

*Argemone* L. PRICKLY POPPY

*Argemone munita* Durand & Hilg., CHICALOTE. Annual (in range), robust, spinescent, taprooted, rosetted, 1-stemmed at base, erect, 50–160 cm tall; shoots sharply prickly, conspicuously gray-glaucous (occasionally nearly green), the prickles straight, 2–4.5 mm long, often with swollen bases and tapered to sharp tip, pale brown; in range latex milky (yellow). **Stems:** cylindrical, to 15 mm diameter, green soon becoming reddish, the prickles ca. 10 cm<sup>-2</sup>. **Leaves:** helically alternate, pinnately lobed, petiolate (basal leaves) and sessile and clasping (cauline leaves), without stipules; petiole < 35 mm long, 7–9 mm wide, winged and grading into blade, typically prickly on margins; blade of basal leaves oblanceolate or narrowly obovate to spatulate, 100–250 × 40–70 mm, lateral lobes spreading, typically opposite, sinuses extending 1/2 to 2/3 distance to midrib, lobe fine-tipped dentate and wavy on margins, pinnately veined with midrib and principal lateral veins raised on lower surface, with secondary veins diverging at ± 45°, prickles mostly restricted to midrib and principal lateral veins on both surfaces, with prickles mostly ascending or alternately ascending and descending; blade of cauline leaves like basal leaves but petiole absent or less distinctive because of broader wings, 90–290 × 45–120 mm, prickles 2–6(–12) mm long. **Inflorescence:** cyme, terminal and axillary, 1–several-flowered, bracteate, glaucous; bract leaflike (= the uppermost cauline leaves); pedicel to 300 mm long, prickly, initially villous becoming glabrate, glaucous. **Flower:** bisexual, radial, 51–100(–130) mm across; bud spreading to ascending, ellipsoid with 3 horns at tip; **sepals** 3, falling off as soon as flower opens, obovate, 27–36 × 9–13 mm, hooded at tip, commonly 2 sepals asymmetric at tip with the overlapping margin extending as a rounded lobe beyond the normal tip, the overlapping margin wide, green, membranous, the free margin green with faint parallel veins, exposed surface prickly, green to grayish orange or red, glaucous, the horn subterminal and sharp-tipped, in range often lacking prickles; **petals** (5–)6(–7), spreading to form dish-shaped corolla, obovate to fan-shaped, 53–65 × 27–60 mm, white with yellow at base, somewhat crinkled but not crumpled, entire along broadly tapered base, minutely short-crenate on outer margin, round to round-truncate at tip, glabrous; **stamens** 170–190, free; filaments ascending and radiating, 5–12 mm long, 0.2 mm wide at base expanding slightly to 0.4 mm near tip, constricted below anther, yellow; anthers basifixed, dithecal, linear, 4.3–6 × 0.6–0.7 mm, vivid to strong yellow, longitudinally dehiscent; pollen vivid yellow; **pistil** 1, 12–16 × 5–6.5 mm; ovary superior, narrowly ovoid, purplish and glaucous, densely prickly, 1-chambered of (3–)4(–5) units (carpels), each unit with many ovules attached to outer wall; style short; stigma (3–)4(–5)-lobed, descending and appressed to top of ovary, the lobes inversely fan-shaped, 3.5 mm wide, purplish, papillate, the expanded portions touching adjacent lobe and forming a notch or hole between claws of adjacent stigma lobes. **Fruit:** capsule (ceratium), dehiscent at tip typically by 4 valves, erect, prickly, many-seeded, narrowly ovoid when young often becoming oblong-ellipsoid before dehiscent, 30–52 mm long, deeply grooved over sutures, valves ascending to spreading, narrowly triangular, 8–15 mm long, with inrolled margins, veiny on inner surface, separating from framework of 4 fibrous strands of placenta (replum) arched above chamber and typically fused at tip by persistent style and stigma (breaking apart later); prickles spreading and ascending, thick at base tapered to tip, straw-colored. **Seed:** subspheroid, in range 1.5–2 mm, satiny black, with aril forming 2 points on 1 side; seed coat when fresh with vertical rows of large convex cells, when dry appearing pitted because cells collapse and become concave with raised cell boundaries. Mid-April–early July.

Native. A robust, very showy annual first discovered as a small patch on a burned slope at Palo Comado SMMNRA (SH) in 2005, but in 2006 occurring also in outlying subpopulations and presumed to be spreading. Like its shrubby cousins the matilija poppies (*Romneya*), the flower of *Argemone munita* resembles a fried egg with very large, pure white, crinkled petals surrounding a dense cluster of many, bright yellow stamens. All parts of the shoot as well as the flower buds and fruits are sharp-prickly. In our population, latex is milky white. The erect, capsular fruit generally dehisces via four valves close to the tip, and the seeds are thereafter shaken out and often dispersed by ants. When the fruit is freshly open, you can observe four fibrous strands (called a replum) that overarch the chamber like a skeleton and are fused at the style and stigma lobes, but in time and with rough treatment, the strands may break apart.

If variation within this species is officially recognized, our populations would fit subspecies *munita*.

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