# **CONTRIBUTIONS** ANGELES **IN SCIENCE**

NUMBER 117

LOS

COUNTY

MUSEUM

**DECEMBER 28, 1966** 

A NEW SPECIES OF ARCHITECTONICA FROM THE SANTA SUSANA MOUNTAINS, VENTURA COUNTY, CALIFORNIA

By J. Alden Sutherland

LOS ANGELES COUNTY MUSEUM OF NATURAL HISTORY EXPOSITION PARK LOS ANGELES, CALIFORNIA 90007

CONTRIBUTIONS IN SCIENCE is a series of miscellaneous technical papers in the fields of Biology, Geology and Anthropology, published at irregular intervals by the Los Angeles County Museum of Natural History. Issues are numbered separately, and numbers run consecutively regardless of subject matter. Number 1 was issued January 23, 1957. The series is available to scientific institutions on an exchange basis. Copies may also be purchased at a nominal price.

#### INSTRUCTIONS FOR AUTHORS

Manuscripts for the LOS ANGELES COUNTY MUSEUM CONTRIBU-TIONS IN SCIENCE may be in any field of Life or Earth Sciences. Acceptance of papers will be determined by the amount and character of new information and the form in which it is presented. Priority will be given to manuscripts by staff members, or to papers dealing largely with specimens in the Museum's collections. Manuscripts must conform to CONTRIBUTIONS style and will be examined for suitability by an Editorial Committee. They may also be subject to critical review by competent specialists.

MANUSCRIPT FORM.—(1) The 1960 AIBS Style Manual for Biological Journals is highly recommended as a guide. (2) Typewrite material, using double spacing throughout and leaving ample margins, on only one side of  $8\frac{1}{2} \times 11$  inch standard weight paper. (3) Place tables on separate pages. (4) Footnotes should be avoided if possible. (5) Legends for figures and unavoidable footnotes should be typed on separate sheets. Several of one kind may be placed on a sheet. (6) Method of literature citation *must* conform to CONTRIBUTIONS style—see number 90 and later issues. Spell out in full the title of non-English serials and places of publication. (7) A factual summary is recommended for longer papers. (8) A brief abstract must be included for *all* papers. This will be published at the head of each paper.

ILLUSTRATIONS.—All illustrations, including maps and photographs, should be referred to as "figures." All illustrations should be of sufficient clarity and in the proper proportions for reduction to CONTRIBUTIONS page size. Permanent ink should be used in making line drawings and in lettering (do not type on drawings); photographs should be glossy prints of good contrast. Original illustrations will not be returned unless specifically requested when the manuscript is first submitted.

PROOF.—Author will be sent galley proof which should be corrected and returned promptly. *Changes* after the paper is in galley will be billed to the author. Unless specially requested, page proof will not be sent to the author. 100 copies of each paper will be given free to a single author or divided equally among multiple authors. Orders for additional copies should be sent to the Editor at the time corrected galley proof is returned; appropriate forms for this will be included when galley is sent.

> DAVID K. CALDWELL Editor

# A NEW SPECIES OF ARCHITECTONICA FROM THE SANTA SUSANA MOUNTAINS, VENTURA COUNTY, CALIFORNIA

## By J. Alden Sutherland<sup>1</sup>

ABSTRACT: Architectonica llajasensis; a new species of gastropod from the Llajas formation, Middle Eocene, Santa Susana Mtns., Ventura Co., California.

A new species of Architectonica has been recognized during the study of material from Las Llajas Canyon, Santa Susana Mountains, Ventura County, California. Two locations have been of primary interest: LACMIP 461-A, in the lowest exposed layer of Las Llajas Canyon, and LACMIP 461-B, on the northern slope of a small canyon intersecting Las Llajas Canyon from the east. LACMIP 461-B is stratigraphically 70 feet higher than 461-A, and is 200 feet from the top of the Llajas formation. (see McMasters, 1933; Stipp & Tolman, 1934) The new species of Architectonica is from LACMIP 461-B. The faunal differences of the two locations are quite distinct and constant. LACMIP 461-A is characterized by Cylichnina tantilla Anderson & Hanna, and Lyria andersoni Waring; while 461-B is characterized by Venericardia hornii (Gabb) forma calafia Stewart, and Eucrassatella semidentata (Cooper). Other species common to both locations are Cernina hannibali (Dickerson), and Amaurellina clarki Stewart.

## Architectonia llajasensis, new species Figures 1 and 2

Diagnosis: Architectonica llajasensis differs from any other described species in that it has eight tuberculate spiral ribs with one intercalary thread on the body whorl, in the extreme acute peripheral carina, and also in the order of sculpture of the undersurface, and umbilical whorls.

Description of holotype: Shell medium size for genus; carinate; low conic; walls thin; suture impressed; aperture oblique, quadrate; umbilicus broad; whorls six. First three whorls not sculptured, fourth whorl sculptured by six tuberculate spiral ribs, penultimate whorl sculptured by eight tuberculate spiral ribs, body whorl sculptured by eight tuberculate spiral ribs, body whorl sculptured by eight tuberculate spiral ribs, with one tuberculate intercalary thread. Growth lines appear on body whorl behind aperture; whorls convex below suture, concave above; peripheral carina acute, tuberculate; undersurface concave at peripheral margin, convex from middle to basal keel; undersurface sculptured by nine spiral ribs, one or two intercalaries, two ribs nearest basal keel tuberculate; umbilical whorls sculptured by five tuberculate spiral ribs, with one tuberculate intercalary thread.

Diameter 26.5, altitude 14, aperture height 7, width 7 mm.

<sup>1</sup>Field Assistant in Invertebrate Paleontology, Los Angeles County Museum of Natural History.

*Type locality:* LACMIP 461-B, Middle Eocene, Llajas formation, Las Llajas Canyon, Santa Susana Mountains, Ventura County, California.

Holotype: LACMIP 1140. Collected by author, February 5, 1966.

Architectonica llajasensis is named for the geologic formation at the type locality. A single specimen is known.



Figure 1. Architectonica llajasensis, new species. Holotype, LACMIP 1140. Diameter 26.5 mm.