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(12) **United States Plant Patent**
Ackerman et al.(10) **Patent No.:** US PP24,950 P3
(45) **Date of Patent:** Oct. 7, 2014(54) **STRAWBERRY PLANT NAMED 'TRIUMPH'**(50) Latin Name: *Fragaria ananassa*
Varietal Denomination: **TRIUMPH**(71) Applicant: **Plant Sciences, Inc.**, Watsonville, CA
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(US)(*) Notice: Subject to any disclaimer, the term of this
patent is extended or adjusted under 35
U.S.C. 154(b) by 84 days.(21) Appl. No.: **13/694,410**(22) Filed: **Nov. 30, 2012**(65) **Prior Publication Data**

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A01H 5/00 (2006.01)(52) **U.S. Cl.**
USPC **Plt./209**(58) **Field of Classification Search**
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A01H 4/00; A01H 4/05; A01H 4/008; A01H
5/08; A01H 5/0893
USPC Plt./209
See application file for complete search history.*Primary Examiner* — Annette Para(74) *Attorney, Agent, or Firm* — Foley & Lardner LLP(57) **ABSTRACT**

This invention relates to a new and distinct variety of strawberry plant named 'TRIUMPH'. This new strawberry plant named 'TRIUMPH' is primarily adapted to the growing conditions of the central coast of California, and is primarily characterized by its medium to large plant size, occasional fourth leaflet per tri-foliate, moderate to heavy petiole pubescence, medium to long fruiting trusses, and very attractive, medium-sized berry with good gloss, even red color and conical shape.

5 Drawing Sheets**1**

Latin name of the genus and species of the plant claimed:
Fragaria ananassa.

Variety denomination: 'TRIUMPH'.

BACKGROUND OF THE INVENTION

The present invention relates to a new and distinct strawberry variety named 'TRIUMPH'. This new variety is a result of a controlled cross made in 2003 in an ongoing breeding program between strawberry variety designated 'PS-3003' (non-patented selection) and strawberry variety designated 'PS-4634' (patented, U.S. Plant Pat. No. 17,487). Due to the combining of the reciprocal seed lots, it is unknown as to which parent variety is the seed parent and which parent variety is the pollen parent. The variety is botanically known as *Fragaria ananassa*.

The seedling resulting from the aforementioned cross was selected from a controlled breeding plot in Ventura County, Calif. in the fall of 2005. After its selection, the new variety was asexually propagated by stolons in both San Joaquin County, Calif. and Siskiyou County, Calif. The new variety was extensively tested over the next several years in fruiting fields in Ventura County, Calif. This propagation has demonstrated that the combination of traits disclosed herein as characterizing the new variety are fixed and remain true to type through successive generations of asexual reproduction.

BRIEF SUMMARY OF THE INVENTION

'TRIUMPH' is primarily adapted to the climate and growing conditions of the central coast of California. The nearby Pacific Ocean provides the needed humidity and moderate

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temperatures to produce a strong vigorous plant and maintain fruit quality during the fall production months.

The following traits have been repeatedly observed and are determined to be unique characteristics of 'TRIUMPH', which in combination distinguish this strawberry plant as a new and distinct variety:

1. Medium to large plant size;
2. Occasionally has a fourth leaflet per tri-foliate;
3. Moderate to heavy petiole pubescence;
4. Medium to long fruiting trusses; and
5. Very attractive, medium-sized berry with good gloss, even red color and conical shape.

The strawberry variety that is believed to be most closely related to the new variety 'TRIUMPH' is 'VALOR' (patented, U.S. Plant Pat. No. 20,394). In side-by-side comparisons to the similar strawberry variety 'VALOR', 'TRIUMPH' differs by the following combination of characteristics as described in Table 1.

TABLE 1

COMPARISON TO THE STANDARD VARIETY		
Characteristic	'TRIUMPH'	'VALOR' (US PP 20,394)
Fruit: color	Red	Ranges from red to dark red
Fruit: length × width ratio	Slightly longer than broad	As long as broad to slightly longer than broad
Fruit: difference in shape between primary and secondary	Slight	Moderate

TABLE 1-continued

COMPARISON TO THE STANDARD VARIETY		
Characteristic	'TRIUMPH'	'VALOR' (US PP 20,394)
Plant: size	Ranges from medium to large	Medium
Stolon: attitude of hairs	Strongly outward	Upward
Foliage: size	Ranges from medium to large	Medium
Foliage: color	Medium green	Ranges from medium to dark green
Foliage: number of leaflets	Ranges from three to four	Three
Petiole: pubescence	Ranges from moderate to heavy	Sparse
Fruiting truss: length	Ranges from medium to long	Medium
Pedicel: attitude of hairs	Strongly outward	Upward

For identification, a series of molecular markers have been determined for this new variety.

'TRIUMPH' differs from its parents, 'PS-3003' and 'PS-4634', by the following combination of characteristics as described in Table 2.

TABLE 2

COMPARISON TO THE PARENT VARIETIES			
Characteristic	'TRIUMPH'	'PS-3003'	'PS-4634' (US PP 17,487)
Fruit color	Red	Light red	Ranges from orange red to red
Plant size	Ranges from medium to large	Medium	Large
Type of bearing	Everbearing	Everbearing	Summer bearing
Runner production (nursery)	Medium	Ranges from medium to light	Many

BRIEF DESCRIPTIONS OF THE PHOTOGRAPHS

The accompanying color photographs illustrate the overall appearance of typical specimens of the new strawberry variety 'TRIUMPH', at various stages of development as true as it is reasonably possible with color reproductions of this type. Color in the photographs may differ slightly from the color value cited in the botanical descriptions which accurately describe the color of 'TRIUMPH'. The depicted plant and plant parts of the new strawberry variety 'TRIUMPH' are between three and four months old. The photographs were taken in Ventura County, Calif.:

FIG. 1 shows typical fruiting field characteristics of 'TRIUMPH', taken in the month of November 2012;

FIG. 2 shows a close-up view of the typical leaf structure of 'TRIUMPH', taken in the month of October 2012;

FIG. 3 shows a close-up view comparing leaf structure of 'TRIUMPH', taken in the month of October 2012;

FIG. 4 shows typical mature and immature field fruit of 'TRIUMPH', taken in the month of October 2012; and

FIG. 5 shows typical internal and external mature fruit characteristics of 'TRIUMPH', taken in the month of November 2012.

DETAILED BOTANICAL DESCRIPTION

The new variety 'TRIUMPH' has not been observed under all possible environmental conditions. The characteristics of

the new variety 'TRIUMPH' may vary in detail, depending upon variations in environmental factors, including weather (temperature, humidity and light intensity), day length, soil type and location. In addition, the characteristics of any parental variety or comparison variety included in Tables 1-9 of the present invention may vary in detail, depending upon variations in environmental factors, including weather (temperature, humidity and light intensity), day length, soil type and location.

The aforementioned photographs, together with the following description of the new variety 'TRIUMPH', unless otherwise noted, are based on observations taken during the 2012 growing season in Ventura County, Calif. These measurements and ratings were taken from plants of 'TRIUMPH' dug from a low-elevation nursery located in San Joaquin County, Calif. during January 2012 and planted six months later in Ventura County, Calif. The approximate age of the observed plants is between three and four months. Yield observations and fruit quality characteristics are averaged from four years of data collected from the 2008 through 2011 growing seasons. Flower measurements and characteristics are from secondary flowers unless otherwise noted. Fruit characteristics and measurements are from secondary fruit unless otherwise noted.

Color terminology where noted follows The Royal Horticultural Society Colour Chart, London (2007).

The following tables 3 through 9 describe fruit, plant, stolon, foliage, fruiting truss, flower and pest disease characteristics of the new strawberry 'TRIUMPH' in comparison to the similar strawberry variety 'VALOR'.

TABLE 3

FRUIT CHARACTERISTICS		
Characteristic	'TRIUMPH'	'VALOR' (US PP 20,394)
Color of mature fruit	RHS 44A Red	RHS 46A Ranges from red to dark red
Color of internal flesh	RHS 44B Medium red	RHS 45A Ranges from medium red to dark red
Color of core	RHS 44C Light red	RHS 45B Medium red
Fruit length (cm)	4.3	3.7
Fruit width (cm)	3.6	3.5
Fruit length/width ratio	1.24	1.05
Calyx diameter (cm)	4.9	4.7
Average fruit weight (gm)	21.5	22.0
Achene color, shaded side	RHS 160A Greyed yellow group	RHS 160A Greyed yellow group
Achene color, sun-exposed side	RHS 182A Greyed red group	RHS 183A Greyed red group
Achenes per berry	311	382
Achene weight (mg)	0.62	0.43
Marketable fruit yield (gm/plant)	583	528
Fruit size	Medium	Ranges from medium to large
Predominant fruit shape	Conical	Conical
Difference in shapes between primary and secondary fruit	Slight	Ranges from slight to moderate
Band without achenes	Absent or very narrow	Absent or very narrow

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TABLE 3-continued

FRUIT CHARACTERISTICS		
Characteristic	'TRIUMPH'	'VALOR' (US PP 20,394)
Unevenness of fruit surface	Weak	Weak
Evenness of fruit color	Even	Even
Fruit glossiness	Ranges from medium to strong	Ranges from medium to strong
Insertion of achenes	Level with surface	Ranges from below surface to level with surface
Insertion of calyx	In the basin	In the basin
Attitude of calyx	Spreading	Spreading
Size of calyx in relation to fruit diameter	Slightly larger	Slightly larger
Adherence of calyx	Strong	Strong
Firmness of fruit flesh	Ranges from medium to firm	Firm
Keeping quality	Very good	Very good
Distribution of red color of the flesh	Marginal and central	Marginal and central
Hollow center expression	Weak	Absent or very weak
Fruit flavor	Ranges from very good to good	Good
Soluble solids (% brix)	7.3	7.6
Time of first flowering	Early	Ranges from early to medium
Time of first harvesting	Early	Ranges from early to medium
Harvest period	Late September to mid December	Late September to mid December
Type of bearing	Fully remontant (everbearing)	Fully remontant (everbearing)

TABLE 4

PLANT CHARACTERISTICS		
Characteristic	'TRIUMPH'	'VALOR' (US PP 20,394)
Plant height (cm)	25.8	23.0
Plant spread (cm)	35.4	29.9
Crowns per plant	3.5	5.3
Plant size	Large	Medium
Plant habit	Upright	Upright
Plant density	Medium	Medium
Plant vigor	Strong	Medium

TABLE 5

STOLON CHARACTERISTICS		
Characteristic	'TRIUMPH'	'VALOR' (US PP 20,394)
Stolon color	RHS 146C Yellow green group	RHS 144A Yellow green group
Stolon anthocyanin coloration	RHS 180C Greyed red group	RHS 180A Greyed red group
Stolon anthocyanin intensity	Weak	Ranges from weak to medium
Stolon pubescence	Dense	Dense
Attitude of hairs	Strongly outward	Upward
Average stolon quantity (nursery)	Medium	Few
Average stolon diameter at bract (mm)	3.4	3.3

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TABLE 6

FOLIAGE CHARACTERISTICS		
Characteristic	'TRIUMPH'	'VALOR' (US PP 20,394)
Foliage:		
Color of upper surface	RHS 137A Medium green	RHS N 137B Ranges from medium green to dark green
Color of underside	RHS 147C Yellow green group	RHS 147C Yellow green group
Number of leaflets	Ranges from 3 to 4	3
Shape in cross section	Slightly concave	Slightly concave to flat
Interveinal blistering	Medium	Medium
Leaf glossiness	Medium	Medium
Leaf variegation	Present	Present
Terminal Leaflet:		
Length (cm)	9.7	7.7
Width (cm)	8.3	8.0
Leaf size	Ranges from large to medium	Medium
Length/width ratio	1.18	0.97
Shape of base	Longer than broad	As long as broad
Shape of teeth	Acute	Obtuse
Serrations per leaf	22.5	20.3
Petiole:		
Petiole color	RHS 146C Yellow green group	RHS 144A Yellow green group
Petiole length (cm)	18.7	16.3
Petiole diameter (mm)	3.8	3.8
Petiolule color	RHS 146C Yellow green group	RHS 144A Yellow green group
Petiolule length (mm)	16.4	12.4
Attitude of hairs	Slightly outward	Slightly outward
Petiole pubescence	Ranges from heavy to moderate	Sparse
Stipule:		
Color	146C Yellow green group	146A Yellow green group
Anthocyanin coloration	None	RHS 61A Red purple group
Anthocyanin intensity	Absent or very weak	Weak
Length (mm)	18.8	18.8
Width (mm)	9.5	10.8

TABLE 7

FRUITING TRUSS CHARACTERISTICS		
Characteristic	'TRIUMPH'	'VALOR' (US PP 20,394)
Anthocyanin coloration	RHS 181D Greyed red group	RHS 181C Greyed red group
Anthocyanin intensity	Absent or very weak	Absent or very weak
Length at maturity (cm)	32.4	28.4
Position relative to foliage	Ranges from beneath to level with	Level with
Number of flowers	Medium	Medium
Pedicel attitude of hairs	Strongly outward	Upward
Pubescence	Strong	Ranges from medium to strong
Attitude at first pick	Prostrate	Prostrate

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TABLE 8

FLOWER CHARACTERISTICS		
Characteristic	'TRIUMPH'	'VALOR' (US PP 20,394)
Petal color	RHS NN 155C White group	RHS NN 155C White group
Sepal color	RHS 137B Green group	RHS 137A Green group
Receptacle color	RHS 147C Green group	RHS 147C Green group
Anther color	RHS 15A Yellow orange group	RHS 14B Yellow orange group
Corolla diameter (mm)	32.0 Medium	29.8 Medium
Calyx diameter (mm)	36.0	31.7
Petal length (mm)	11.7	12.0
Petal width (mm)	11.6	11.7
Petal length/width ratio	1.01 As long as broad	1.03 As long as broad
Petals/flower	6.4	6.0
Sepal length (mm)	13.7	13.8
Sepal width (mm)	5.3	6.4
Sepal length/width ratio	2.60	2.18
Sepals/flower	13.6	12.3

TABLE 8-continued

FLOWER CHARACTERISTICS		
Characteristic	'TRIUMPH'	'VALOR' (US PP 20,394)
Size of calyx relative to corolla	Larger	Larger
Stamen	Present	Present
Size of inner calyx relative to outer calyx	Ranges from smaller to same	Smaller
Relative position of petals	Overlapping	Ranges from touching to overlapping

TABLE 9

PEST AND DISEASE REACTIONS		
Characteristic	'TRIUMPH'	'VALOR' (US PP 20,394)
Powdery mildew	Susceptible	Susceptible
Angular leaf spot	Moderately susceptible	Moderately susceptible
Botrytis fruit rot	Moderately susceptible	Moderately susceptible
Two-spotted spider mite	Moderately susceptible	Moderately susceptible
Lygus bug	Susceptible	Susceptible
Flower thrips	Moderately resistant	Moderately susceptible

We claim:

1. A new and distinct strawberry plant named 'TRIUMPH', as herein described and illustrated by the characteristics set forth above.

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* * * * *

FIG. 1



FIG. 2

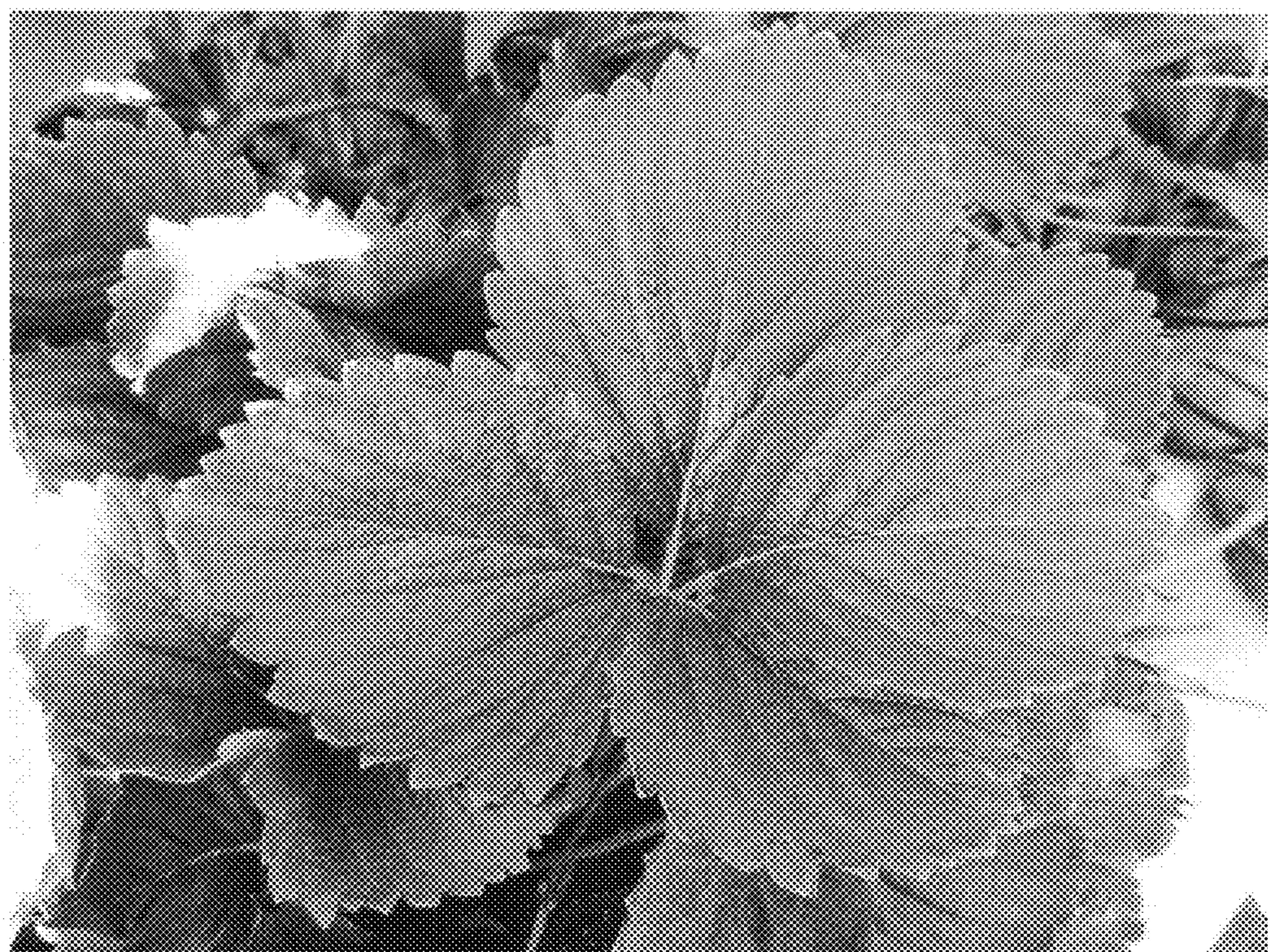


FIG. 3

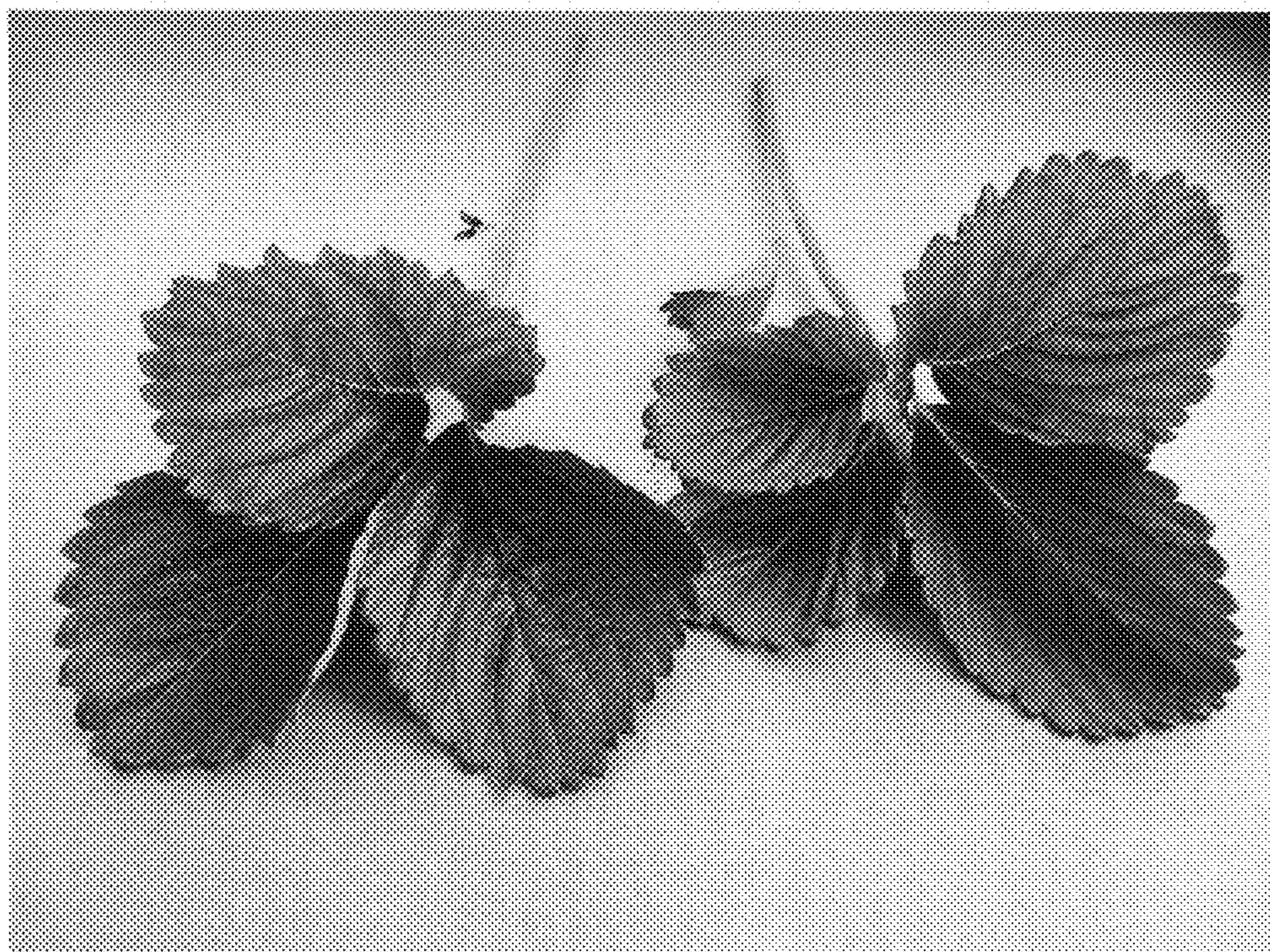


FIG. A

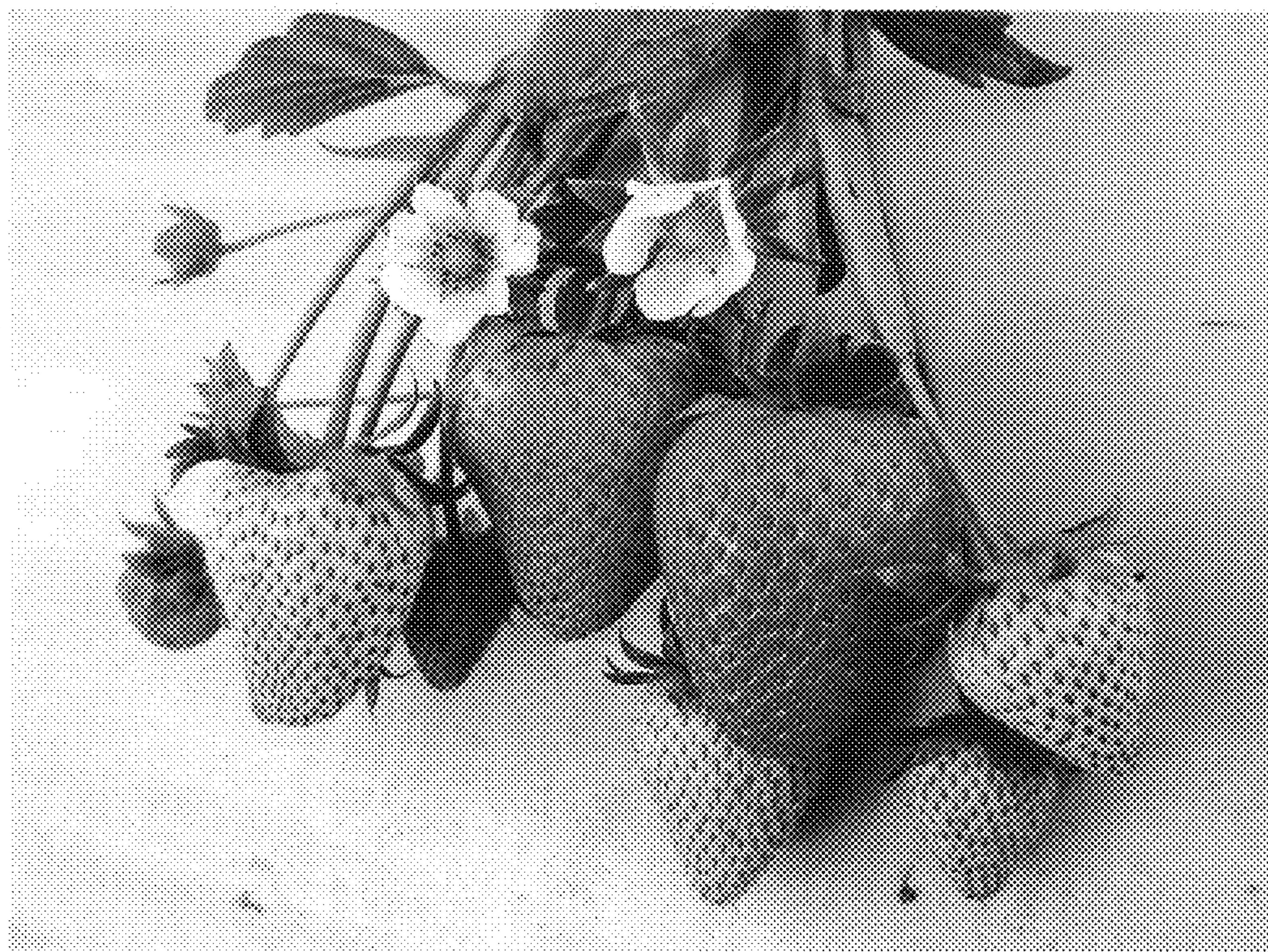


FIG. 5

