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(54) **CALIBRACHOA PLANT NAMED**  
**'KAKEGAWA S71'**

(50) Latin Name: *Calibrachoa* species  
Varietal Denomination: **Takegawa S71**

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(57) **ABSTRACT**

'Takegawa S71' is a new variety of *Calibrachoa* plant. This  
new variety has light orange petal lobes with darker orange  
veins and yellow corolla tube and dark green foliage.

**1 Drawing Sheet**

**1**

Genus/species: *Calibrachoa* species.  
Varietal denomination: 'Takegawa S71'.

**BACKGROUND OF THE INVENTION**

'Takegawa S71' originated from a hybridization made in  
February 2000 in Kakegawa, Japan. The female parent was  
a *Calibrachoa* breeding line with red-orange colored flowers  
and semi-creeping habit known as 0B-11. The male parent  
was a *Calibrachoa* 'Takegawa S52' (U.S. Plant Pat. No.  
15,046).

In August 2000, F<sub>1</sub> seed was sown from this cross and  
eighty plants were transplanted to outdoors. These plants  
ranged from mounding to semi-creeping habit and orange to  
rose flower color. One plant with semi-creeping habit, light  
orange petals and red-orange petal mid-veins was selected  
and vegetatively propagated. In February 2001, this selec-  
tion was vegetatively propagated again and evaluated in 9  
cm hanging pots in a greenhouse and in an open field.

The selection was further evaluated from new vegetative  
plants in Salinas, Calif. during 2002. The selection was  
subsequently named 'Takegawa S71'. 'Takegawa S71' was  
asexually reproduced by stem cuttings in Salinas, Calif. and  
was determined to have its characteristics firmly fixed in  
successive generations of asexual propagation.

**DESCRIPTION FOR PHOTOGRAPH**

This new *Calibrachoa* plant is illustrated by the accom-  
panying photograph which shows blooms and foliage of the  
plant in full color. The colors shown being as true as can be  
reasonably obtained by conventional photographic proce-  
dures.

FIG. 1 shows a close-up view of flowers.

FIG. 2 shows the entire plant.

**DESCRIPTION OF THE GENUS CALIBRACHOA**  
**LLAVE & LEX**

The genus *Petunia* was originally established in 1803 by  
A. L. Jussieu, who described both *P. parviflora* and *P.*  
*nyctaginiflora* as type species. Using a non-horticultural  
system that selected the first mentioned species as the type

**2**

species (lectotype), N. L. Britton and H. A. Brown declared  
*P. parviflora* as the type species for *Petunia* in 1913.

During the 1980's and 1990, H. J. Wijsman published a  
series of articles regarding the ancestry of *P. hybrida*, the  
Garden *Petunia*, and the inter-relationship of several species  
classified as *Petunia*. These studies discovered that *P.*  
*hybrida* and its ancestral species, *P. nyctaginiflora* (= *P.*  
*axillaris*) and *P. violacea* (= *P. integrifolia*), possessed 14  
pairs of chromosomes while several other species, including  
*P. parviflora*, possessed 18 pairs of chromosomes. Since *P.*  
*parviflora* was the lectotype species for the *Petunia* genus,  
Wijsman and J. H. de Jong proposed transferring the 14  
chromosome species to the genus *Stimoryne*. Horticulturists  
opposed reclassifying the Garden *Petunia* and in 1986,  
Wijsman proposed the alternative of making *P. nyctagini-*  
*flora* the lectotype species for *Petunia* and transferring the  
18 chromosome species to another genus. The I. N. G.  
Committee adopted this proposal. By 1990, Wijsman had  
transferred several species, including *P. parviflora* (= *C.*  
*parviflora*) to *Calibrachoa*, originally established by Llave  
and Lexarza in 1825. *Calibrachoa parviflora* (= *C. mexicana*  
Llave & Lexarza) is now the type species for the genus  
*Calibrachoa*.

Classification of the current *Petunia* and *Calibrachoa*  
species is still in progress. New species are also being  
identified. Consequently, a proper description has not been  
written for the *Calibrachoa* genus. *Calibrachoa* can,  
however, be distinguished from *Petunia* based on the higher  
chromosome number, chromosome morphology, plant  
branching habit and type of flower bud aestivation. Whereas  
*Petunia* species bear a flower peduncle and one new stem  
from a node, *Calibrachoa* bear a flower peduncle and three  
stems. *Petunia* species have a cochlear corolla bud, a single  
outermost petal covers the other four, radially folded and  
terminally contorted petals. *Calibrachoa* flower buds are flat  
with all five petals linearly folded and the two lower petals  
forming a cover around the three other petals and fused  
together.

**ENVIRONMENTAL CONDITIONS FOR PLANT**  
**GROWTH**

The terminal 1.0 to 1.5 inches of an actively growing stem  
was excised. The vegetative cuttings were propagated in five



to six weeks. The base of the cuttings were dipped for 1 to 2 seconds in a 1:9 solution of DIP 'N GROW (1 DIP 'N GROW:9 water) root-inducing solution immediately prior to sticking into the cells trays. Cuttings were stuck into plastic cell trays having 98 cells and containing a moistened peat moss-based growing medium. The cuttings were misted with water from overhead for 10 seconds every 30 minutes until sufficient roots were formed.

Rooted cuttings were transplanted and grown in 20 cm diameter plastic pots in a glass greenhouse located in Salinas, Calif. Pots contained a peat moss-based growing medium. Soluble fertilizer containing 20% nitrogen, 10% phosphorus and 20% potassium was applied once a day or every other day by overhead irrigation. Pots were top-dressed with a dry, slow release fertilizer containing 20% nitrogen, 10% phosphorus and 18% potassium. The typical average air temperature was 24° C.

#### DETAILED DESCRIPTION OF THE NEW PLANT

Data below collected on plants three months from rooted cutting. Five plants grown in 20 cm diameter pots were transplanted to a 41 cm hanging basket. Color references are to The R.H.S. Colour Chart of The Royal Horticultural Society of London (R.H.S.). The following traits and characteristics describe the new variety.

##### Classification:

*Family*.—Solanaceae.

*Species*.—*Calibrachoa* sp.

*Common names*.—*Calibrachoa*.

##### Parentage:

*Female parent*.—Breeding line 0B-11.

*Male parent*.—'Kakegawa S52' (U.S. Plant Pat. No. 15,046).

##### Growth:

*Habit*.—Decumbent.

*Height*.—23.0 cm.

*Spread*.—115.0 cm when grown in a 41 cm hanging basket or pot, and using five 20 cm potted plants in the hanging basket.

*Life cycle*.—Perennial.

*Form*.—Branching.

*Time to produce a rooted cutting*.—6 weeks.

*Time to bloom from propagation*.—10 weeks.

*Flowering requirements*.—Will flower so long as day length is greater than 12 hours and temperatures exceed 13° C.

*Resistance/susceptibility*.—Excellent resistance to rain, heat and drought. Will not tolerate temperatures below 10° C. Plants are susceptible to *Botrytis*, powdery mildew, various stem and root rots and certain viruses, like Tobacco Mosaic Virus and Impatiens Necrotic Spotted Virus. Plants can be infested with aphids, leafminer, whitefly and various Lepidoptera.

##### Stems:

*Stem color*.—RHS 144B (yellow-green).

*Anthocyanin color*.—RHS N77A (purple).

*Pubescence*.—Heavy.

*Pubescence color*.—RHS N155A (white).

*Stem description*.—Round.

*Stem length*.—3.5 cm–4.0 cm.

*Stem diameter*.—2.0 mm.

*Internode length*.—1.5–2.5 cm.

##### Leaves:

*Leaf arrangement*.—Alternate.

*Leaf shape*.—Elliptical.

*Leaf tip*.—Mucronate.

*Leaf base*.—Decurrent.

*Leaf margin*.—Entire.

*Leaf surface*.—Rough, dull.

*Leaf length*.—2.0 cm.

*Leaf width*.—1.0 cm.

*Leaf color*.—Upper surface: RHS 137A (green); lower surface: RHS 139B (green).

*Leaf surface pubescence*.—Slight.

*Leaf surface pubescence color*.—RHS 155B (white).

*Petiole length*.—2.0 mm.

*Petiole color*.—RHS 138B (green).

*Venation*.—Pinnate.

##### Flowers:

*Inflorescence type*.—Solitary.

*Flowering habit*.—Indeterminate.

*Duration of flower life*.—6 days.

*Shape*.—The flowers are funnel shaped with five fissures and a shallow, yet prominent, indentation of the petal tip at the mid-vein.

*Flower depth*.—2.0 cm–2.2 cm.

*Floral tube length*.—0.8 cm–1.2 cm.

*Floral tube diameter*.—0.5 cm–0.6 cm.

*Flower diameter*.—2.3 cm.

*Calyx*.—5 sepals, free; 1.8 cm×4 mm (L×W).

*Sepal shape*.—Lanceolate.

*Sepal apex*.—Mucronate.

*Sepal margin*.—Entire.

*Sepal color*.—RHS 145B (yellow-green).

*Bud shape*.—Ovate.

*Bud length*.—1.5 cm.

*Bud diameter*.—0.4 cm–0.5 cm.

*Bud surface*.—Pubescent.

*Bud color*.—RHS 150B (yellow-green).

*Peduncle length*.—2.0–2.5 cm.

*Peduncle color*.—RHS 144A (yellow-green).

*Ovary*.—Superior.

*Pistil number*.—1.

*Stigma color*.—RHS 150A (yellow).

*Style color*.—RHS 150B (yellow-green).

*Corolla*.—5 petals, fused.

*Petal shape*.—Spatulate.

*Petal apex*.—Truncate.

*Petal margin*.—Entire.

*Petal pubescence*.—Glabrous.

*Petal size*.—1.5 cm×1.0 cm.

*Petal color*.—Lobes, upper: RHS 37A (red) when young fading to RHS 20A (yellow-orange) with RHS 30D (orange-red) petal veins (mid-veins and secondary veins) prior to senescence; lower RHS 47C (red) when young fading to RHS 15A (yellow)

# US PP15,644 P2

## 5

prior to senescence; Corolla tube: inner RHS 2A (yellow) with RHS 166A (greyed-orange) veins; outer RHS 2A (yellow).

*Stamen number.*—5, free.

*Stamen color.*—RHS 150C (yellow-green).

*Pollen color.*—RHS 10A (yellow).

*Fragrance.*—Absent.

*Seed production.*—None.

### COMPARISON WITH MOST SIMILAR VARIETY

‘Kakegawa S71’ is a distinct variety of *Calibrachoa* owing to its light orange petal lobes with darker veins and yellow corolla tube. ‘Kakegawa S71’ is most similar to the

## 6

variety ‘Sunbelkist’ (U.S. Plant Pat. No. 11,352); however, there are differences as shown in Table 1 below.

TABLE 1

	‘Kakegawa S71’	‘Sunbelkist’
Upper Petal Color	RHS 37A (red) fading to RHS 20A (yellow-orange) with RHS 30D (orange-red) veins.	RHS 45B (red) fading to RHS 9C (yellow) with red veins. There is blending in between the two colors on most of the flowers.

What is claimed is:

1. A new and distinct cultivar of *Calibrachoa* plant as shown and described herein.

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Fig.1



Fig.2