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(12) **United States Plant Patent**  
**Jacobs**(10) **Patent No.:** US PP27,042 P3  
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- (54) **CHrysanthemum PLANT NAMED 'ZANMUCUP'**
- (50) Latin Name: *Chrysanthemum×morifolium* Ramat.  
Varietal Denomination: **Zanmucup**
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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 3 days.
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- (65) **Prior Publication Data**  
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- (58) **Field of Classification Search**  
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See application file for complete search history.

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(57) **ABSTRACT**  
A *chrysanthemum* plant named 'Zanmucup' characterized by its medium sized blooms with intense yellow ray florets and prolific branching; natural season flowering date September 22; blooming for a period of 4 weeks.

**3 Drawing Sheets****1**

Botanical designation: *Chrysanthemum×morifolium* Ramat.  
Cultivar denomination: 'Zanmucup'.

**RELATED CULTIVARS**

This new plant cultivar 'Zanmucup' is of the botanical classification *Chrysanthemum×morifolium* Ramat.

**BACKGROUND OF THE INVENTION**

The present invention relates to a new and distinct cultivar of *chrysanthemum* plant, botanically known as *Chrysanthemum×morifolium* Ramat., commercially known as a garden mum, and hereinafter referred to by the cultivar denomination 'Zanmucup'. 'Zanmucup' is a product of a breeding and selection program for outdoor pot mums (garden mums) which had the objective of creating new cultivars with a double type inflorescence, a natural season flowering date around September 22, blooming for a period of 5 weeks. 'Zanmucup' is a seedling resulting from a cross of the female parent 21570 with the male parent 24605. Plants of the new cultivar 'Zanmucup' differ from plants of the female parent in the natural season flowering date; plants of the seedling flower one week earlier than those of the female parent. Plants of the seedling differ from plants of the male parent in inflorescence type; inflorescences of the seedling are double, while those of the male parent are semi-double.

The new and distinct cultivar was discovered and selected as a flowering plant by Henricus Cornelius Maria Jacobs on a cultivated field in Rijenhout, The Netherlands in 2010. The first act of asexual production of 'Zanmucup' was accomplished when vegetative cuttings from the initial selection in 2010 were propagated further in a controlled environment in Rijenhout, The Netherlands. The new cultivar has been found to retain its distinctive characteristics through successive propagations.

**2****BRIEF DESCRIPTION OF THE DRAWINGS**

The present invention of a new and distinct variety of *chrysanthemum* (of about 16 weeks) 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.

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 25 in 2014, receiving drip irrigation. The natural blooming date of this crop was September 22. The average height of the plants was 30 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 intense yellow ray florets blooming for a period of 4 weeks.

From the cultivars known to inventor the most similar existing cultivar in comparison to 'Zanmucup' is 'Zanmustone' (U.S. Plant Pat. No. 22,619). When 'Zanmustone' and 'Zanmucup' are being compared the following difference is noticed: The differences of 'Zanmustone' and 'Zanmucup' are (1) Color ray florets. And (2) Leaf color. (1) Ray-florets of 'Zanmucup' are more deep yellow than those of 'Zanmustone'. (2) Leaves of 'Zanmustone' are more greyish green than those of 'Zanmucup'.

The following is a description of the plant and characteristics that distinguish 'Zanmucup' 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.

TABLE 1

Botanical Description of <i>Chrysanthemum × morifolium</i> Ramat. 'Zanmucup'	
<b>Bud</b>	
Size:	Small; cross-section 4 mm, height 3 mm
Shape:	Round
Texture:	Pubescent
Outside color:	Greyed-green 191A
Phyllaries	
Number:	24, arranged in 3 rows
Shape:	Elliptic
Apex:	Acute
Base:	Truncate
Margin:	Entire
Color:	Upper side: Greyed-green 189A Lower side: Green 136A
Length and width:	4 mm; 3 mm
Texture:	Pubescent
Inflorescences	
Type:	Double
Height:	2 cm
Diameter:	4 cm
Peduncle length:	4-6.5 cm
Peduncle color:	Green 136C
Peduncle diameter:	2 mm
Peduncle texture:	Pubescent
Number per branch:	About 5-6 .inflorescences
Duration of flowering:	4 weeks
Seeds:	Produced in small quantities, ovate, Greyed-brown 199A, length 1.5 mm, diameter 0.5 mm
Fragrance:	Faint chrysanthemum odor
Color inflorescences	
Center of inflorescence:	Immature stage: Yellow-orange 17A.; Mature stage: Yellow-orange 17A
Color of upper side of ray florets:	Yellow 12a
Color of lower side of ray florets:	Yellow 8A
Tonality from distance:	A garden mum with yellow blooms and a dark yellow center
Color of ray florets after aging of the plant:	Yellow-orange 15A
Ray florets	
Texture:	Upper and lower side smooth
Number:	160
Shape:	elliptic
Apex:	dentate
Base:	acute
Cross-section:	flat
Longitudinal axis:	straight
Length of corolla tube:	3-4. mm
Ray floret margin:	Entire
Ray floret length:	1-2 cm
Ray floret width:	2-5 mm
Ratio length/width:	medium
Disc florets	absent
Receptacle	
Color:	Yellow-green 145D
Shape:	Domed raised

TABLE 1-continued

Botanical Description of <i>Chrysanthemum × morifolium</i> Ramat. 'Zanmucup'		
5	Height:	3 mm
	Diameter:	3 mm
	Reproductive Organs	
10	Androecium:	absent
	Gynoecium:	Present on ray florets
	Style color:	Yellow-green 154C
	Style length:	4 mm
	Stigma color:	Yellow 7A
	Stigma width:	1 mm
	Ovary:	Enclosed in calyx
	Plant	
15	Form:	Grown as a spray type pot mum, outdoor raised and mounded
	Growth habit:	Spherical shape
	Growth rate:	Medium
	Height:	30 cm
	Width:	40-45 cm
20	Stem color:	Greyed-brown 199A
	Stem strength:	strong
	Stem brittleness:	not brittle
	Stem anthocyanin coloration:	absent
	Internode length:	1 cm
	Length of lateral branch:	From top to bottom 20-22 cm
25	Lateral branch color:	Green 137D
	Lateral branch, attachment:	Weak
	Lateral branch diameter:	2 mm
	Branching (average number of lateral branches):	Prolific with 8 breaks after pinching
	Natural season blooming date:	September 22 (week 39)
30	Foliage	
	Leaf color:	Upper side: Green 136B Lower side: Green 138B
	Color midvein:	Upper side: Yellow-green 147D Lower side: Yellow-green 148D
35	Size:	Small; length 3-5.5 cm, width 1.5-2.6 cm
	Quantity (number per lateral branches):	20
	Shape:	Elliptic
	Texture upper side:	Sparsely pubescent
	Texture under side:	Pubescent
40	Venation arrangement:	Pinnate
	Shape of margin:	Serrated
	Shape of base of sinus between lateral lobes:	Rounded
	Margin of sinus between lateral lobes:	Diverging
	Shape of base:	Truncate to asymmetric
	Apex:	Pointed
45	Petiole length:	0.5-1.2 cm
	Petiole diameter:	2 mm
	Petiole color:	Yellow-green 147D

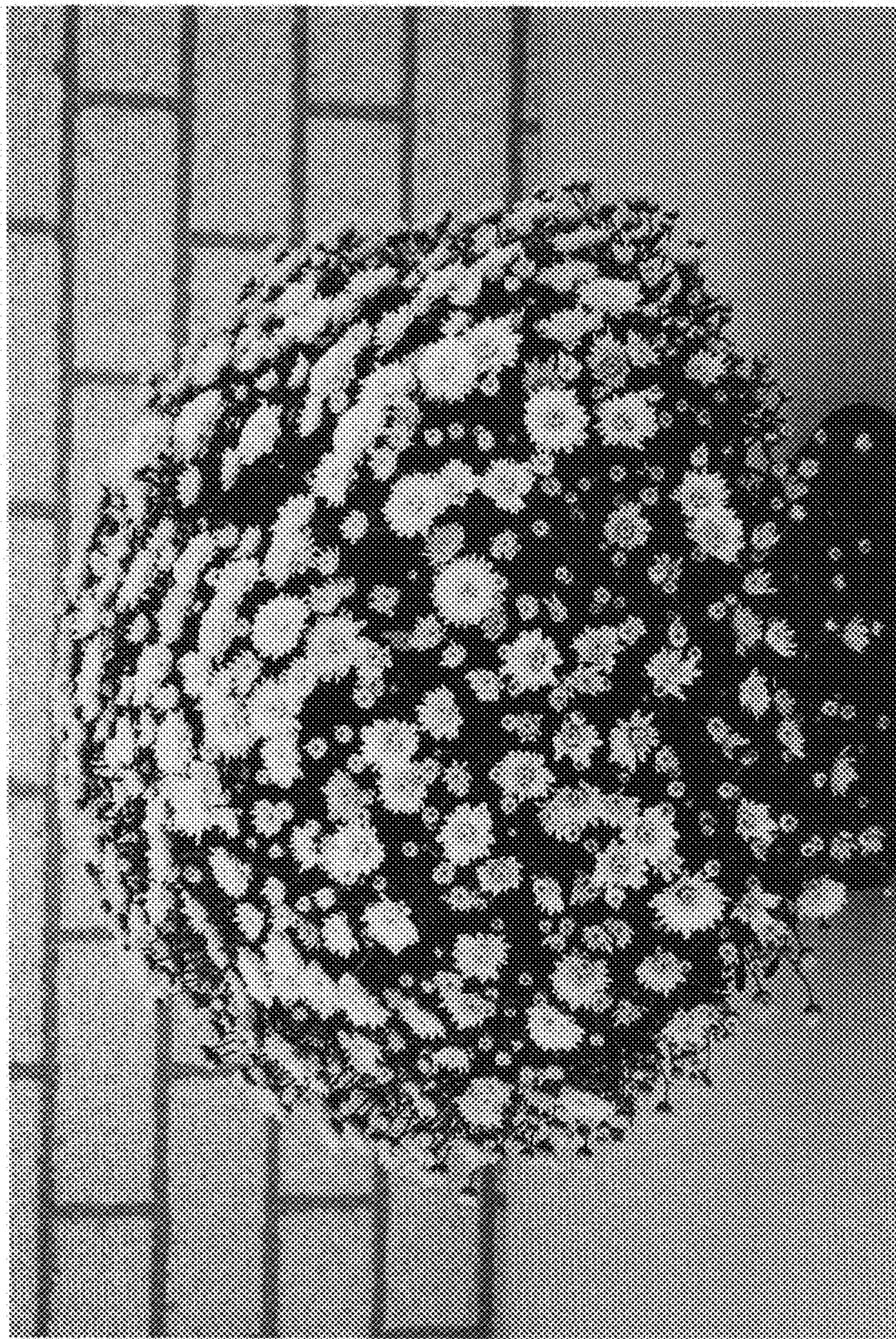
TABLE 2

Differences with the comparison variety, when grown under identical conditions		
	'Zanmucup'	'Zanmustone'
55	Ray floret upperside color	Yellow 12A
	Leaf upperside color	Green 136B

60 I claim:

1. A new and distinct *chrysanthemum* plant named 'Zanmucup' as described and illustrated.

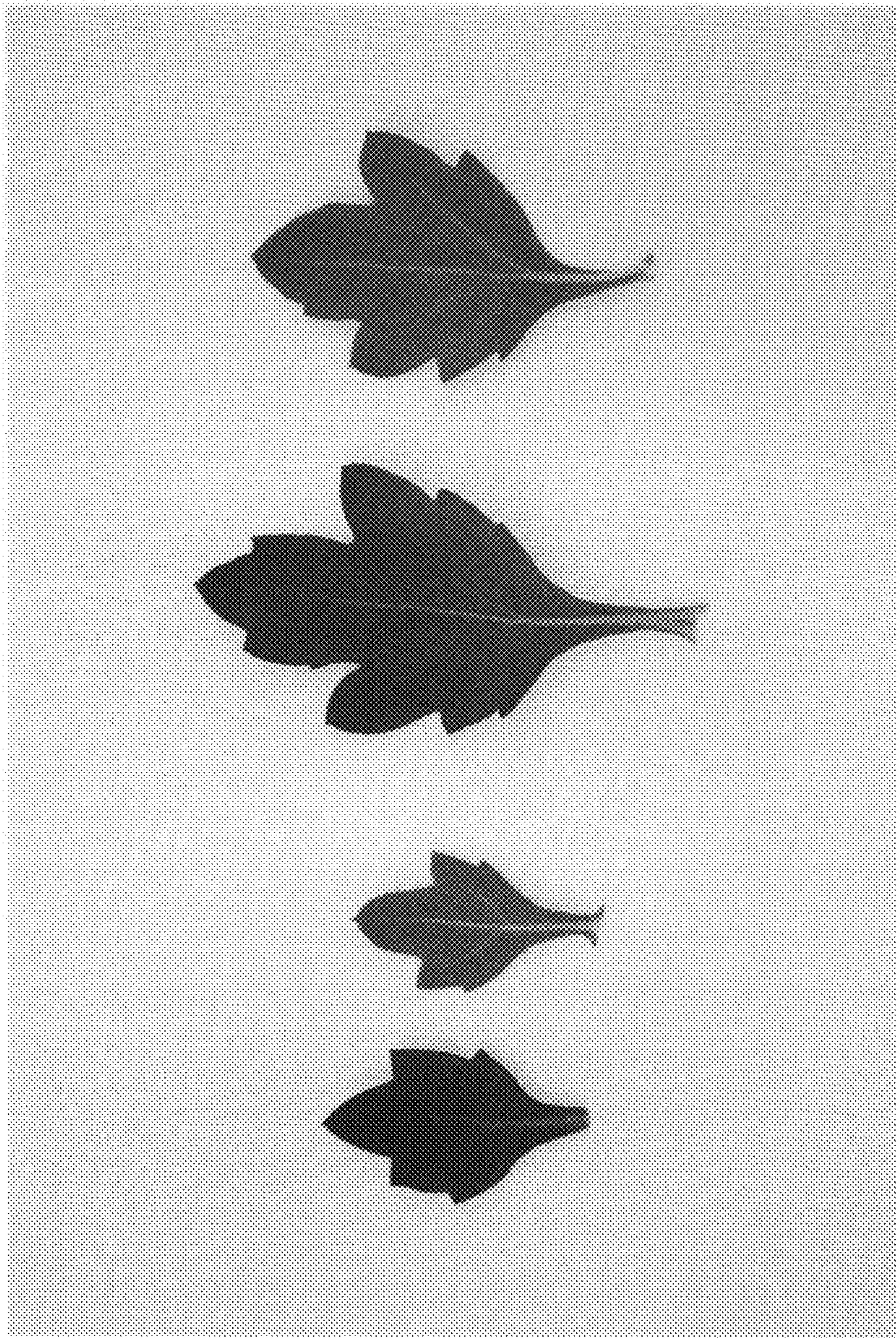
\* \* \* \* \*



**FIG. 1**



**FIG. 2**



**FIG. 3**