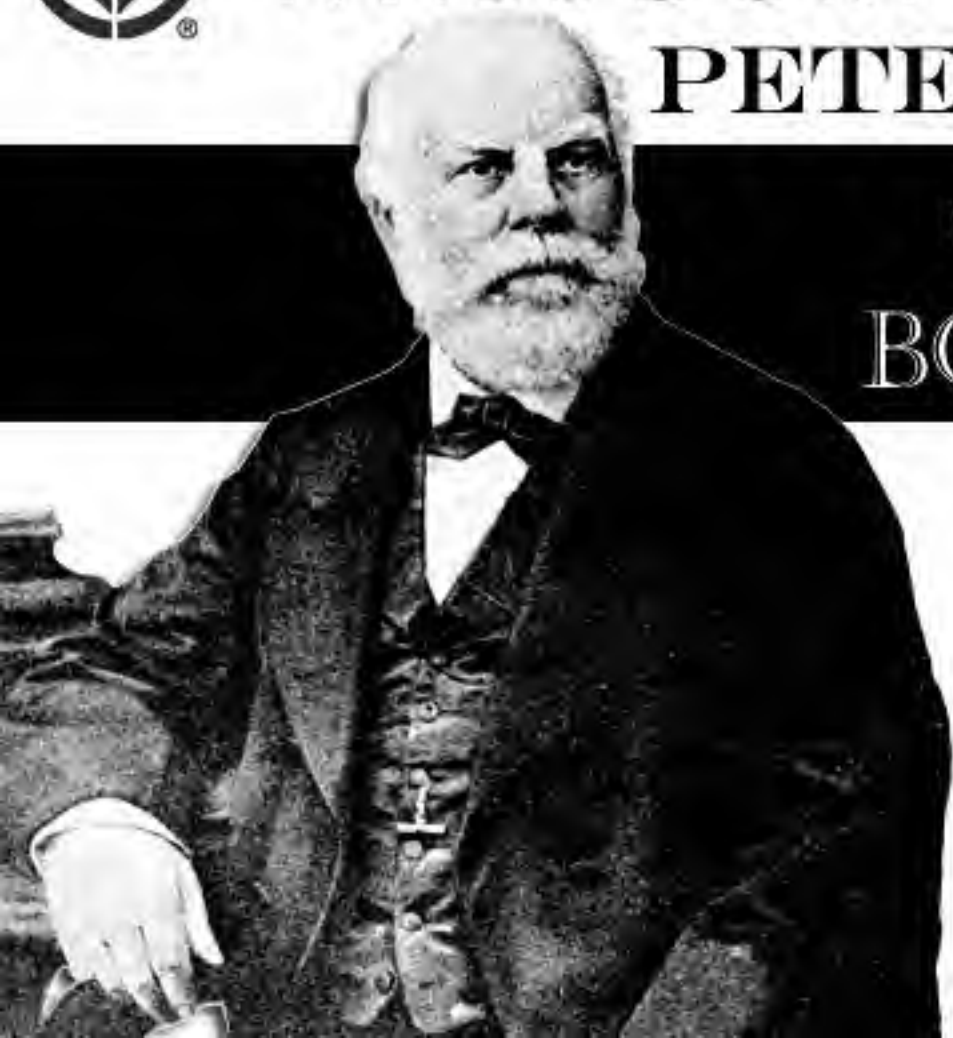




MISSOURI BOTANICAL GARDEN
PETER H. RAVEN LIBRARY



GEORGE ENGELMANN
BOTANICAL NOTEBOOKS

Pagination Note:

Since many of the items lack a specific page number, the page number displayed online refers to the sequentially created number each item was given upon cataloging the materials.

46

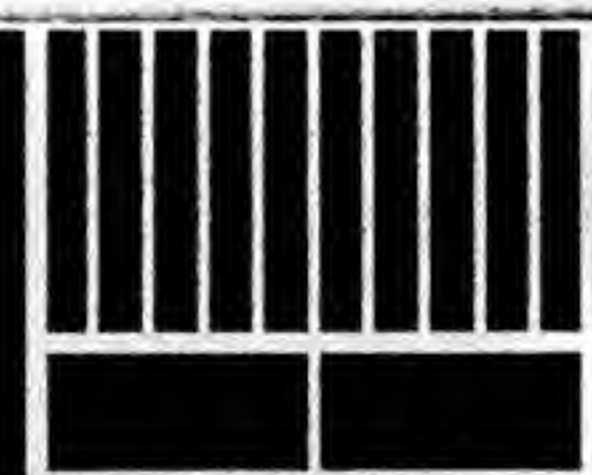
Cass. p. 497

C. tenuiflora Cognac

3. C. Cephalanthi E. St Louis

26. C. tenuiflora E. Snow Wright. 578

(Enclosed 381-385)



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

C. Cephalatti ! Missouri
Beardstown

C. tenuiflora ! Banks of the Missouri

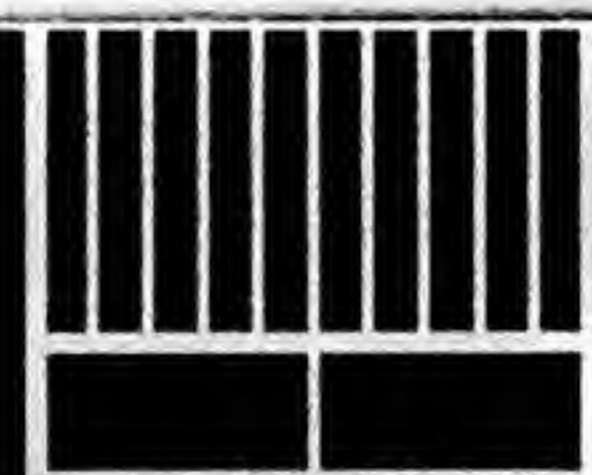
Mimbres ^{to Hayden} Wright 124

1626

1629

Darbotomoxi, Smon 578

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

53 C. tenuiflora Cuyler.
Gray Mavlett.

C. Cephalanthi E. Oliv. Willd. Journ.

53
Illinois, Missouri

Beardstown Illinois Geyer

Banks of upper Missouri Hayden

Minibus, N Mexico Wright 1629 (124)

Barboursville, Iowa " 1626 (578)



0

1

2

3

4

5

6

7

8

9

10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

4783

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS



0
cm

1

2

3

4

5

6

7

8

9

10

copyright reserved



MISSOURI
BOTANICAL
GARDEN

Sketch Oct 13 1882

Ousenta tenuiflora (Sugl.)

growing on
Mentha piperita

U. Springs N.Y.
Oct 12 1882



Corolla (interior)
X5

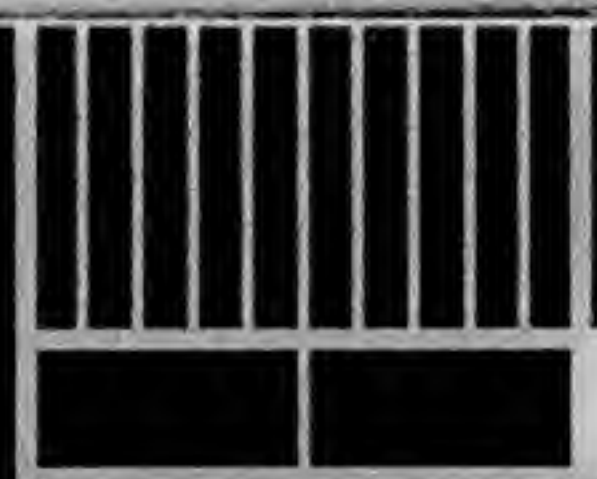


Young pistil X8

W. R. Dudley

[G. C. Cristog. pp. 1.]

Ithaca N.Y.



0 1 2 3 4 5 6 7 8 9 10

cm

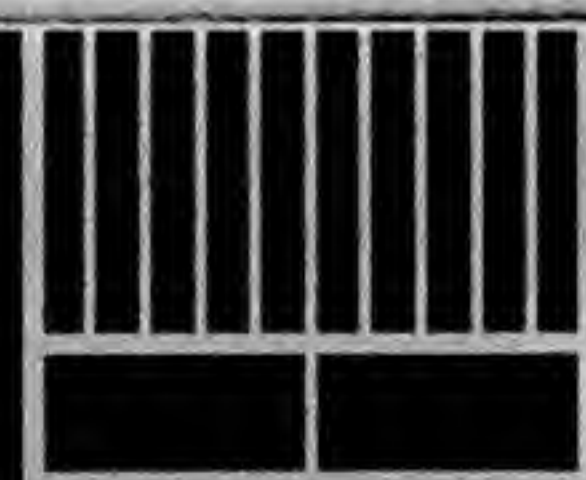
copyright reserved



MISSOURI
BOTANICAL
GARDEN

4784

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved

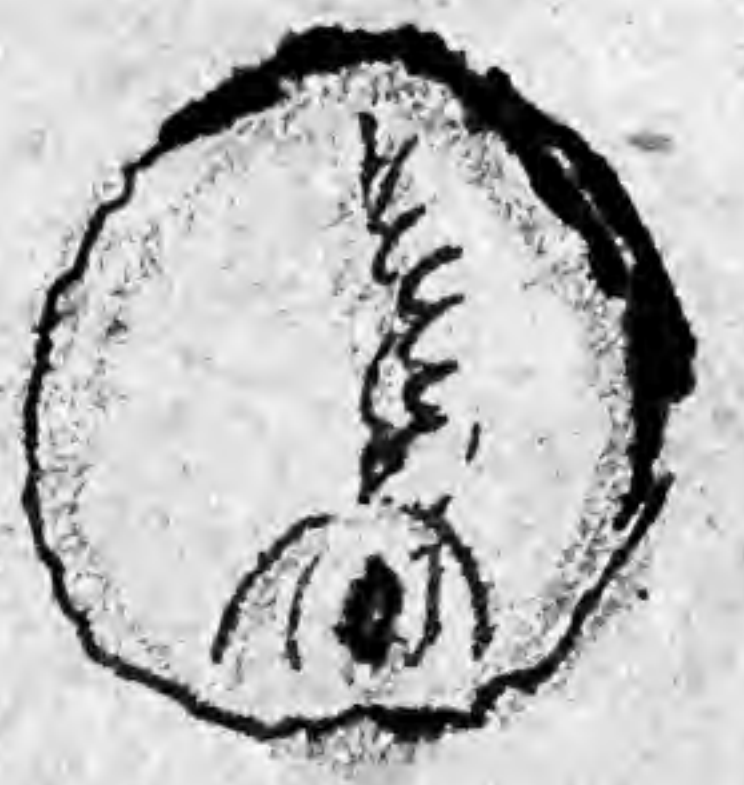
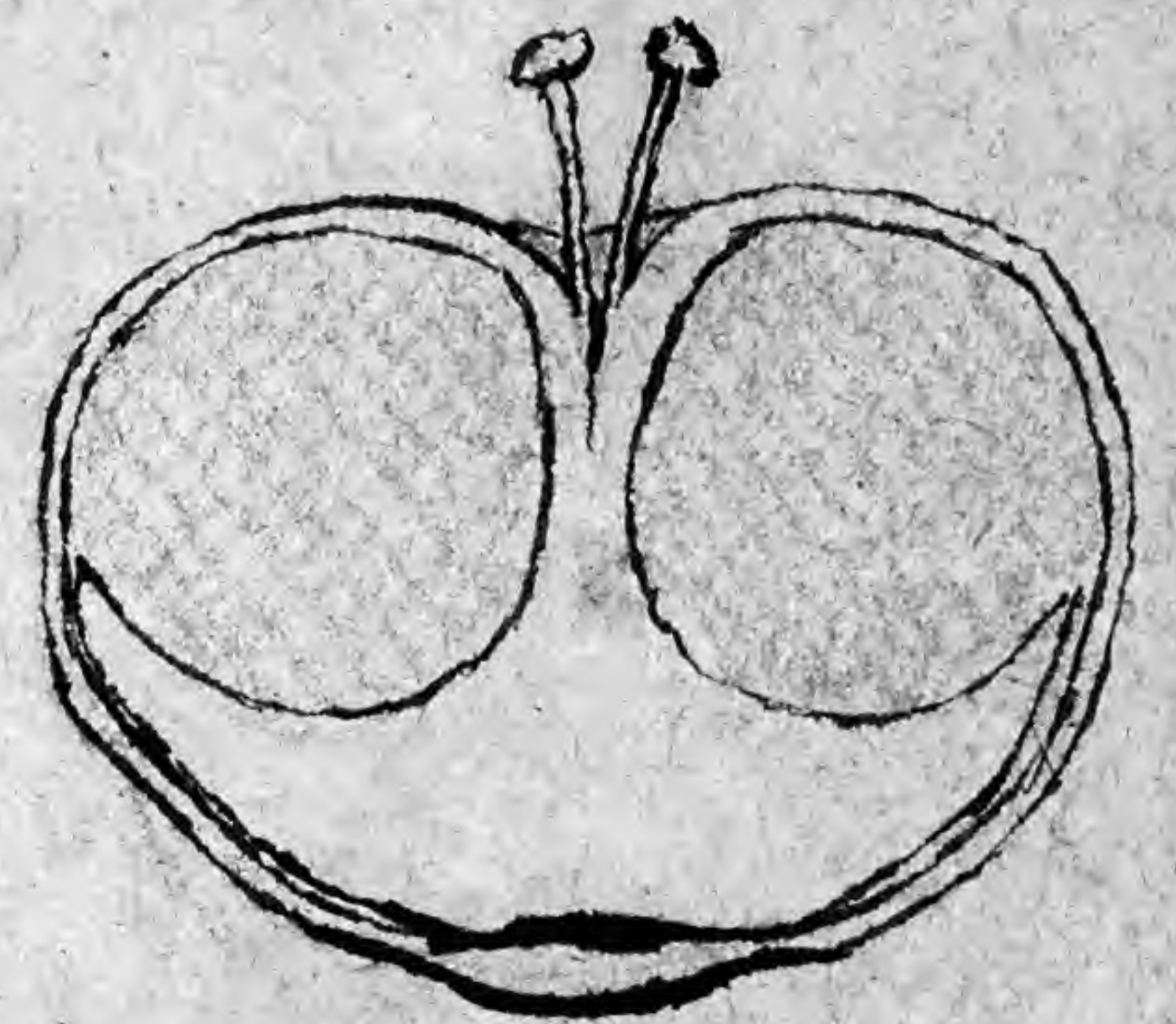
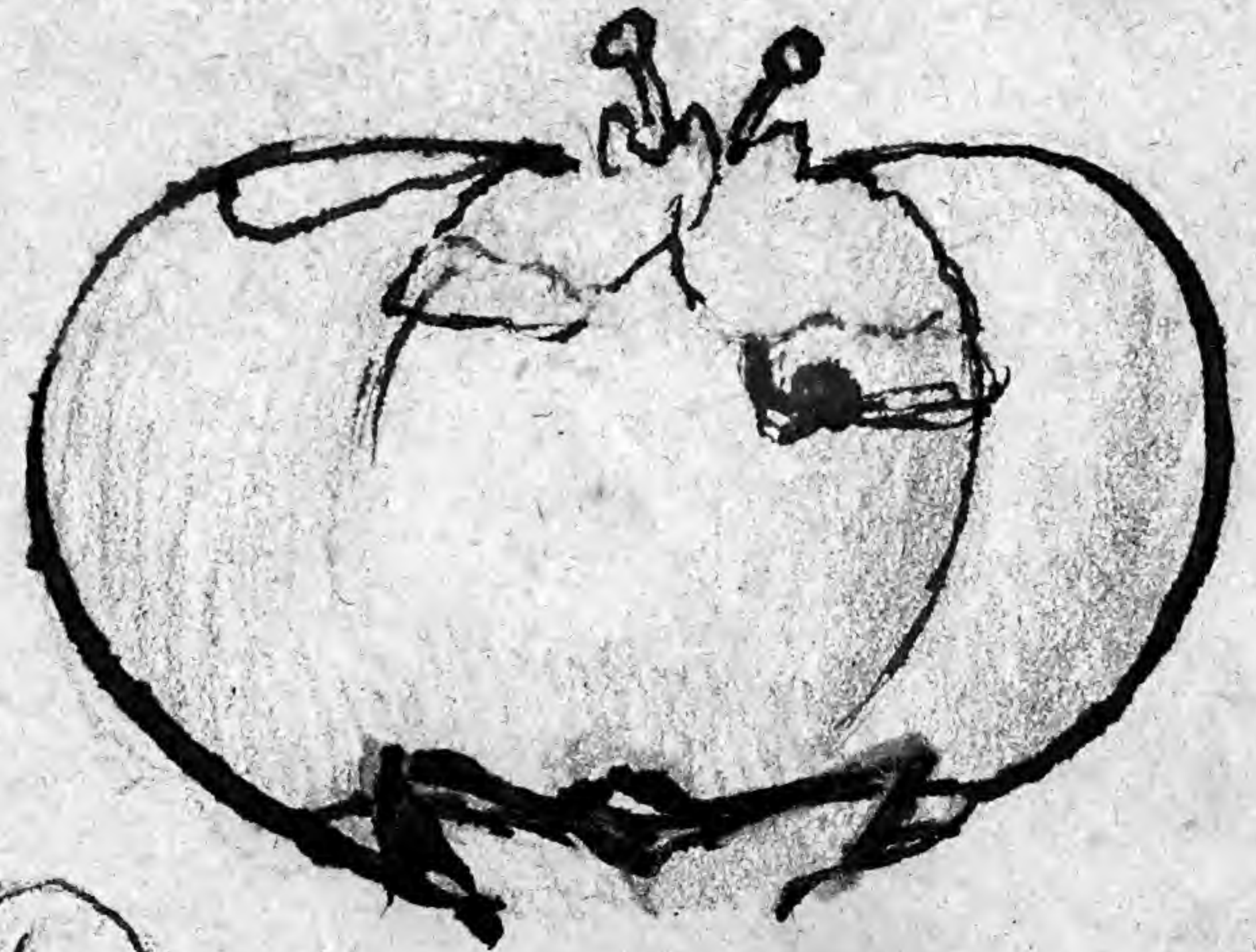
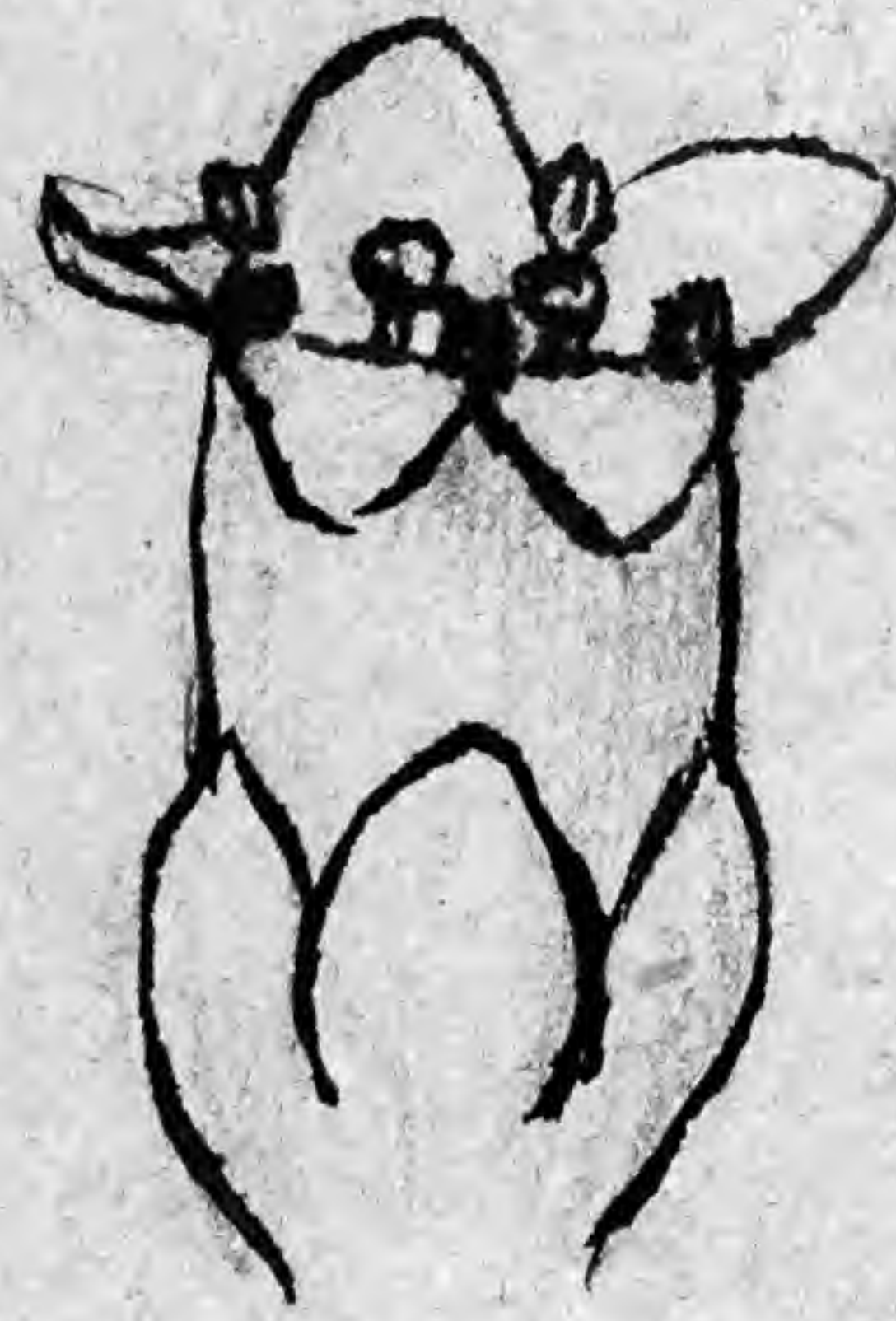
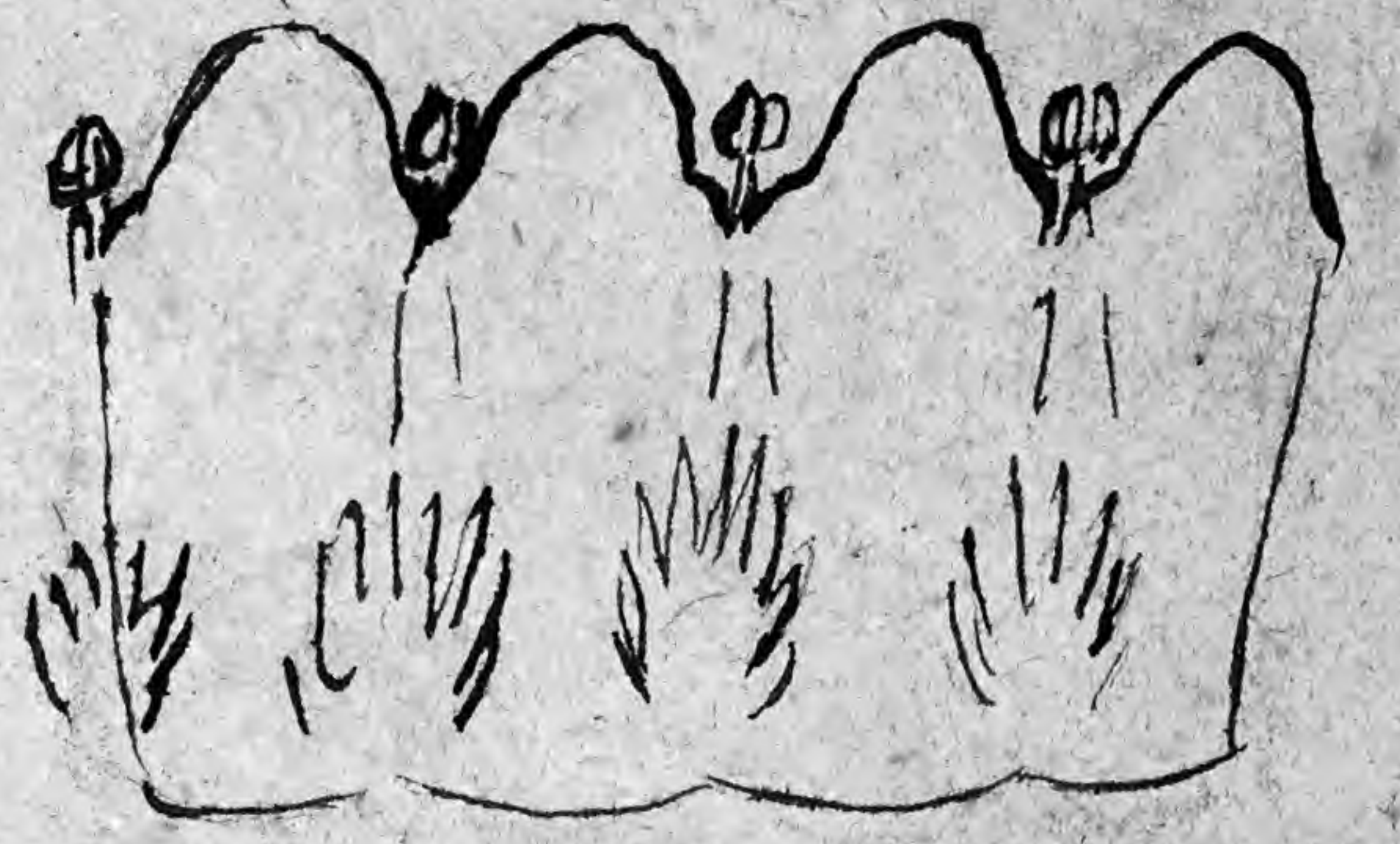
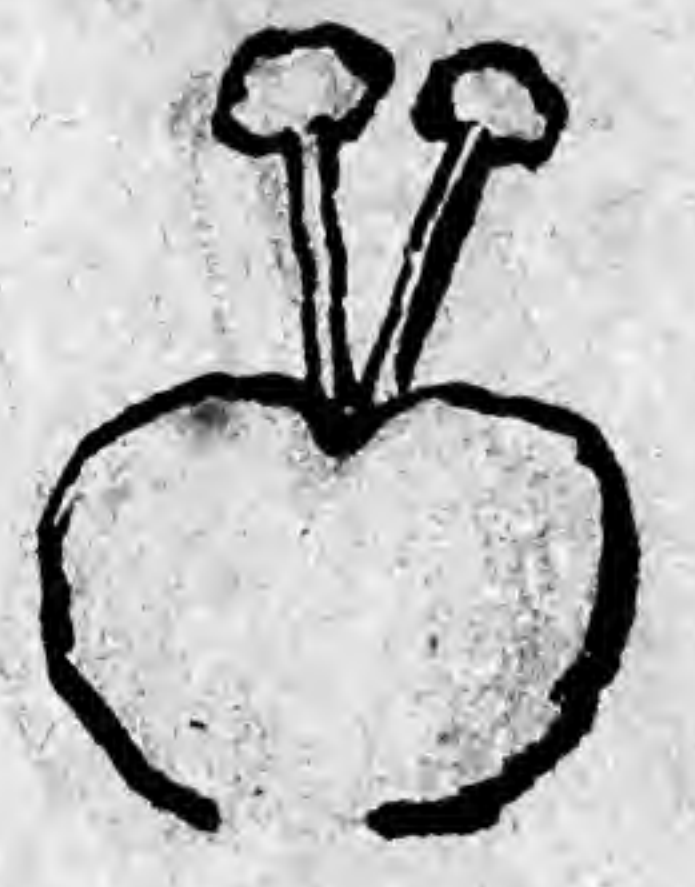
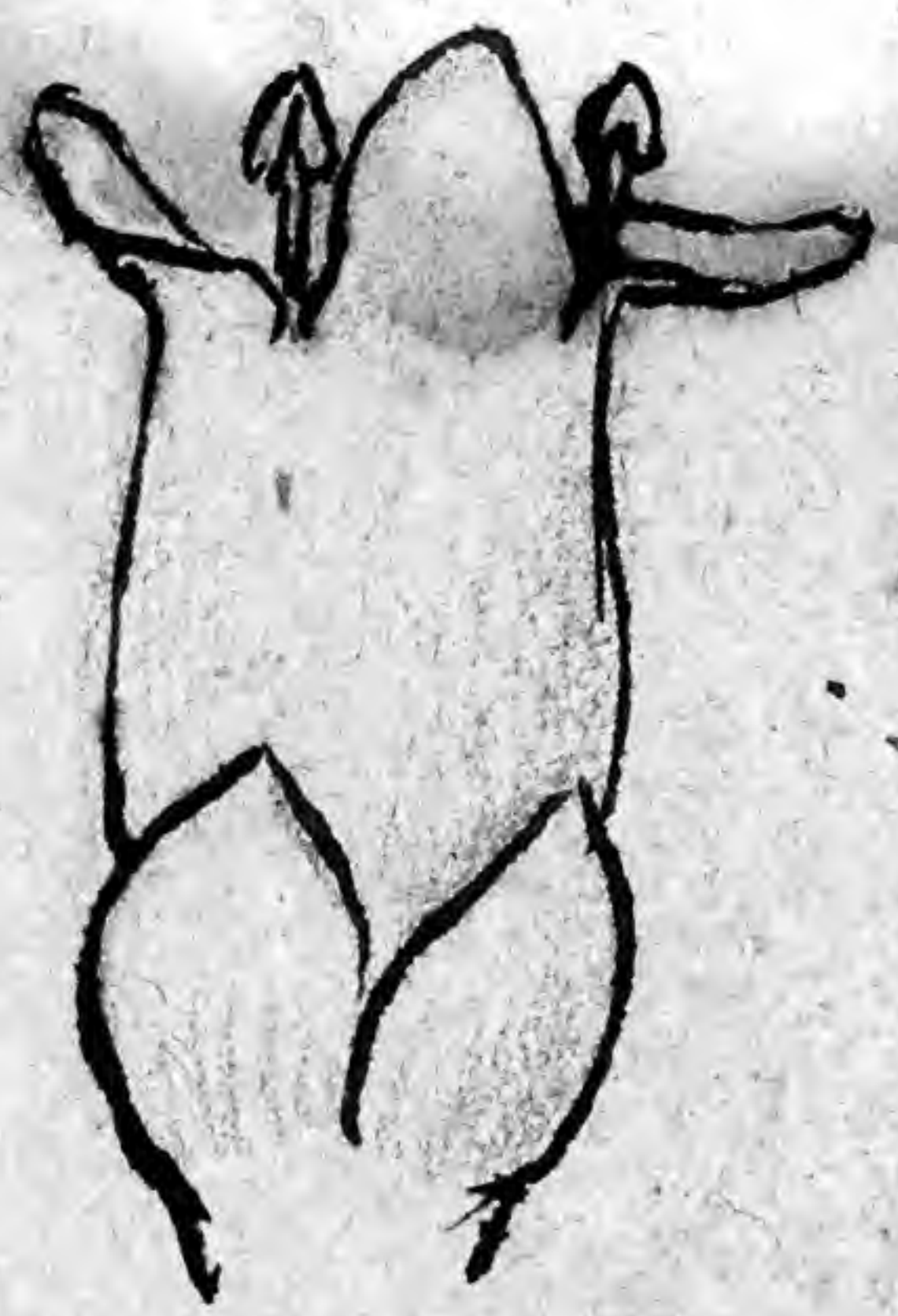


MISSOURI
BOTANICAL
GARDEN

1842 (3)
3) *Ceanothus*

C. tenuiflorus

St Louis
on *Cephalanthus*



seed obs - 0.7 l. by, hilum short
obly linear, often perpendicular



0 1 2 3 4 5 6 7 8 9 10

cm

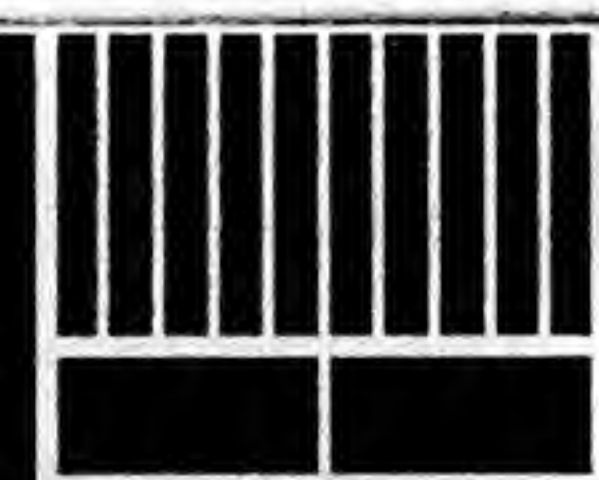
copyright reserved



MISSOURI
BOTANICAL
GARDEN

4785

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

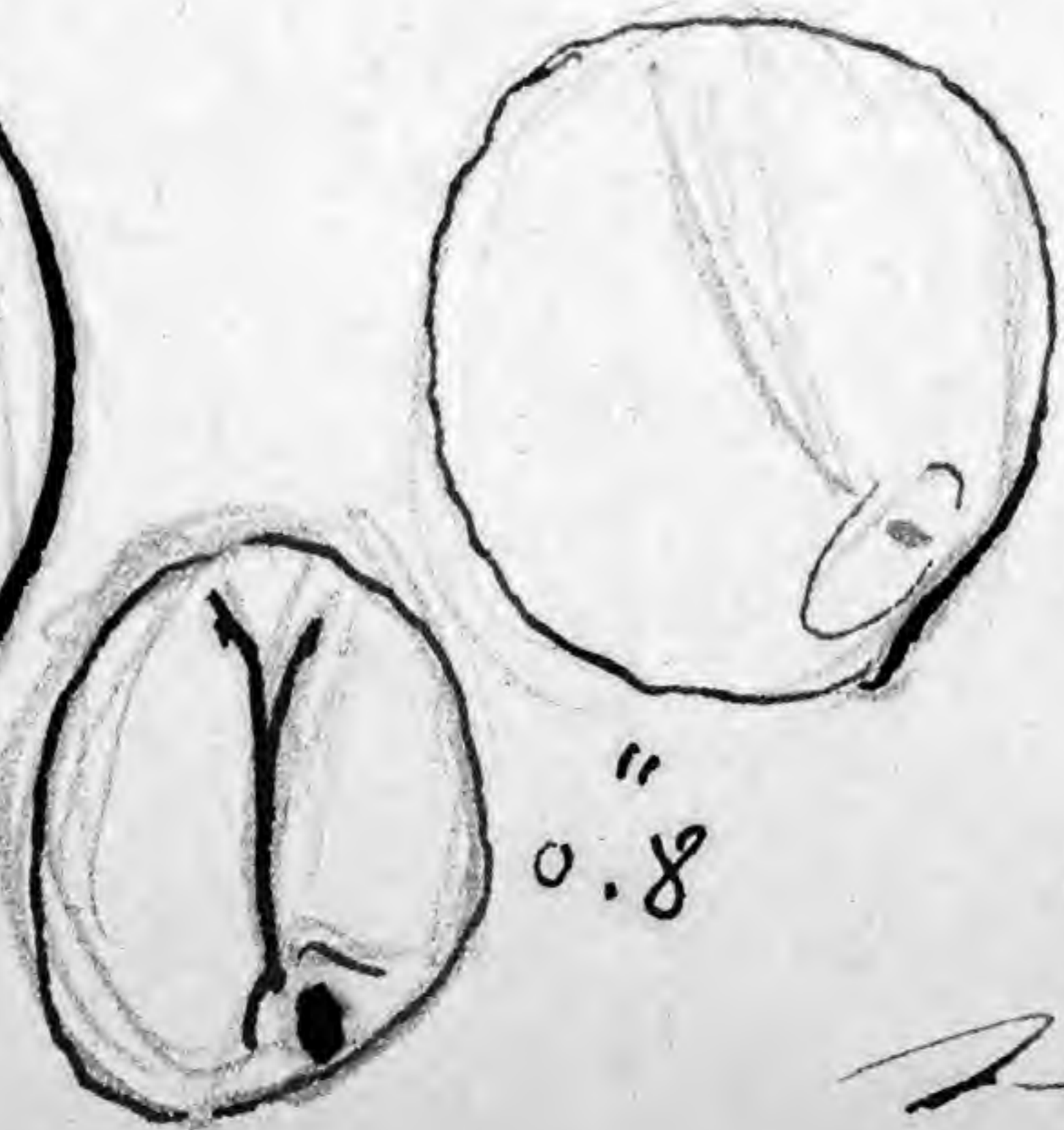
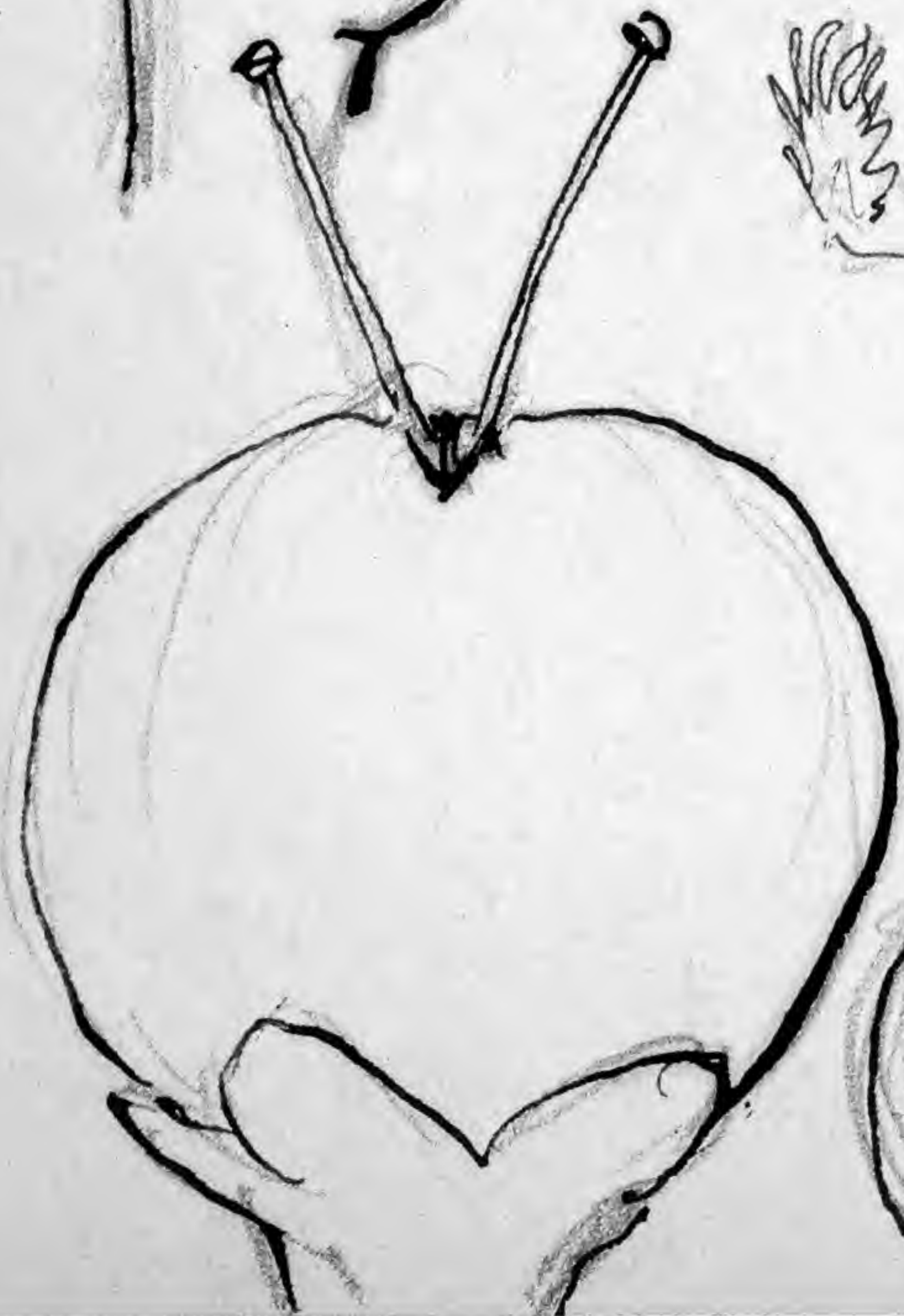
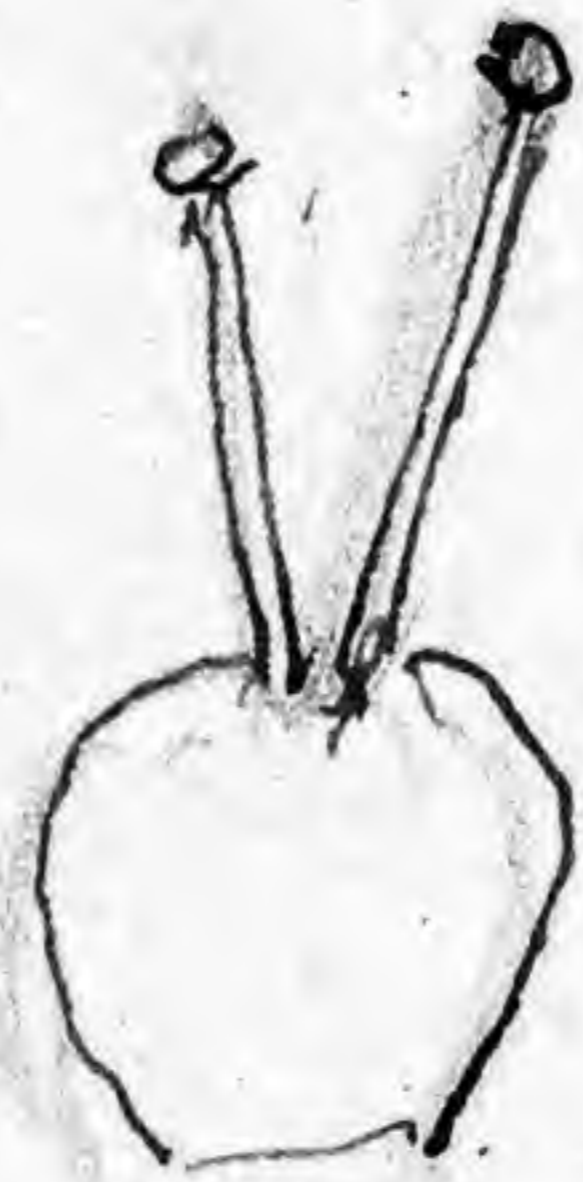
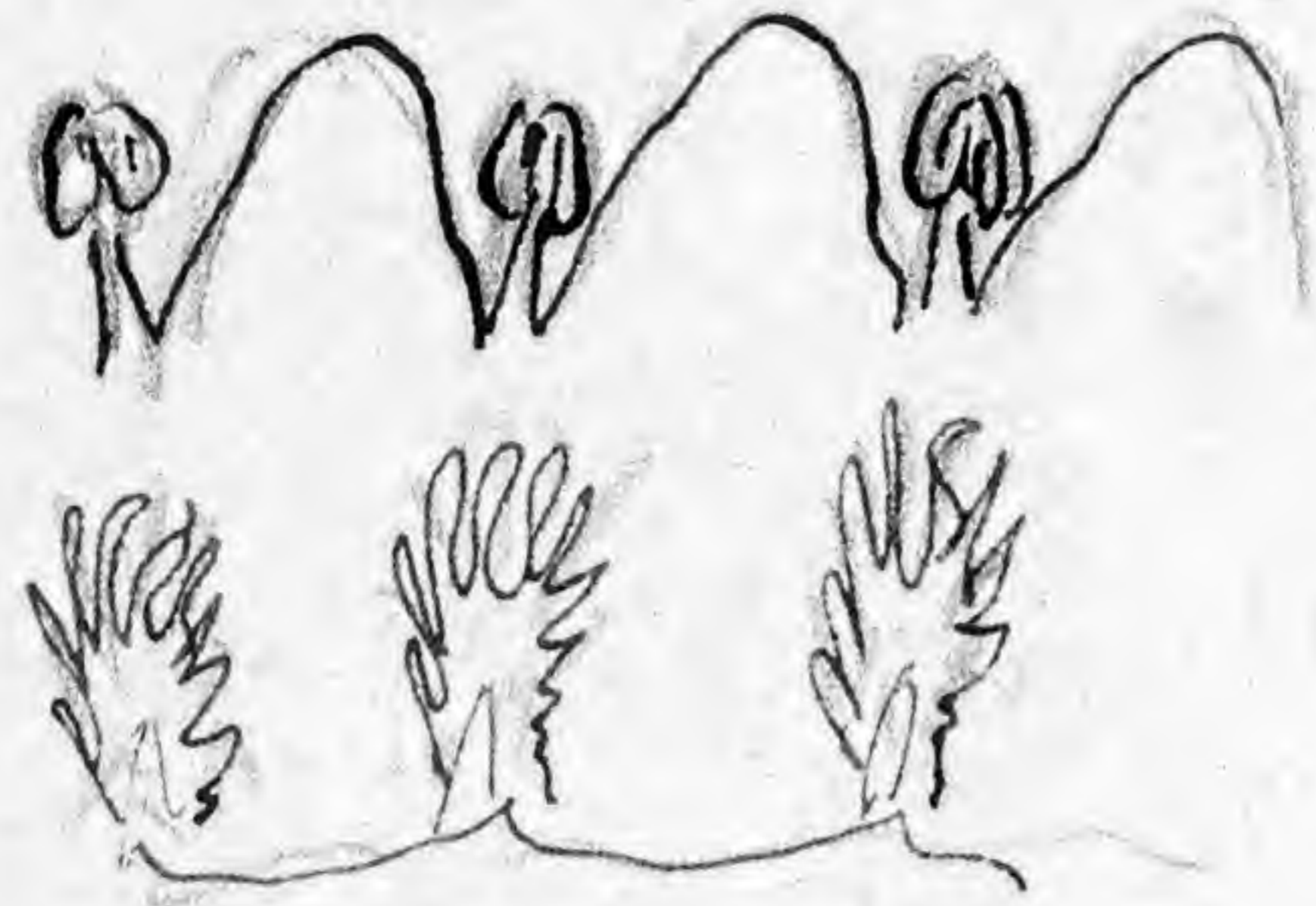
p. rarely 5 parted!

feminiflora

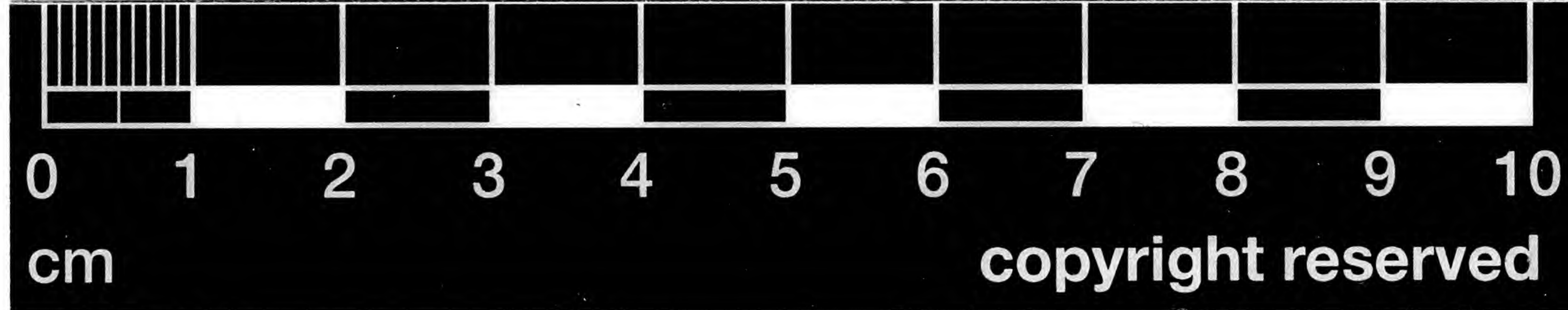
Cuscuta tenuiflora

(578) Wright
1626

1.3



pyxis parvulata, floribus
subsessilibus pedunculis ~~in~~crevatis
floribus saepe ~~in~~crevatis
lobis calycis ovatis obtusis
imbricatis, tubo corollae exserto
laciniis tubo brevibus ovatis
obtusis; staminibus brevibus,
antheris orbiculato-ovatis
squamis angustis tubo brevibus
(ovaria magna depressa) stylis
filiformibus & parte longioribus;
capsula saepe globosa costata
apice corollae calyptera pericarpio
sericeo magis compressis verru



MISSOURI
BOTANICAL
GARDEN

copyright reserved

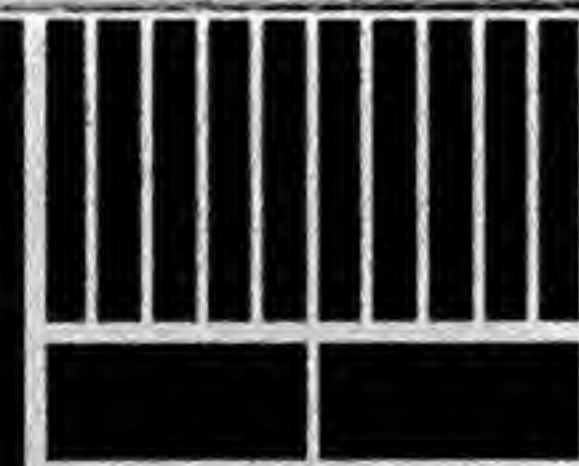
calobis inter serratis, albis hils. lumen - oblique brown
nearly allied to *C. Gronovii*, but corolla at apex of
Capsule - Perhaps *C. tenuiflora*?

(124) X 1629

is the same plant, flowers - little smaller, off only 3 parted

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS

4786



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved

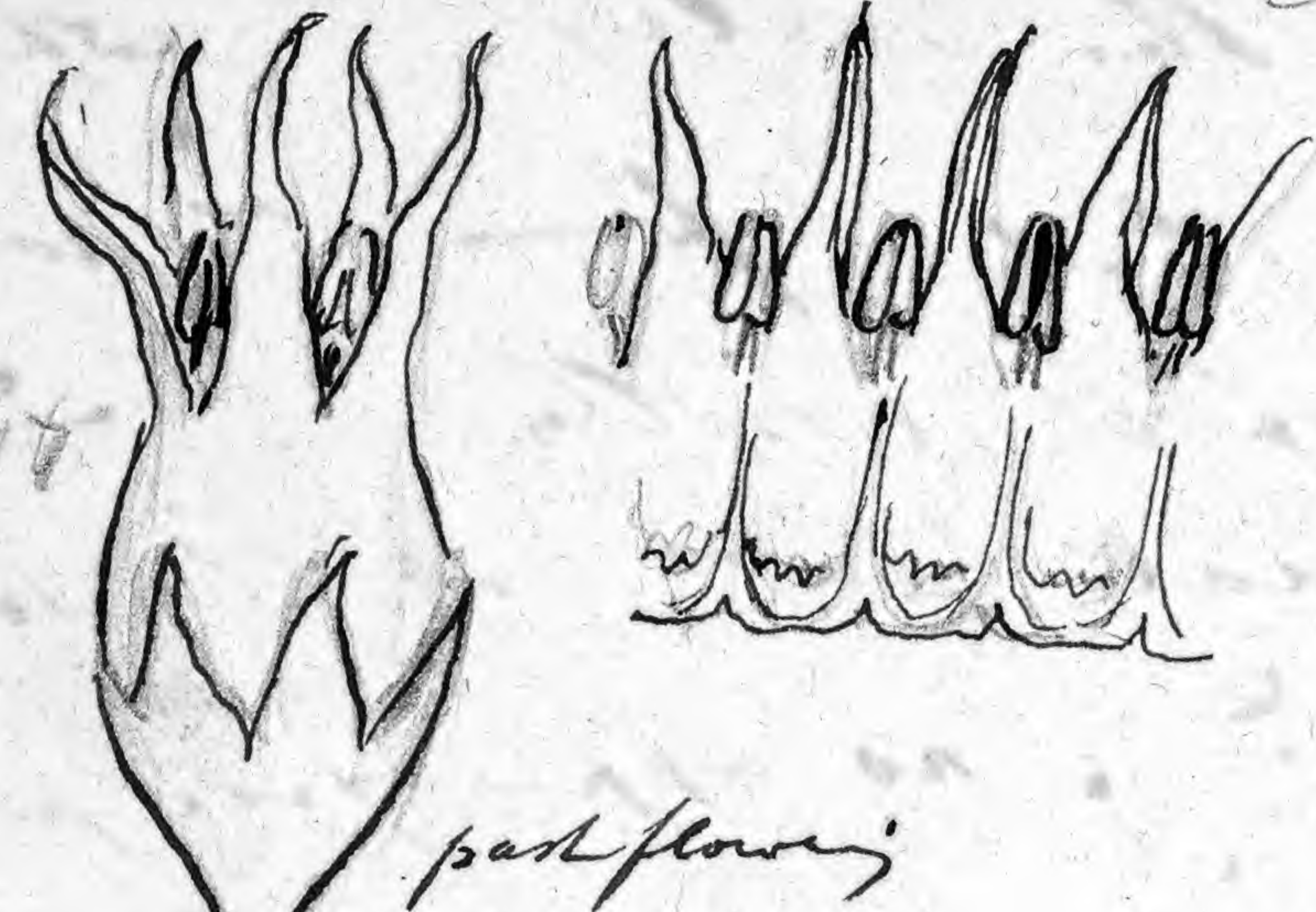


MISSOURI
BOTANICAL
GARDEN

302

Calyc. a. graciliflorum Kew Aug. 1857

18

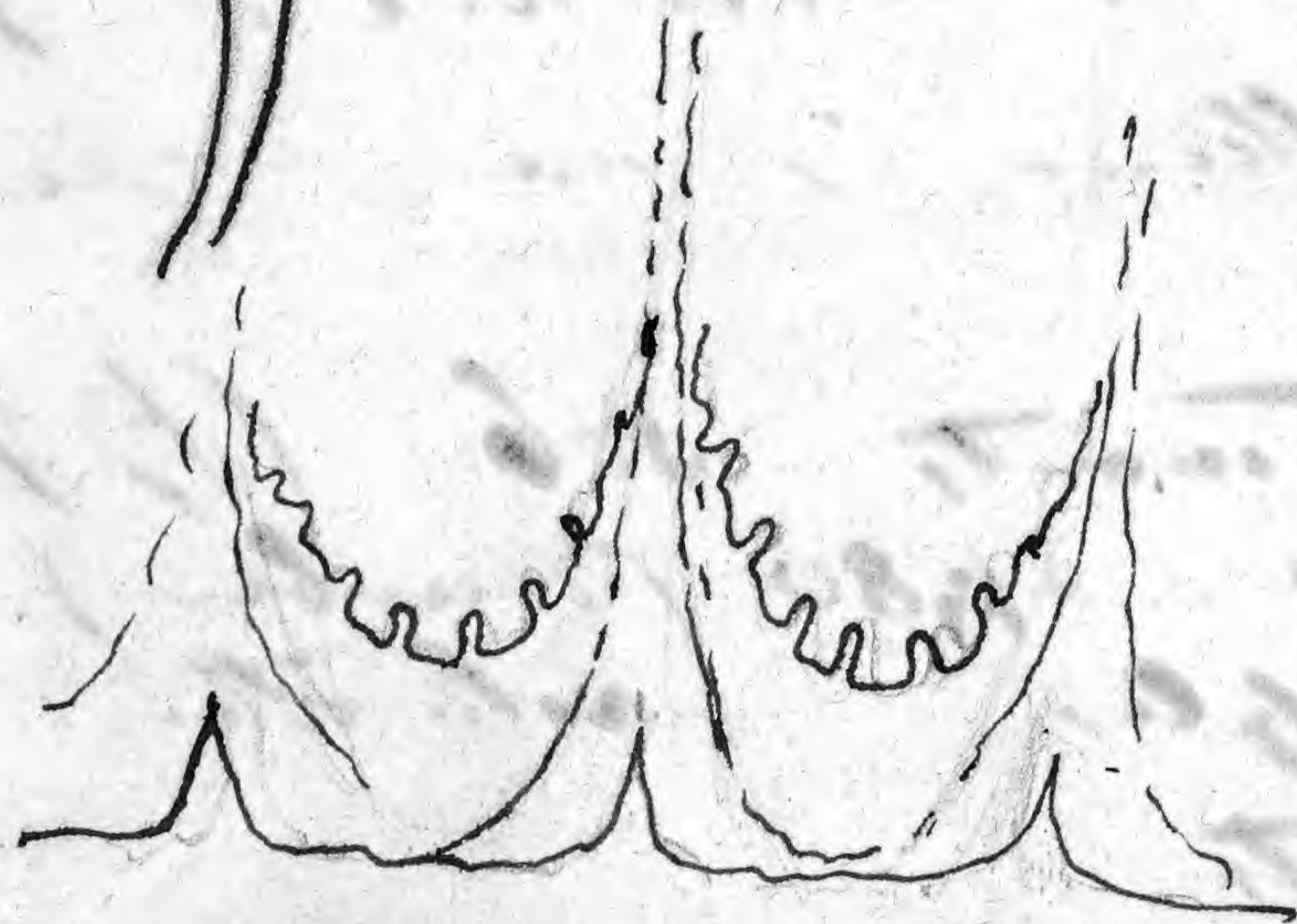


past
flowering

California, Douglas

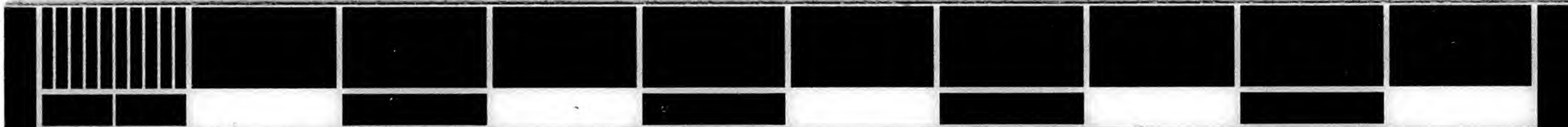
1833

Hb. Kew, olim Bentham



This is the same as Nuttall's
acuminata; but calyx shorter
 than tube of corolla — anthers
 linear-lanceolate, lobes of corolla
 as long as tube — styles not
 much longer than ovary —
 filaments shorter than anthers.

But the most remarkable



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

feature is the nature of the scales — which
 are not entirely absent, but for 5 portions
 at the base of the 5 lobes of the corolla — in other
 words only the lower connate part of the scale
 remains and is fringed, no upper free part
 is seen opposite the stamens — nor are the scales
 properly bifid, because there is no proper
 "scale" at all!

MISSOURI BOTANICAL GARDEN
 GEORGE ENGELMANN PAPERS

This is the same as Fremont's 506 (fig 92)
 but differs from M.M. (Nuttall) — fig 80 (Thurber).
 but Fremont has also longer styles — both others
 shorter tube and longer filaments

C. Californica Hook & Arnott — Bot. Sulph (1841) p. 364
 gives a better description than Clavay, mentioning the absence of scales.



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
 BOTANICAL
 GARDEN

45

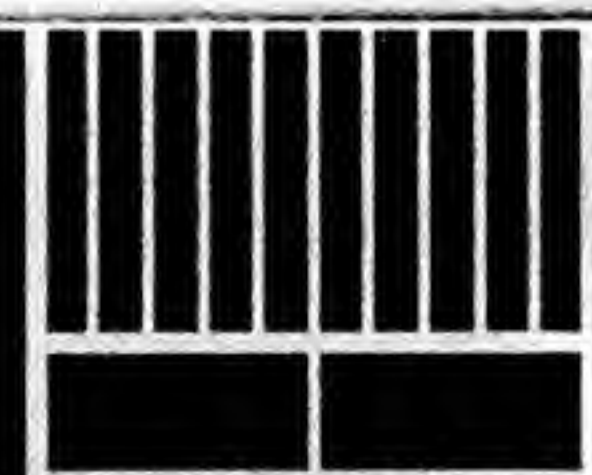
Cusc p. 497

C. acuta n. sp.

65.
239

Gallepagos

(Enclosed 379-380)



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved

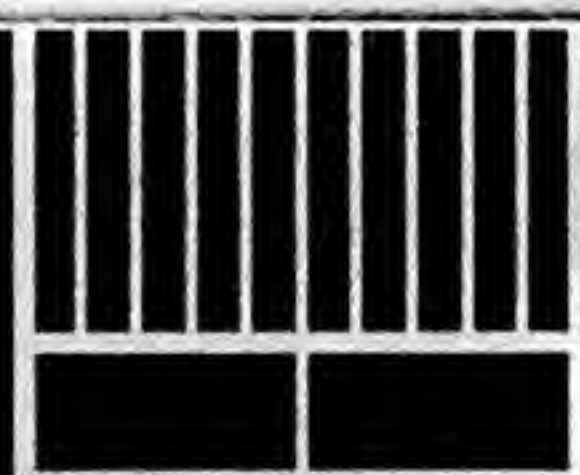


MISSOURI
BOTANICAL
GARDEN

4788

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS

Handwritten text at the bottom of the page, possibly a date or reference number, which is mostly illegible due to fading and bleed-through.



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

filamentis attingentibus versus apicem rotundatis crispato-fimbriatis;
ovario globoso stylis capillaribus ovario glabro-obovato acutibus
antheris vix aequalibus; capsula ^{globosa} tenuissimis lacertis corolla
ad basin persistente per totam indurata, supra nuda, stylis subulatis
superam capsula aequalibus plus minus erectis s. divergentibus coronata,
foramen intrastylari magno; seminibus 2-4 parvis, sub
rotatis, lenticulatis s. sub rugoso reticulatis. lentic

Nearly allied to *Jr. micrantha*, micranthoides and gymnocarpa
(from James island Jollop?) *Jr. micrantha* is distinguished by the short styles,
short stamens, **granulate** corolla, shape of capsule & seed; micranthoides
by the shorter calyx broader more patulous lobes of corolla, ^{ovate anthers} depressed
ovary and shorter capsule — *Jr. gymnocarpa* from another
island of this group is distinguished by the obtuse calyx, short triangular
lobes of corolla, short stamens, and large, naked capsule, which
only at base is surrounded by the corolla.

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS

4789



0
cm

1

2

3

4

5

6

7

8

9

10

copyright reserved

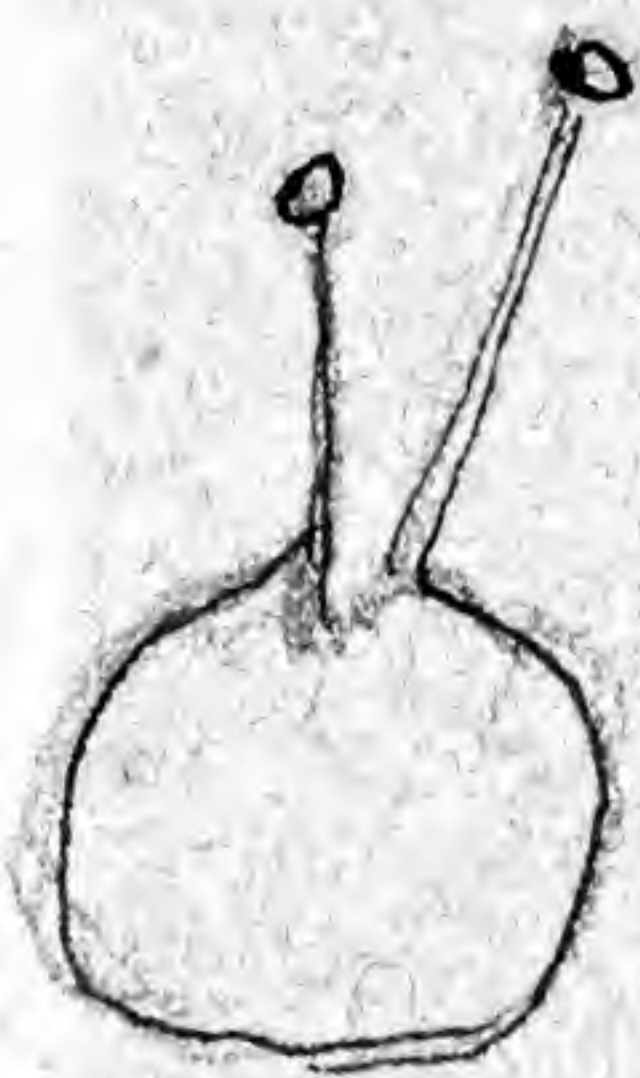
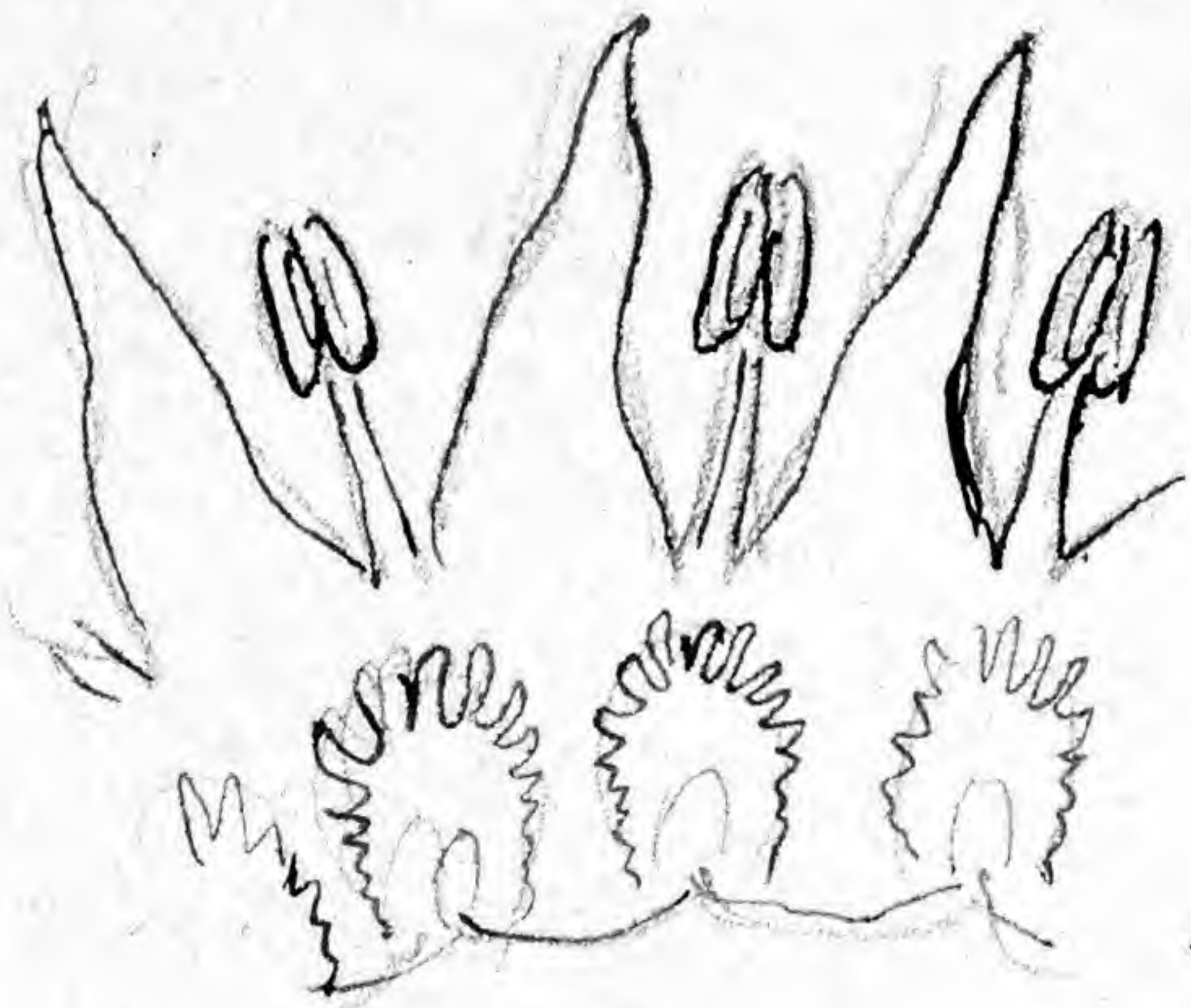


MISSOURI
BOTANICAL
GARDEN

vide 60 & 66



...
1.2



...
0.5



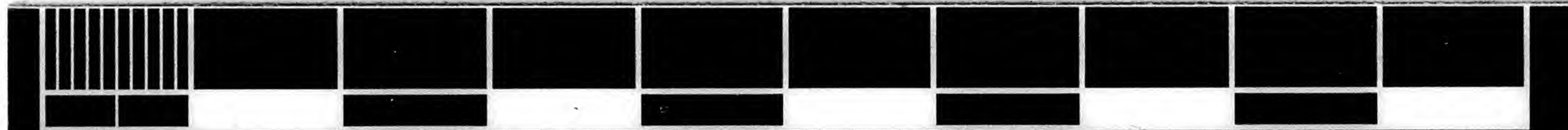
fruit

acuta
Cuscuta gallepagensis
Herb. Griseb.
~~Hook. & G. Bot. Beechey.~~

sub. nom. *C. sandrichii*

Gallepagos, Anderson
Janssens.

caulis capillaris
caulis paucifloris laxis
pediculis longioribus
bracteis ovatis acutis
calycis lobis ovatis acutis tubo
corollae campanulatae superantibus
laciniis erectis (p. patulis), tubo longioribus
lanceolatis acuminatis; staminibus
brevioribus; antheris oblongis - linearibus
filamento brevioribus; seminibus
margine fimbriatis; perispermium globosum
stylis capillaribus
involucris; capsula baccata, basi corollae
nuncius extra indurata; seminibus lentis
laevibus parvis, inter angulatis hilo brevi



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

perpt. 1. obliqu.

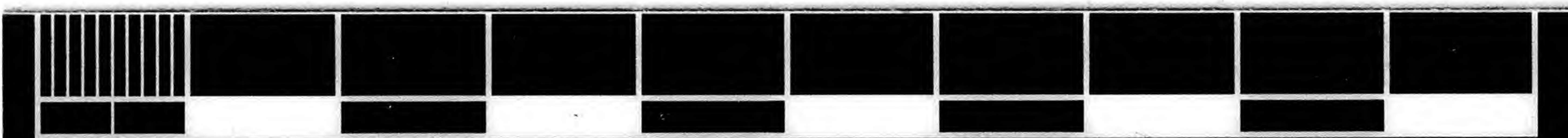
fl about 1 1/4 li long; seeds only 1/2 li & short;
very different from *C. sandwicensis* to which it has
been referred, but allied to *C. umbellata*; ~~florid~~
from which it can be separated only with difficulty;
lobes of corolla most strongly acute, incurved

distinguished from *umbellata* by the short style and
obovate capsule which is at base inserted with the
corolla - H. & Muller

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS



4790



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

47

Cust p. 498

C. Californica Choi's monogr. 1841

Hook & Arn. Bot. Beech 1841
p. 364

mm. C. acuminata Nutt in Hb. Acad Phil & H. H.

80. 570 G. Thurber. San Diego

633 - -

92. Fremont 506. - 444

302 Douglas California C. Californica !

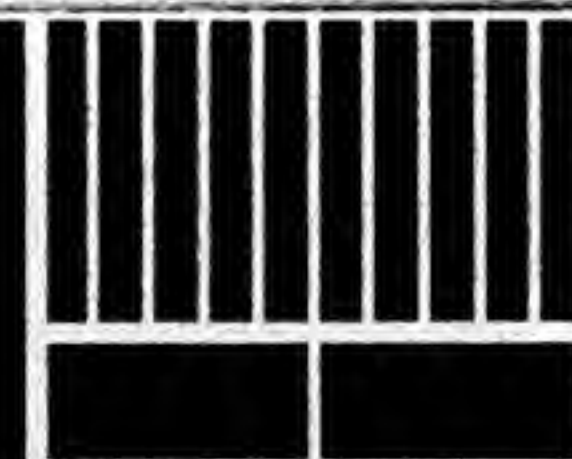
Hb. Berth. & Hb Hook.

303 Hartweg, Monterey. Hb. Berth & H. H.

313. Bigelow in Whipple's Exped.

& Newberry in Ives Exped.

(Enclosed 385-397)



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

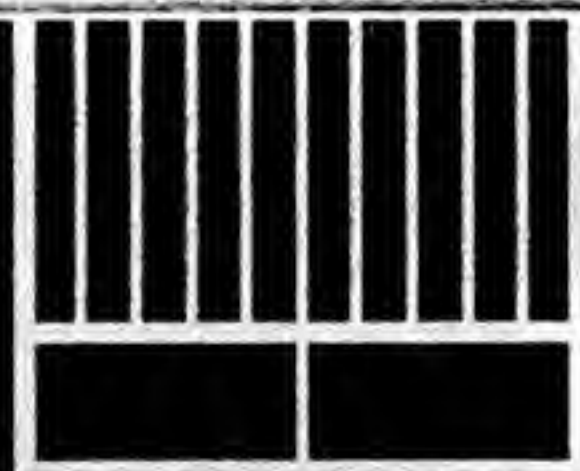
4791

[Faint, illegible handwritten text]

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS

[Faint, illegible handwritten text]

[Faint, illegible handwritten text]



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

Journal of the Horticultural Society, Lond.

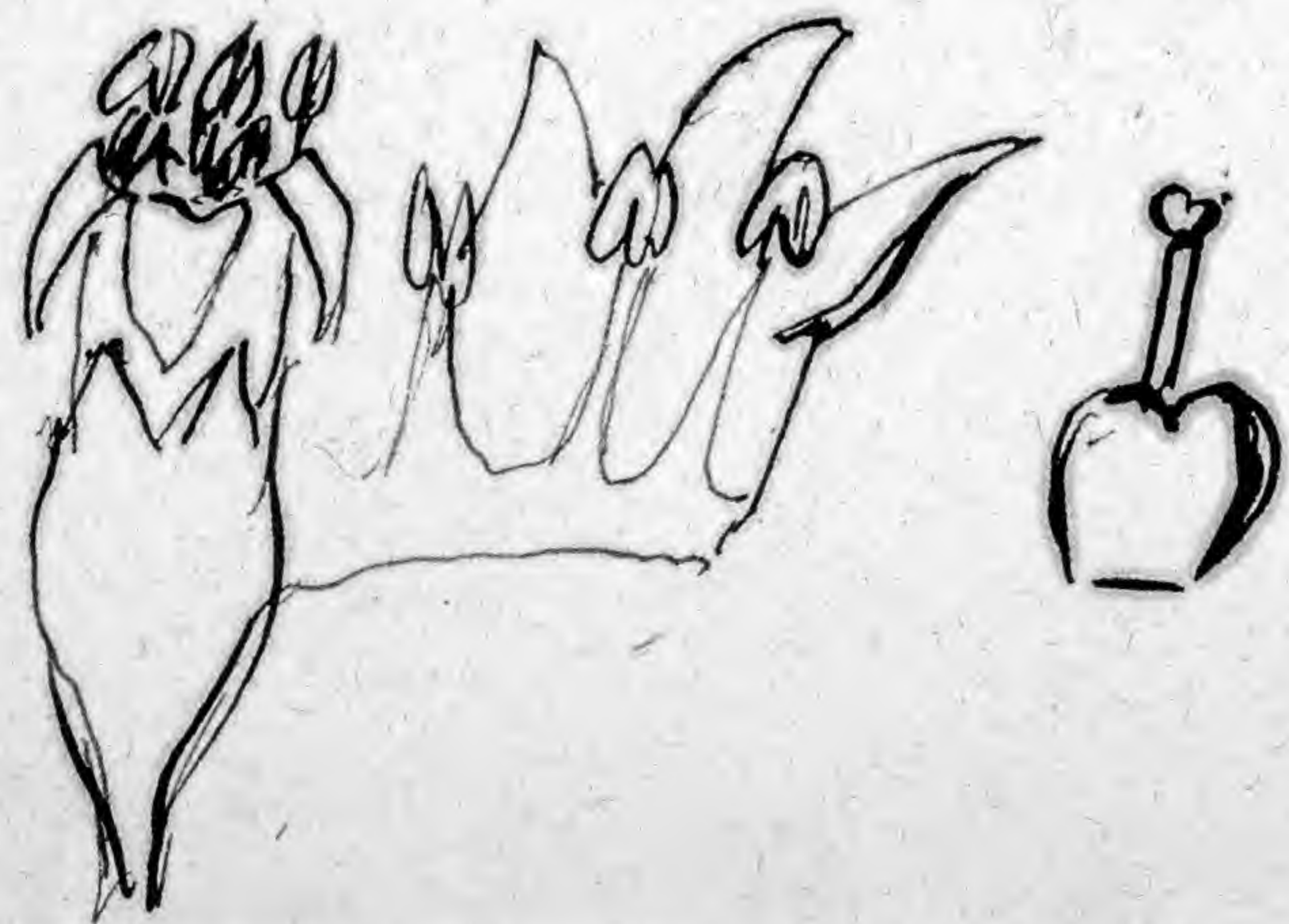
Vol IV. 1848.

No. 167. P. California Choisy. & H. R.

Raised from Hartweg's seeds (collected near
Sonoma, Calif.)

At first in close heads, as they grow older
they separate and eventually form loose racemes
— white, agreeable smell.

It has but one style, no scales



0

1

2

3

4

5

6

7

8

9

10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

4792

[Faint, mostly illegible handwritten text in cursive script, likely bleed-through from the reverse side of the page.]

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS



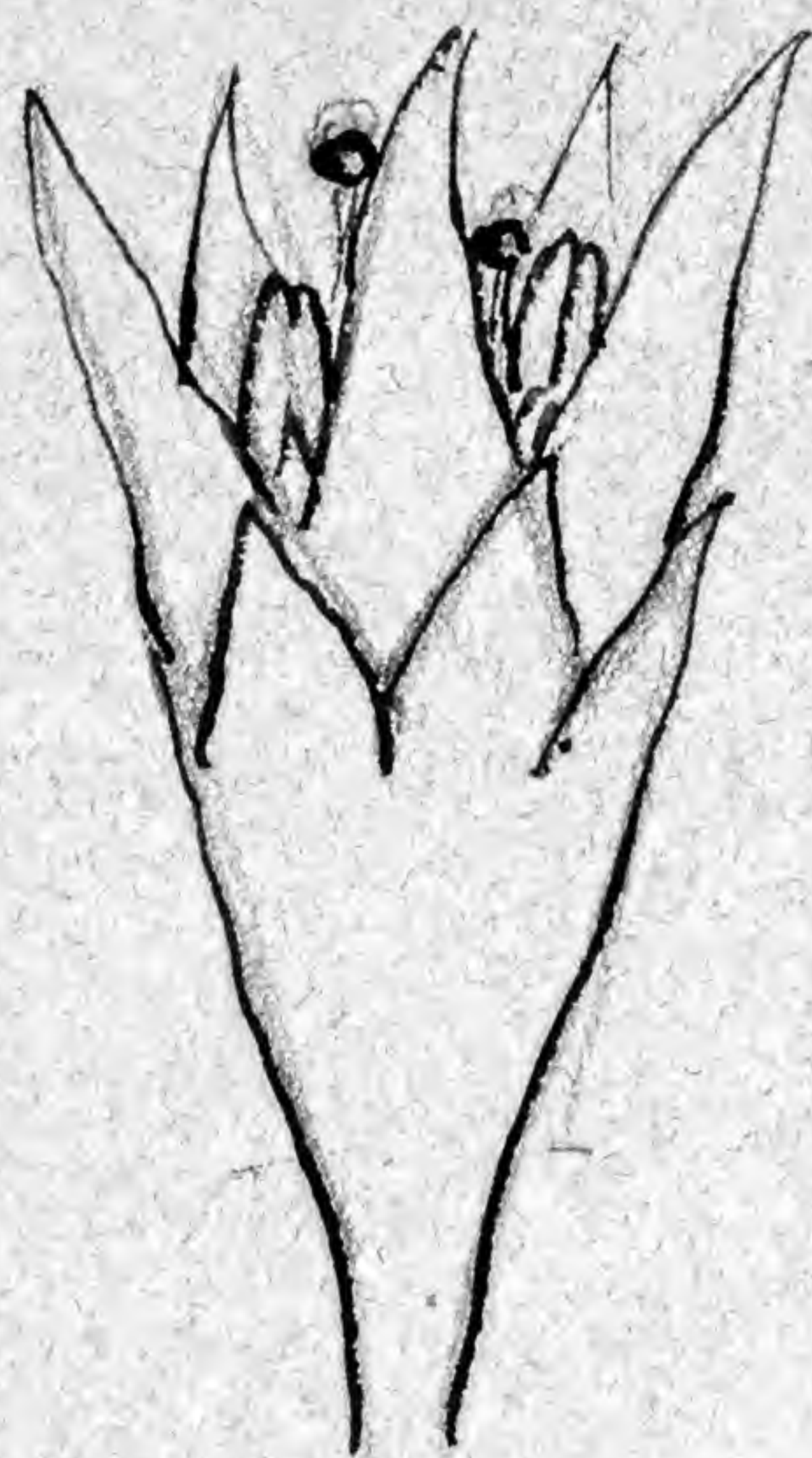
0 1 2 3 4 5 6 7 8 9 10

cm

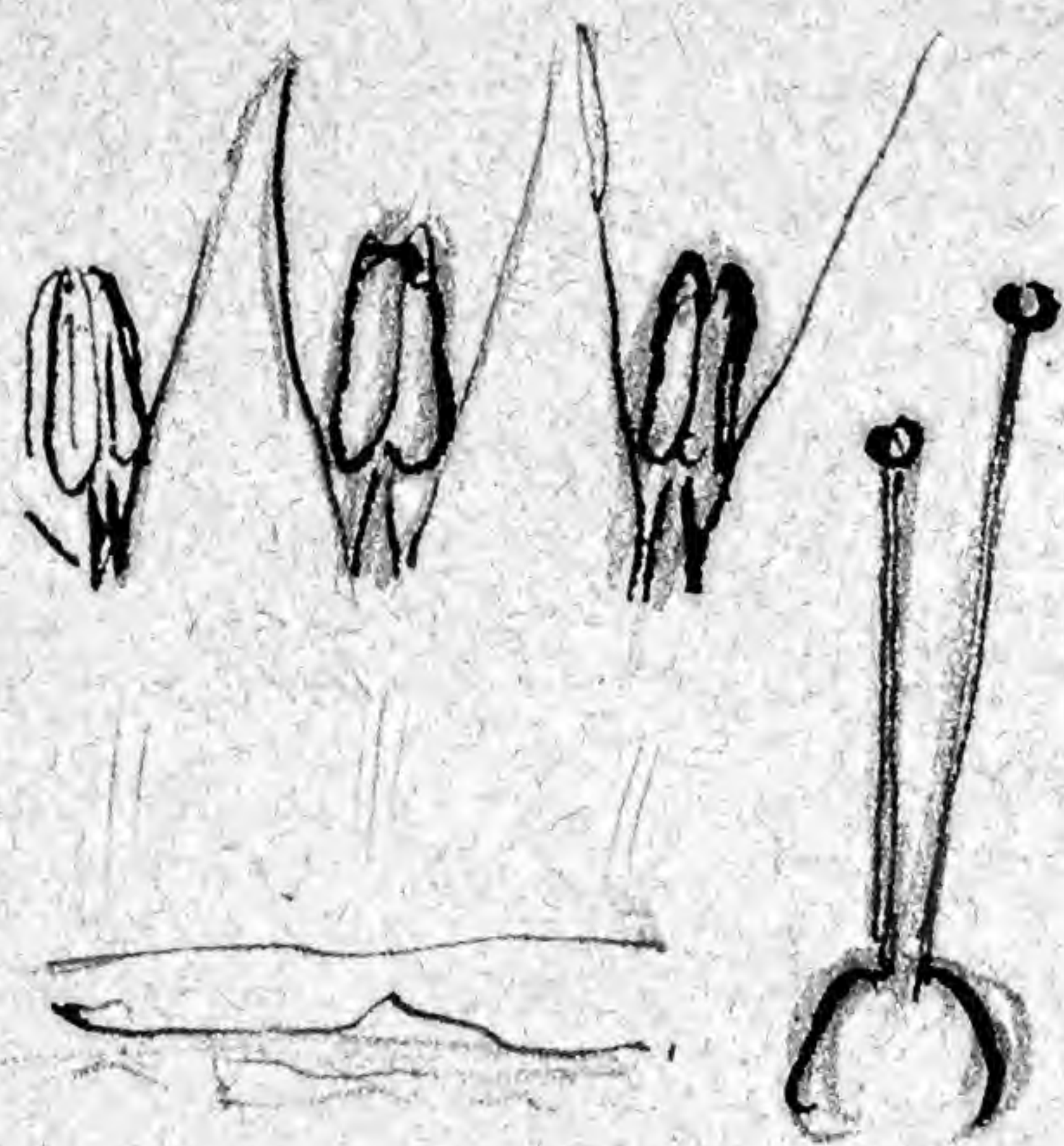
copyright reserved



MISSOURI
BOTANICAL
GARDEN



118



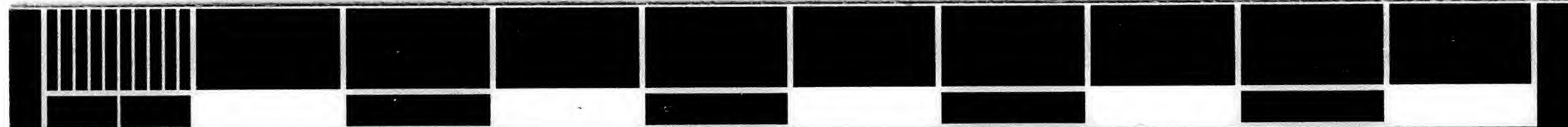
Cuscuta arvensis

Remont. Feb, 1846 on Monarda

callos filiforme
 floris pedicellatis in cyathis laxis
 angustis - calycis lobis longe attenuatis
 lobis acutis tubae angustis, lobis
 lanceolatis acutis tubae angustis
 staminibus brevioribus, stylis nullis
 stylis capillaribus ovario nullo
 longioribus, exsertis.

Only one flower examined, and that scarcely
 fully open! - seems not distinct from No. 80

1846
 No. 444 *Cuscuta capillaris* on *Erigeron* mixed with
Acnemos fatus is probably the same. (see flowers)



0 1 2 3 4 5 6 7 8 9 10

cm

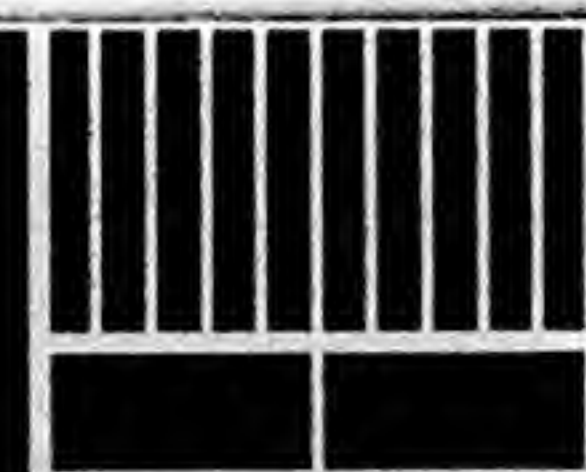
copyright reserved



MISSOURI BOTANICAL GARDEN

4793

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS



0

1

2

3

4

5

6

7

8

9

10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

Cuscuta Californica ^{styl} brewi

α. breviflora

Hartweg

(303)

β. graciliflora

styl brewi

Jouyflor (302)

Dicklow 313

stylis longis

Fremont. (92)

γ. longiloba, stylis longis

Nuttall (m m)

Thunberg (80)

Dicklow Colorado

Newberry



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

Cuscuta Californica

1. style brevis

2. gemmiflora

3. breviflora

2. style longa

4. longistylata

5. sp.

Douglas

(202)

Harkness

(303)

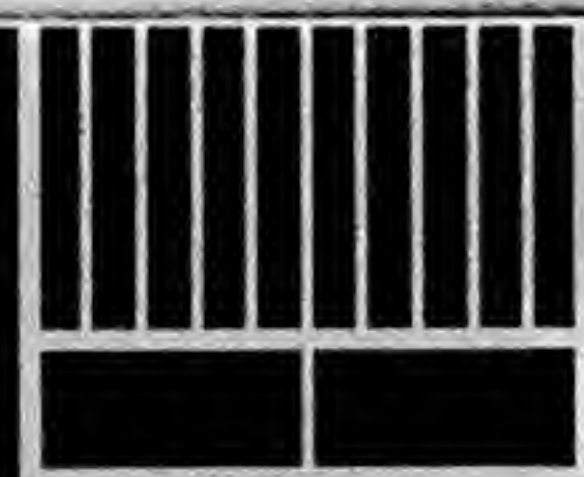
Nuttall

(m m)

Thurber

(80)

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

mm

Cuscuta (californica) (Chris)
acuminata Nutt m.s.

California Nutt

Hb. An Phil

Santa Barbara

Nutt

on *Erigeron*

St Louis 1844



calyx



lobe of corolla



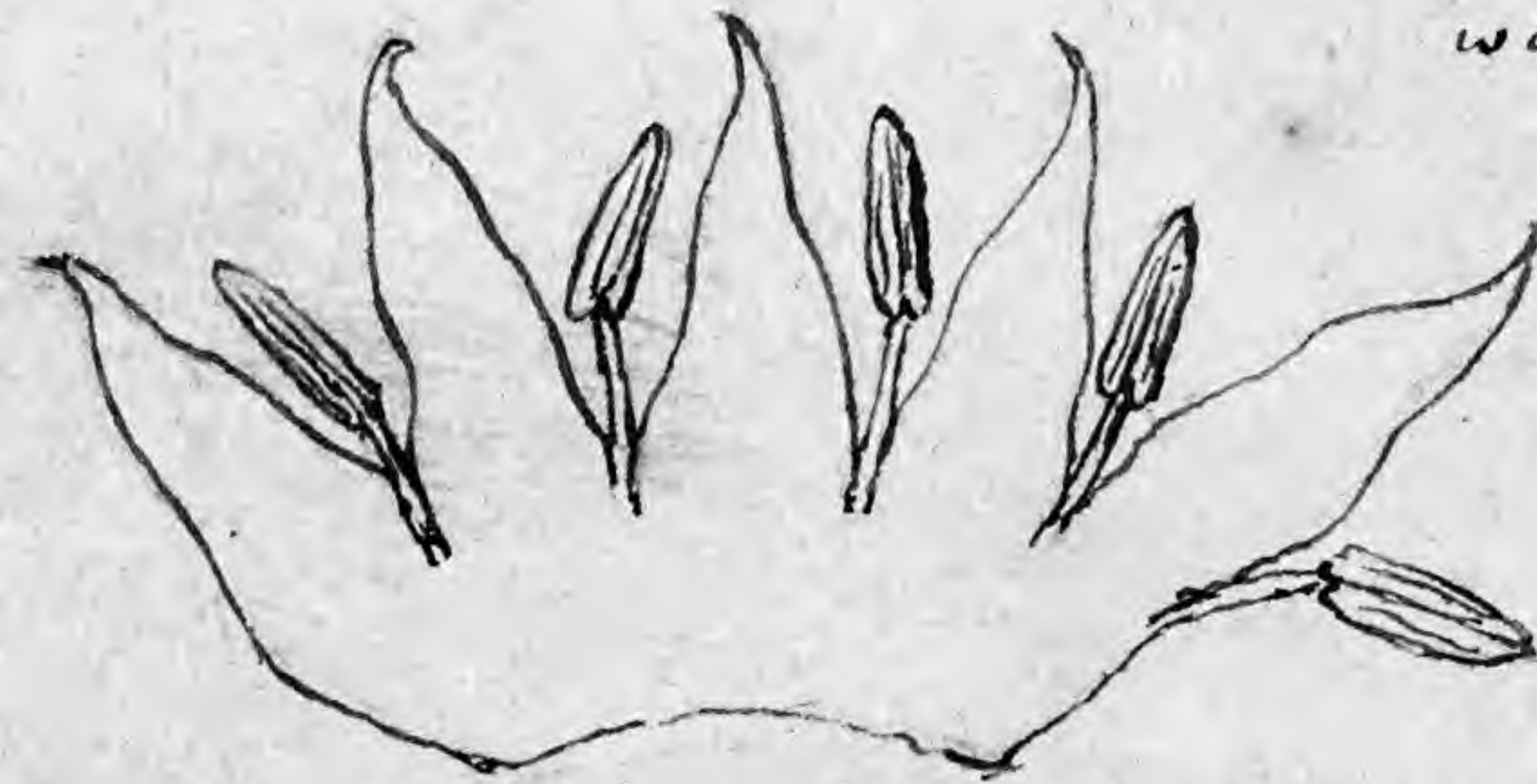
dry flower



same flower
soaked in warm
water



flower bud



scales not seen!



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

4795

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS



0

1

2

3

4

5

6

7

8

9

10

cm

copyright reserved



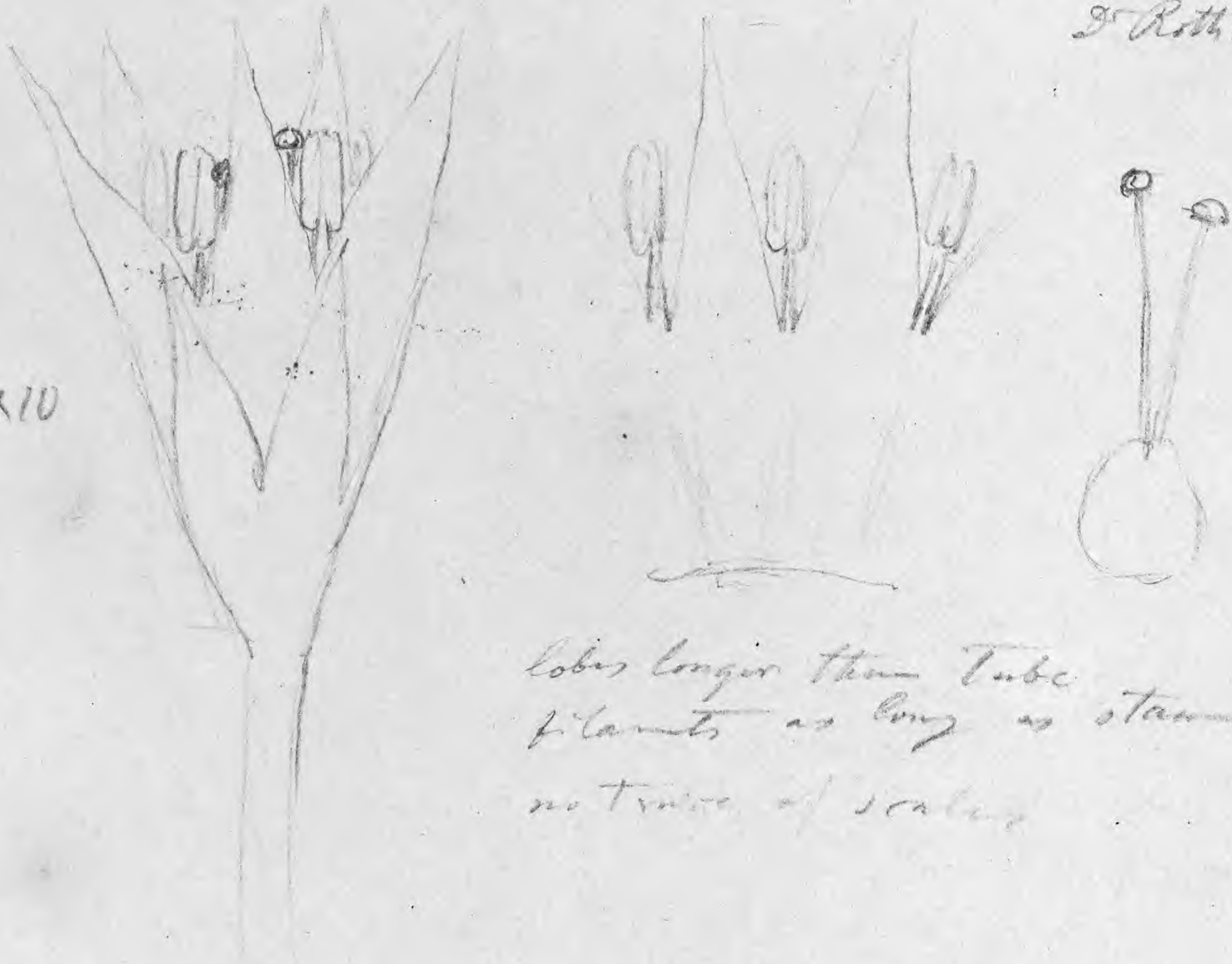
MISSOURI
BOTANICAL
GARDEN

Over California
Arizona

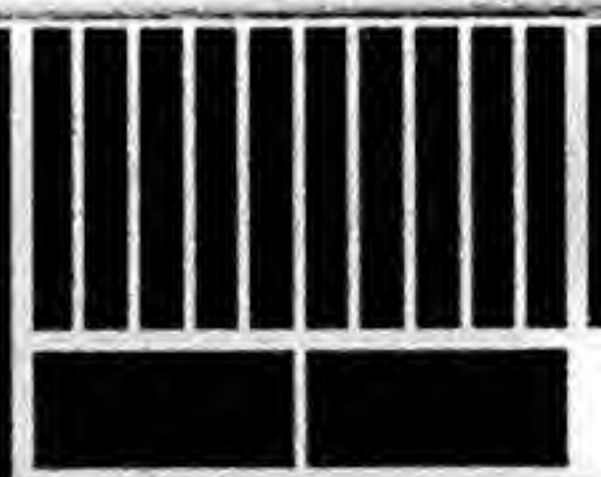
Febr 24 1875

J Rothrock 333

X10



lobes longer than tube
filaments as long as stamens
no trace of scales



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

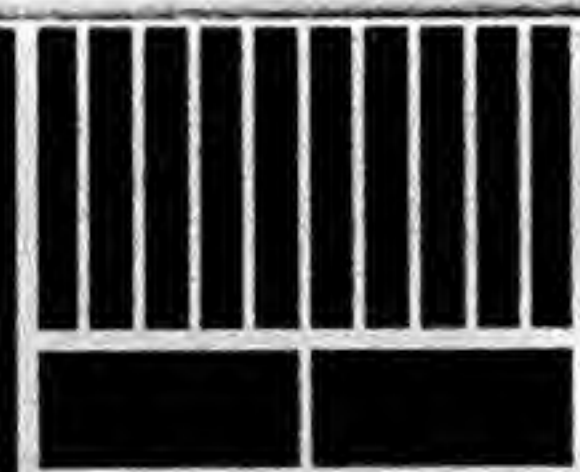
STODDARD PHARMACY,

N. W. Corner Easton and Garrison Ave's.

POOLER & CO.

4796

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



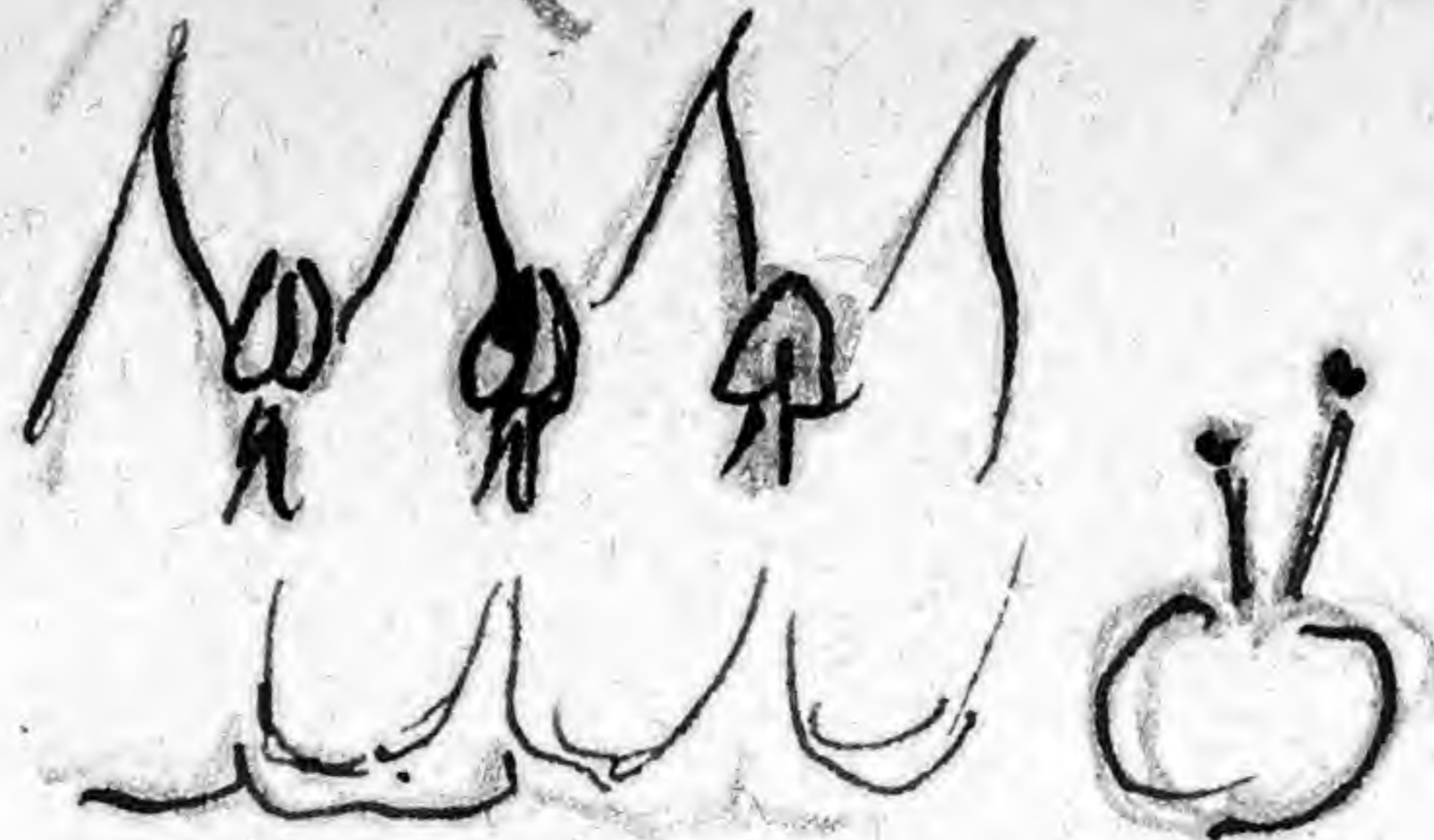
MISSOURI
BOTANICAL
GARDEN

303

Calif. & breviflora

Kew, Aug. 1857

1.0
- 1.2



1863. *Cuscuta Californica*

Chrys

Fields near Monterey
California Hartweg 1848.



Ex herb Berth. = H. Kew & H.

This is distinguished by the smaller flowers
(only 1 line long) on shorter pedicels; lobes
as long as tube of corolla, leaved like longer
than tube, anthers oval short, as long as slender
filament — only an indistinct arch instead
of scales — very short styles.

Capsule baccate, surrounded by the corolla,
but not covered by it, 2-3 seeds



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

4797

[Faint, illegible handwritten text, likely bleed-through from the reverse side of the page]



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

a,

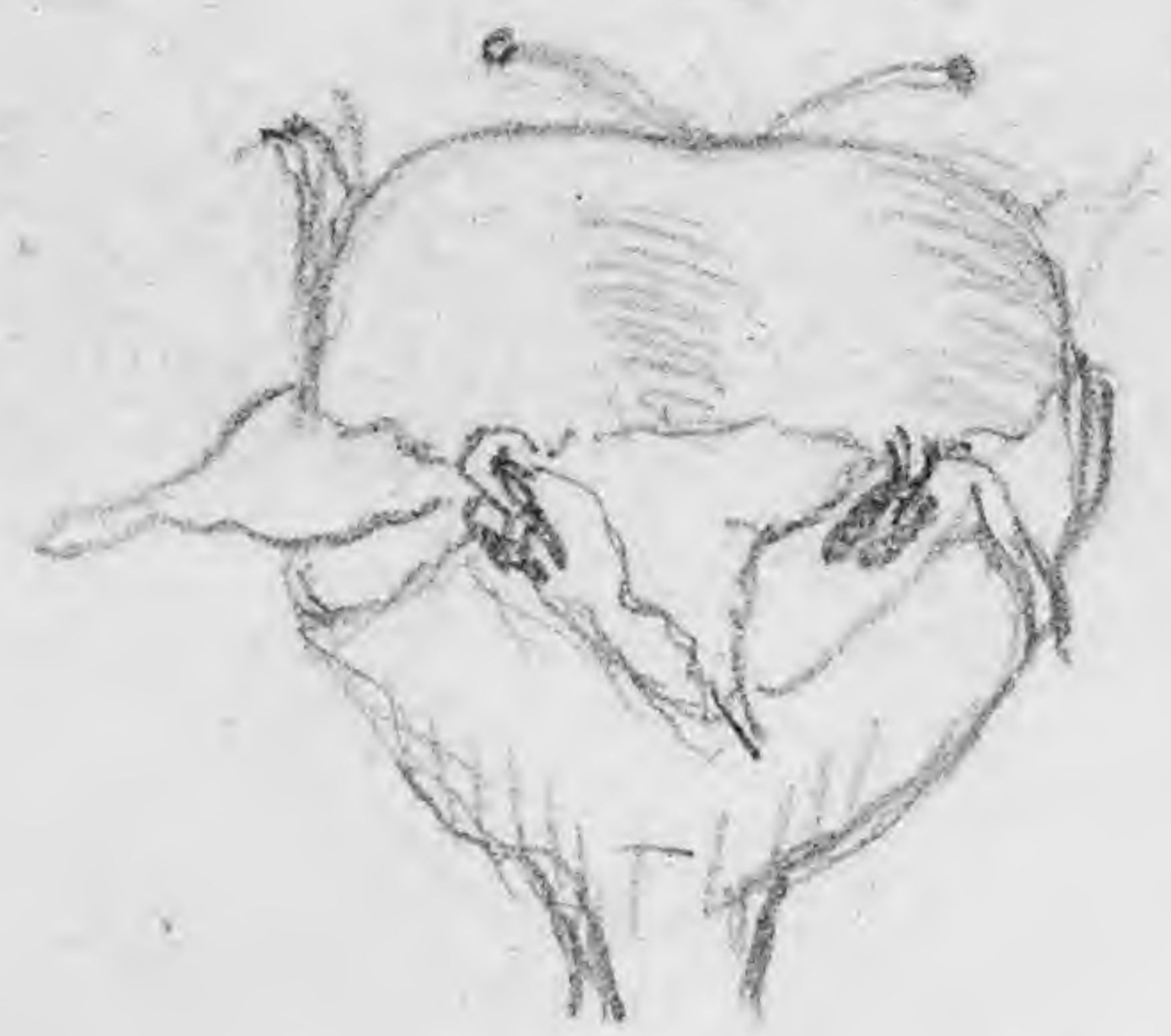
Cassotis Calif. L. breviflora

Sept 15 1875

upper Tuolumne River, Bolander

low, 1-inch high, caespitose
3-4 seeded

x 10



calyx & lobes shorter
caps. 4 seeded



longer than tube.



Greene 450

caps. 1 seeded



Greene, 450 is the same, but capsule 1 seeded

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS
MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

4798

Leitch & Corlies

DRUGGISTS

South-west
Corner Fifth
and Market
Streets

MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved

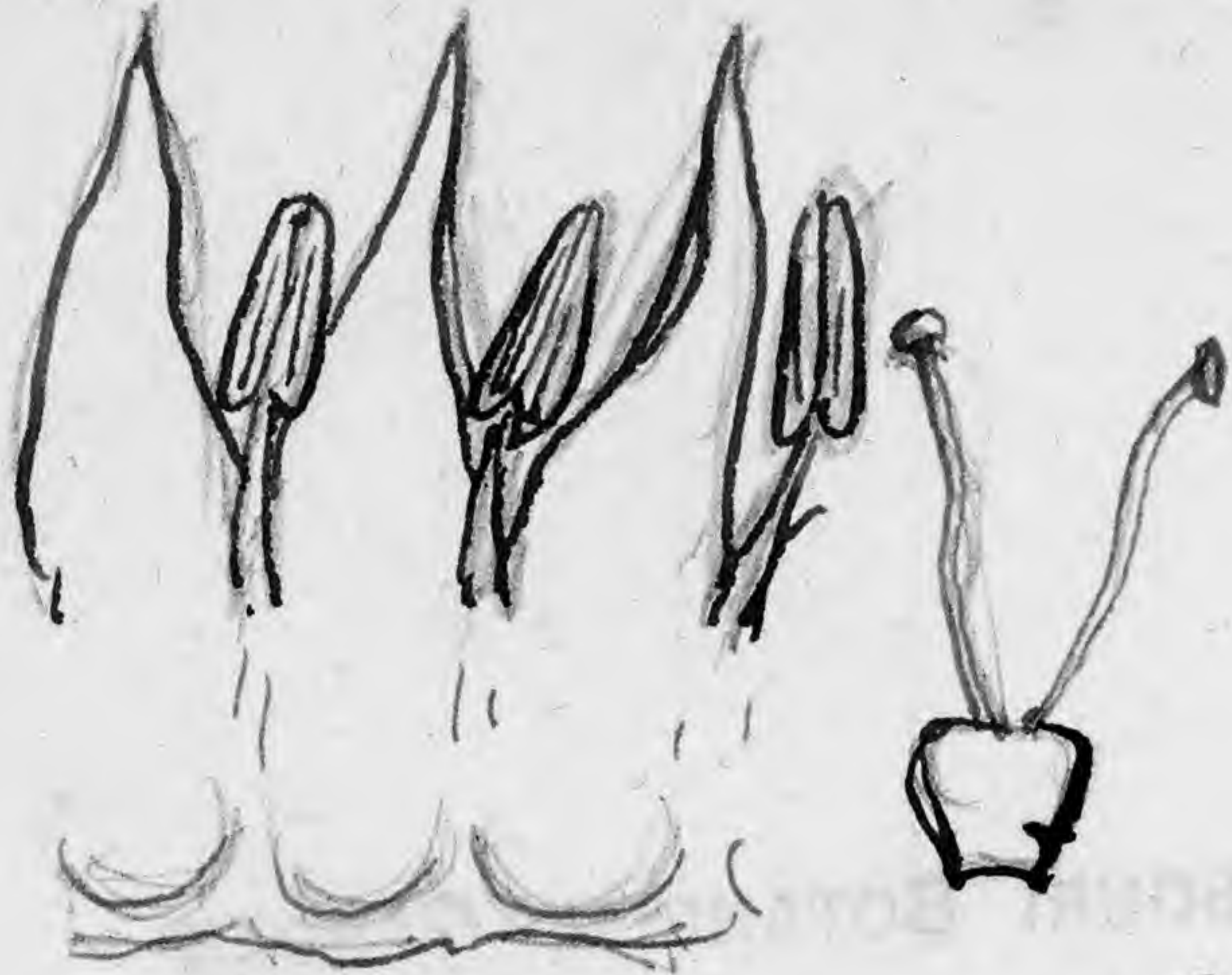


MISSOURI
BOTANICAL
GARDEN

St Louis Jan 1859

Cass. Californica

Dr Newberry 1858



stylis ovario multo

longioribus; calycis lobis

triangularibus tubo corollae brevioribus

laciniis corollae lanceolatis acutiusculis,

tubo longioribus; antheris linear-oblongis

filamentis subulatis aequalibus, laciniis

brevioribus;

placis semilunatis ad basin corollae

adhaerentibus (interdum) plura iude

specimina individualibus

rudimentis



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



MISSOURI
BOTANICAL
GARDEN

4799



MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS

[Faint, illegible handwritten text, likely bleed-through from the reverse side of the page.]



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved

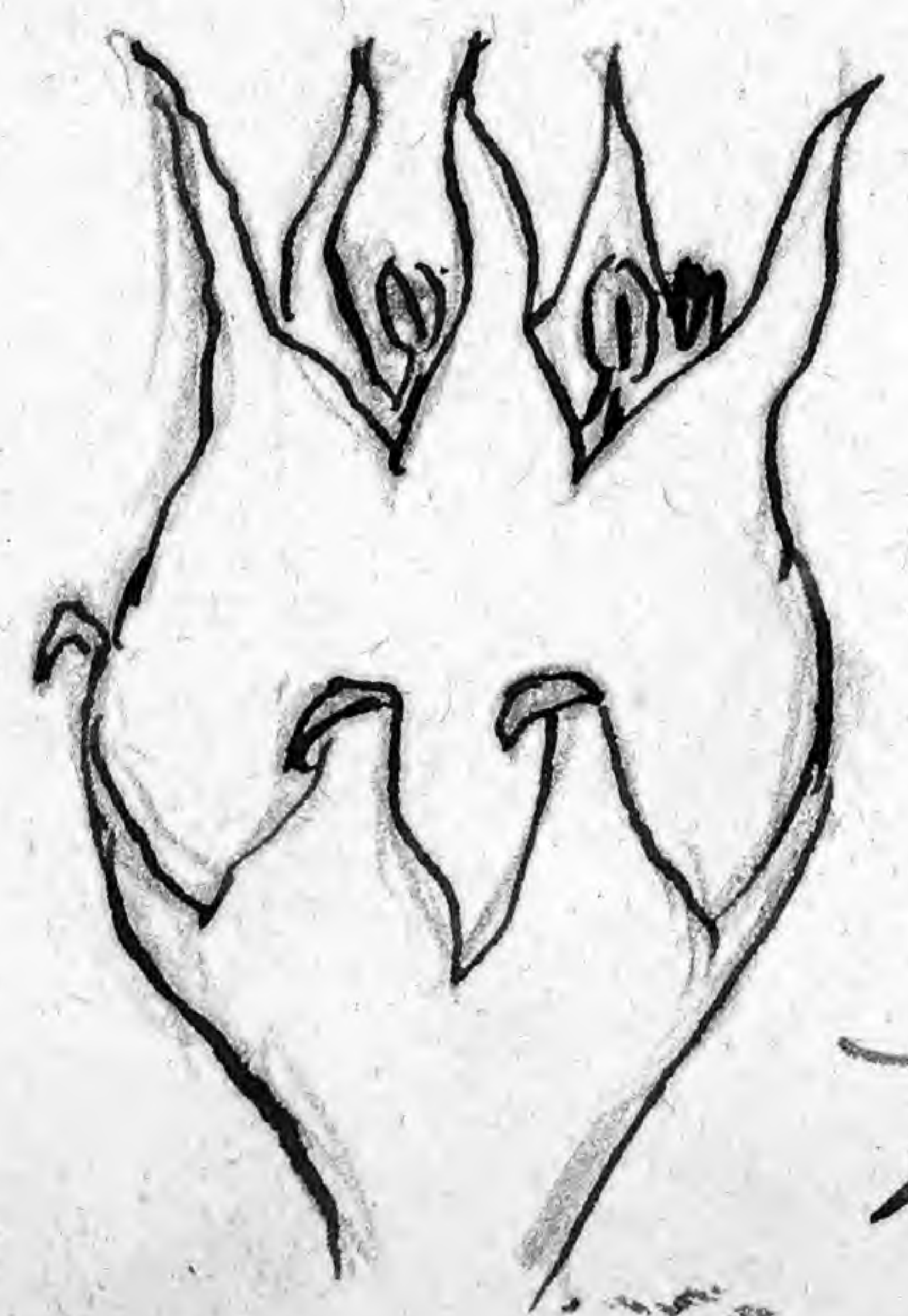
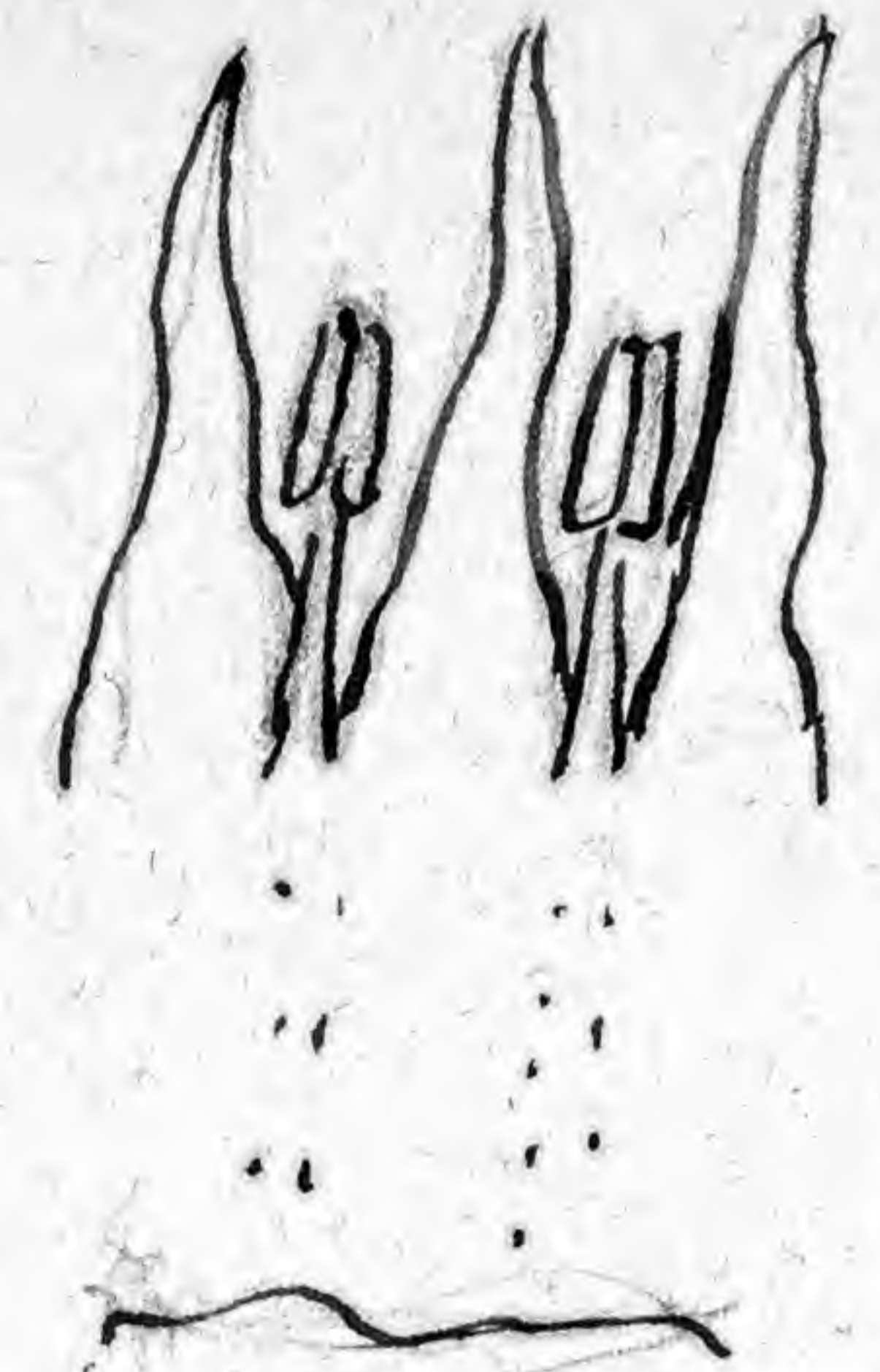


MISSOURI
BOTANICAL
GARDEN

313

New. Aug 1857

2
2.5
2.5



C. Californica
Whipples Railroad Exped.
California, Bigelow Bay.
ex. Herb Hook

This is a large flower
C. Californica - fl. 2-2 1/2
l. long! Anthers shorter
than filaments; calyx lobes
acuminate, rounded, styles
very short. — where

half ripe Capsule

flowers
not used



copyright reserved

4800

[Faint, illegible handwritten notes in pencil, likely bleed-through from the reverse side of the page.]



MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS



0 1 2 3 4 5 6 7 8 9 10

cm

copyright reserved



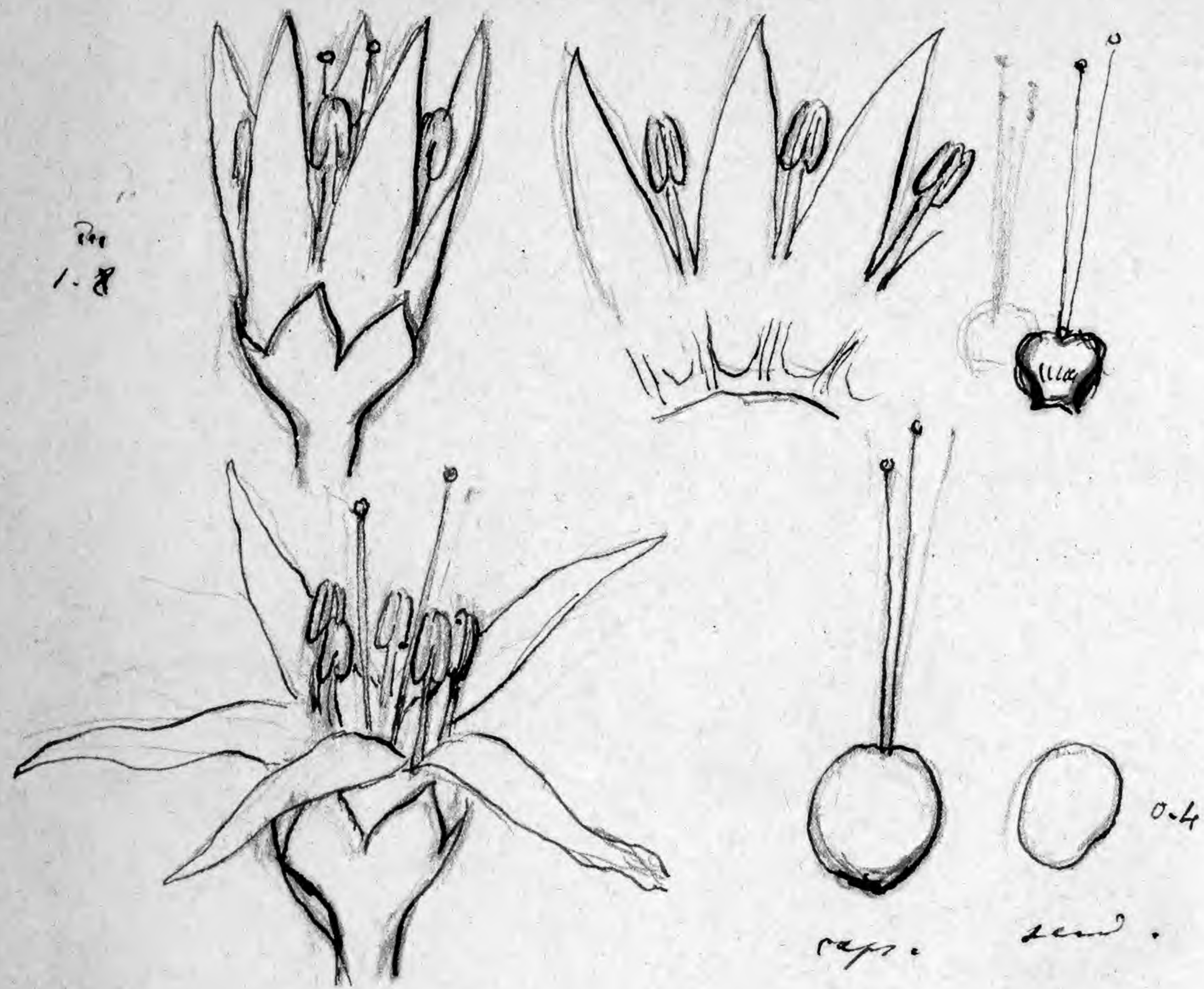
MISSOURI
BOTANICAL
GARDEN

Cuscuta Californica Choisy

Mutt
1857

570 G. Thurber

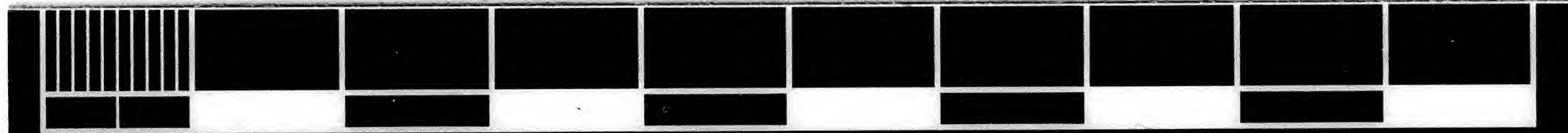
San Diego, Cal. May



calycis lobis ovato-triangulatis
 acutis, tenuibus, tubo corollae
 campanulato subaequalibus,
 laciniis tubo nullis longioribus
 patulis s. demum reflexis; staminibus
 brevibus; antheris ovatis filamentis
 filiformibus ^{29. nullis} brevibus; stylis
 ovario globoso nullis longioribus
 capillariis exsertis; capsula
 baccata, corollae nunciat crypta
 indurata, subglobosa 1-2 sper-
 matis laciniis oculis

633 Thurber, San Felipe

differs only by a little shorter styles, and perhaps shorter filaments; fl. same size.



0 1 2 3 4 5 6 7 8 9 10

cm

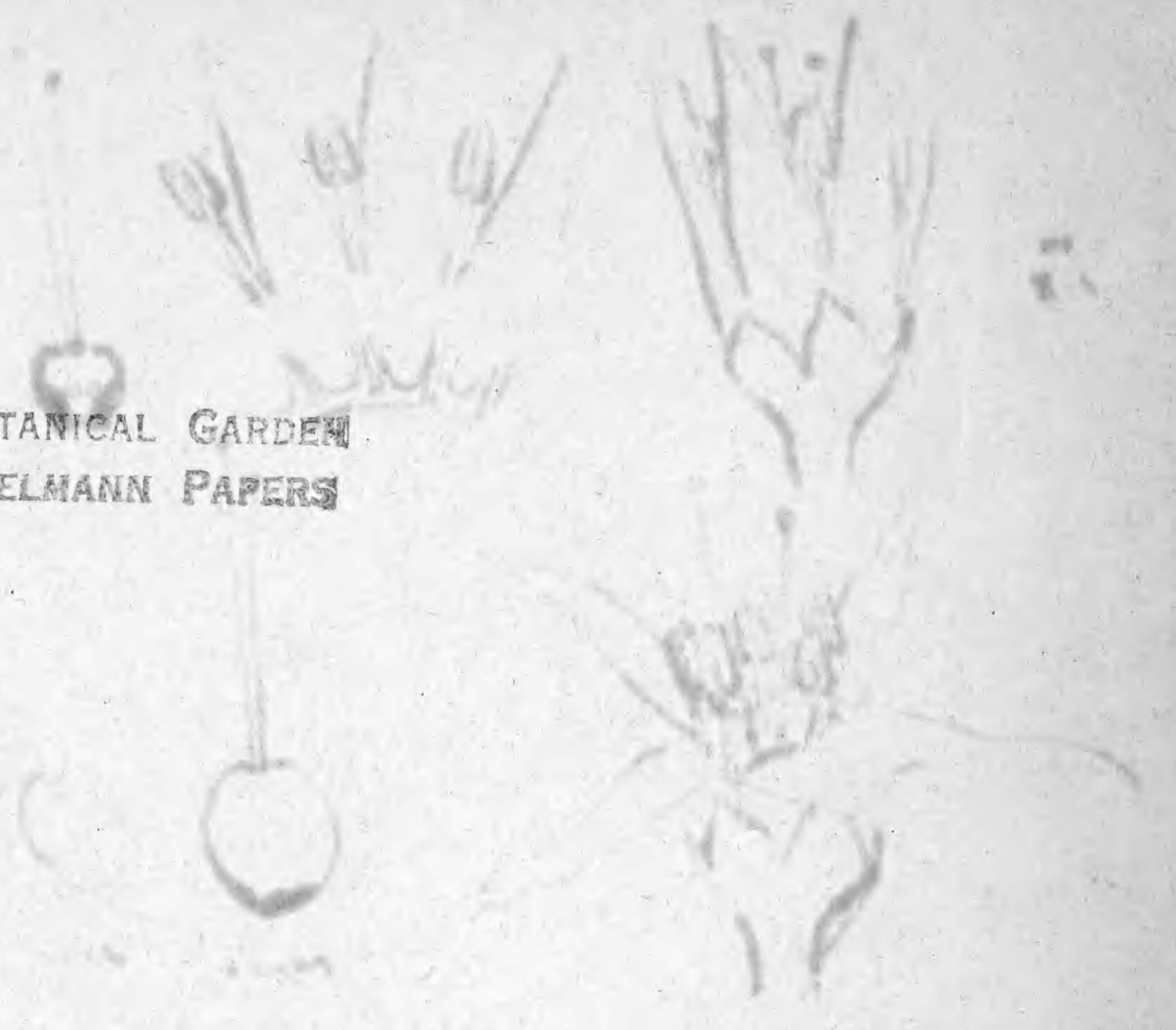
copyright reserved



MISSOURI
BOTANICAL
GARDEN

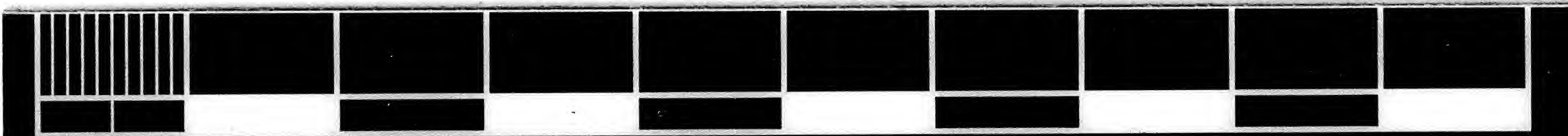
4801

[Faint handwritten notes, possibly bleed-through from the reverse side of the page]



MISSOURI BOTANICAL GARDEN
GEORGE ENGELMANN PAPERS

[Faint handwritten notes at the bottom right of the page]



0 1 2 3 4 5 6 7 8 9 10
cm copyright reserved



MISSOURI
BOTANICAL
GARDEN