

Distribution: Jalama Formation, (area 12) western Santa Ynez Mountains, Santa Barbara Co.; Debris Dam Sandstone, (area 13) Agua Caliente Canyon, San Rafael Mountains, Santa Barbara Co., California; Chatsworth Formation, upper part (area 16) at Lang Ranch, Ventura Co., California; Point Loma Formation, (area 19) near Carlsbad, San Diego Co., California; Rosario Formation, (area 22) Caõn San Fernando, northwestern Baja California, Mexico.

Geologic Age: Late Campanian and early Maastrichtian

Discussion: The above description is based on 13 specimens. The best preservation occurs in the Point Loma Formaton near Carlsbad.

Lysis jalamaca is similar to L. suciensis but has coarser, more scaly costae than L. suciensis, and available specimens of L. jalamaca are smaller and less elongate than are large specimens of L. suciensis. Lysis jalamaca is also similar to L. duplicosta in having variable sculpture and in having the strongest cords on the periphery, but L. jalamaca is less angulate at the periphery and has weaker cords there. In addition, L. jalamaca differs from L. duplicosta by being more elongate, having finer sculpture, and having the shelf broader posteriorly. The specimen (LACMIP 13378, Figures 18, 19) from the Jalama Formation has ribbing similar to L. duplicosta, but its shelf appears to wrap farther onto the interior of the outer whorl than is usual for L. duplicosta.

Etymology: The specific epithet, a name in apposition, reflects the new species occurrence in the Jalama Formation, Santa Barbara Co., California.

Lysis lomaensis new species (Figures 37-39)

Diagnosis: Lysis with low spire and last whorl bearing numerous flanged carinae separated by wide interspaces bearing several spiral threads.

Description: Shell medium size (up to 17 mm height and 30 mm diameter, same specimen), neritiform (last whorl rapidly expanding); spire very low, approximately 10 to 15% of shell height; protoconch 1.5 whorls, low and smooth; teleoconch 2 to 2.5 whorls, very carinated; suture abutting just anterior to periphery; sculpture consisting of up to 11 strong cords; cord at periphery and next three cords posterior of periphery very thin, flanged, and protruding (with cord at periphery protruding most); posteriormost part of last whorl (in vicinity of suture) with approximately three low scaly cordlets; up to three beaded to lowly spinose cordlets anterior to medial carina at periphery; interspaces between all cords wide and bearing up to seven spiral threads (occasional thread can locally develop into small flanged cord); area anterior to medial carina can be covered with only fine cordlets; aperture circular with margin sharply demarked by raised edge; shelf moderately wide, wrapping past suture and attached to inside of outer lip; posterior half of outer lip digitate.