Lepanthes grandiflora A. & S. sp. nov. Herba caespitosa, parvula. Caules monophylli, vaginis tubulatis arctis pubescentibus omnino inclusi. Folium ovatum vel ellipticum, in vivo valde crassum. Pedunculi breviores, biflori. Flos grandis. Sepala lanceolata, valde attenuata, in dorso carinata. Petala transverse bilobata; lobi oblongi, lobus anterior longior. Labellum minus, trilobatum; lobi laterales dolabriformes; lobus intermedius minutus, lanceolatus.

Plant caespitose, small, up to 8 cm. tall to the tip of the erect-spreading leaf. Roots fibrous, flexuous, filiform, minutely pubescent. Stems slender, monophyllous, up to 5.5 cm. high, entirely concealed by 7 or less sheaths which are close tubular and pubescent on the longitudinal nerves with dilated hispid infundibuliform mouths. The latter are conspicuous in the fresh plant. Leaf elliptic to broadly ovate, shortly petioled; lamina up to 2.3 cm. long, 1.3 cm. or less wide, acute and minutely tridenticulate at the apex, cuneate or rounded at base, very fleshy in the fresh specimen. Inflorescences commonly solitary (occasionally remnants of several old ones appear), 2-flowered at the summit, with an abortive terminal flower. Peduncle shorter than the leaf (usually much so), filiform. Flowers very large for the plant, when spread out up to 3.7 cm. wide from the tip of the dorsal sepal to the apex of the lateral ones. Sepals widely spreading, the margins ciliolate. Lateral sepals connate near the base, lanceolate, long attenuate above, 1.5-1.82 cm. long, 4-5 mm. wide at base of free portion, oblique, 3-nerved, the mid-nerve dorsally carinate. Dorsal sepal similar, 1.57-1.79 cm. long, 4.6-5.4 mm. wide near the base, 3-nerved, the mid-nerve with a ciliolate keel on the outer surface. Petals relatively minute, transversely bilobed, 4.6-6 mm. wide from tip to tip, very minutely pubescent; posterior lobe oblong to oblong-ovate, broadly rounded at its apex; anterior lobe conspicuously longer, oblong, with an oblique sometimes slightly dilated anterior portion, obtuse. Labellum 3-lobed, smaller than the petals, minutely pubescent; lateral lobes dolabriform-peltate (as is common in Lepanthes), the anterior part markedly larger than the basal portion; middle lobe minute, lanceolate. Column semicylindric, shorter than the labellum, somewhat dilated at the apex.

Lepanthes grandiflora appears to be closely related only to L. Chameleon Ames, which differs in the more hispid cauline sheaths, the prominent peduncles and dissimilar petals.

The description was prepared from dried specimens as well as from material preserved in formalin.

COSTA RICA, La Pastura, Irazu, C. H. Lankester 1190, May 1928. 9500 feet altitude. "Rare and local, on tree trunks. Flower hyalinaceous purple; petals maroon." (TYPE in Herb. Ames No. 34210.)