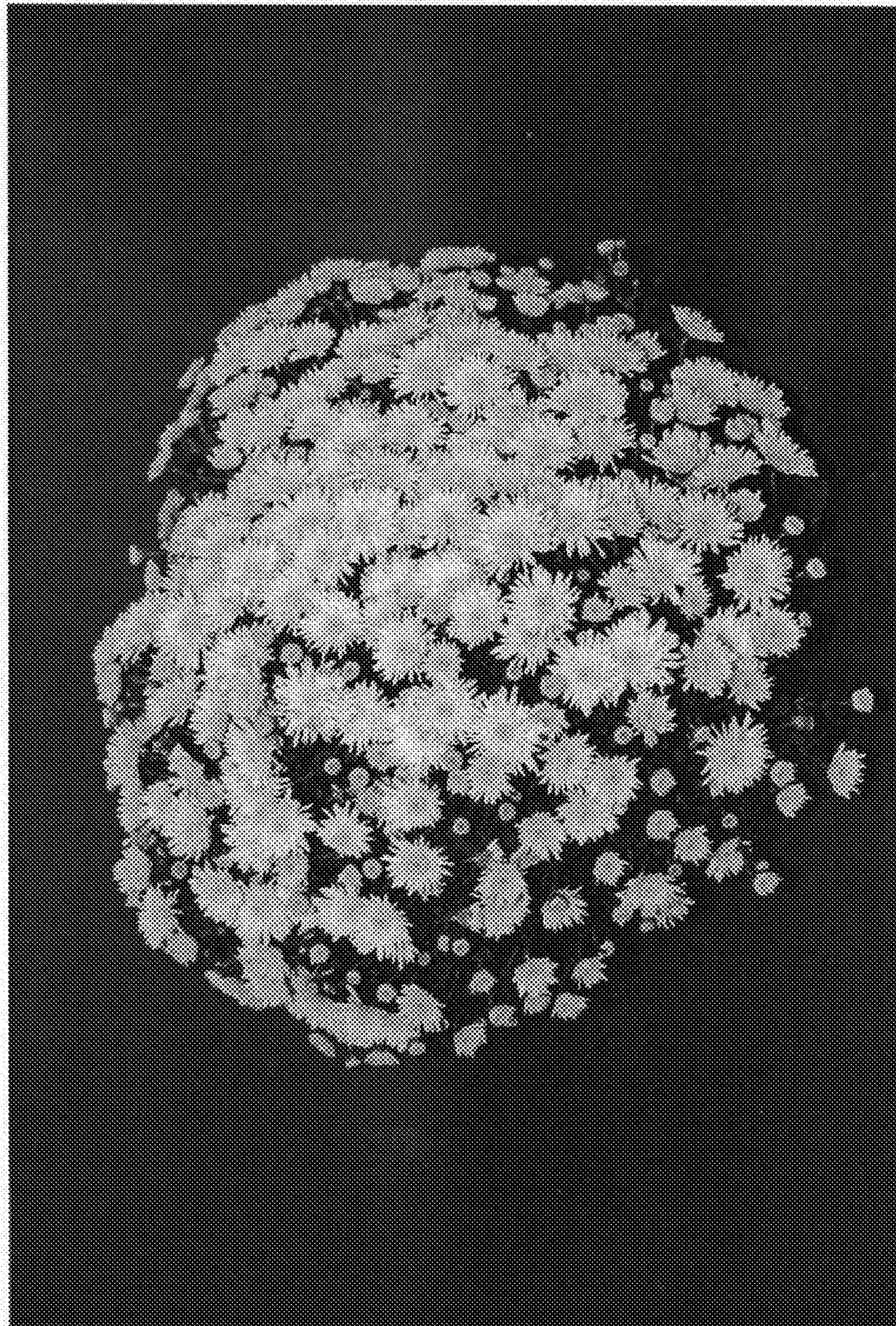


FIG.

1

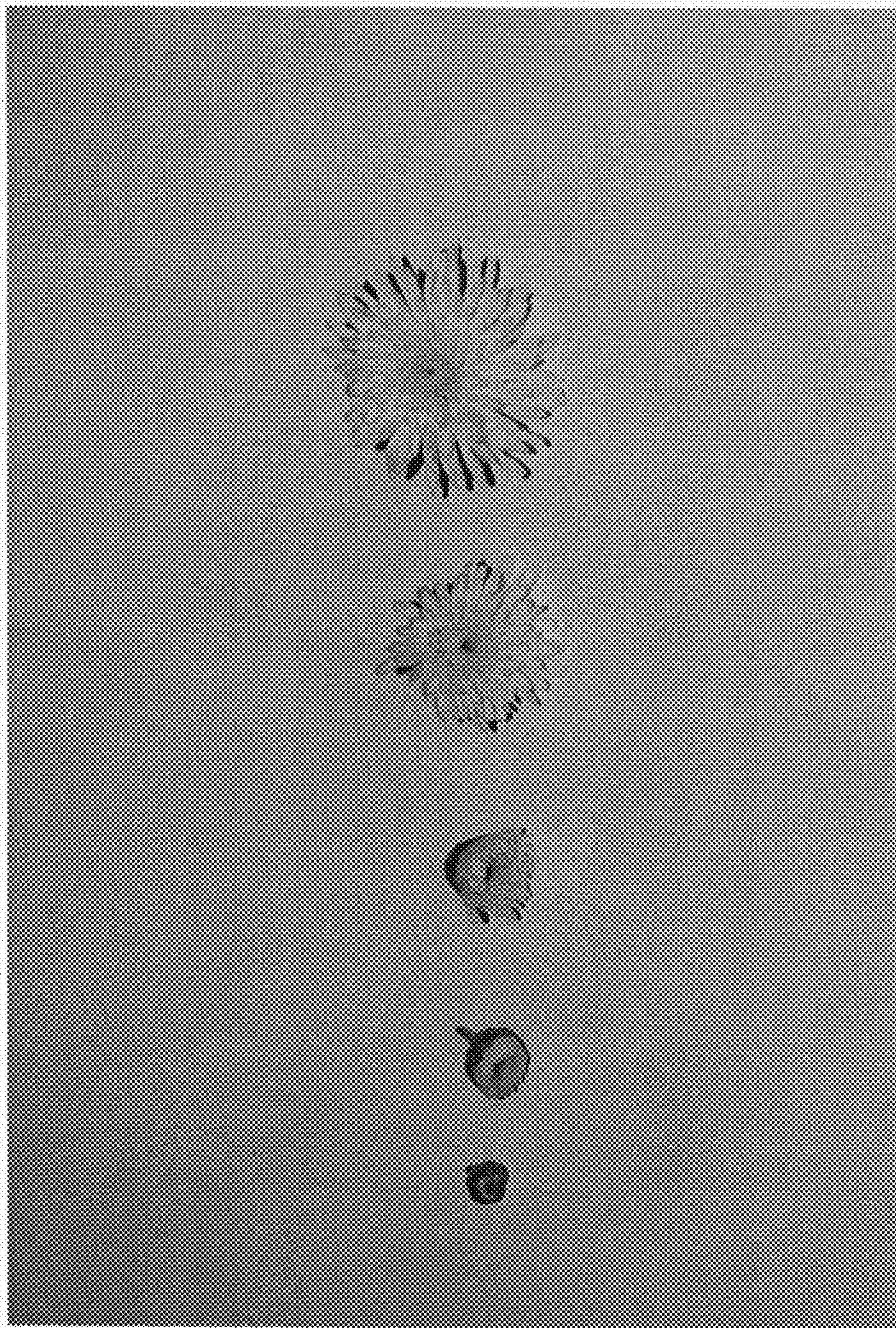


FIG. 2

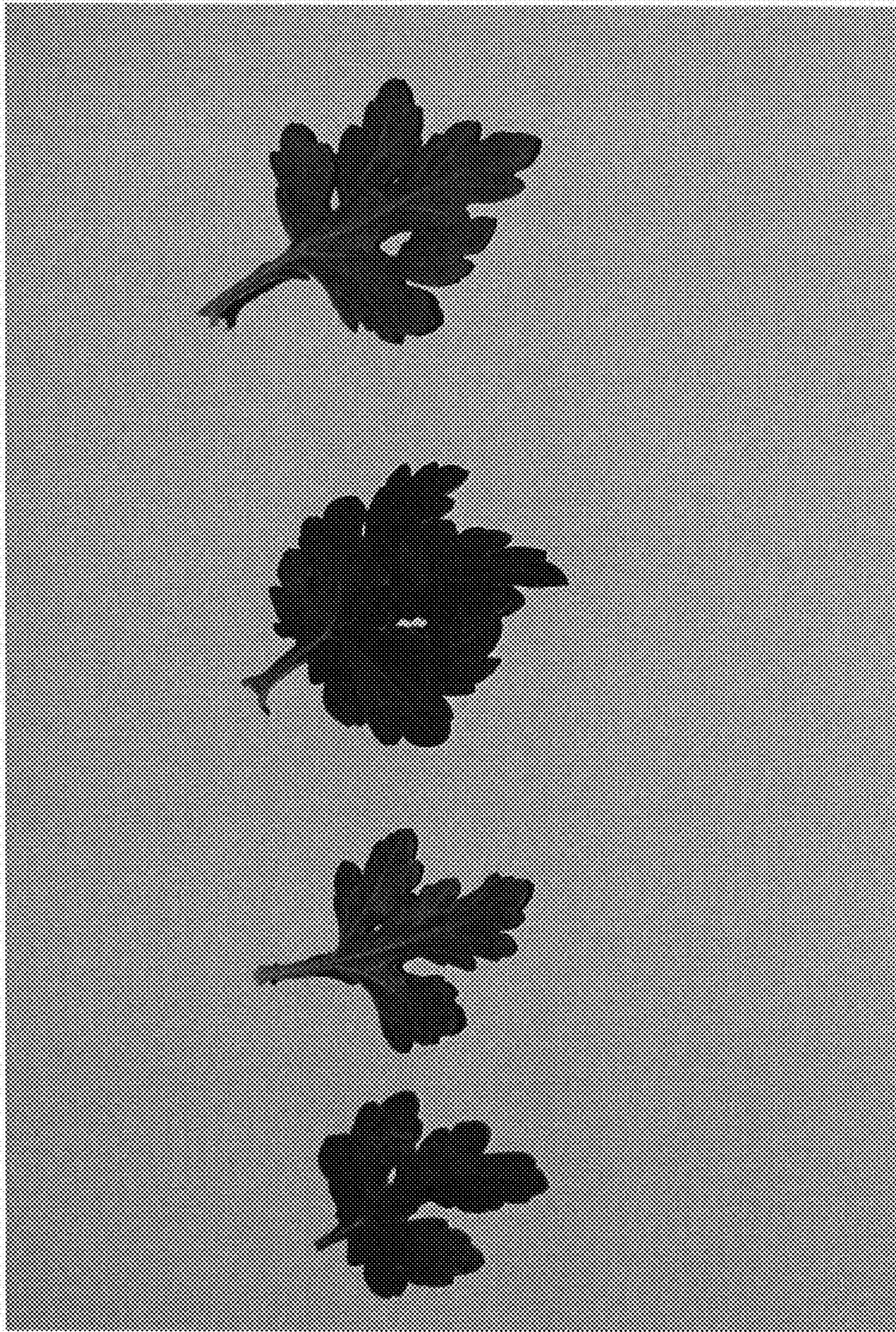


FIG. 3