Pedicia obtusa Osten Sacken, Western Dipt., 205.—The description of this species given by Osten Sacken was only a provisional one, covering the salient features, owing to the fact that he did not have the specimen before him at the time, but depended upon Mr. Hy Edwards, the owner of the type, to write him the characters. As I have a specimen, I record the full description.

♂. Head small, grayish, the antennae yellow, palpi brown; frontal tubercle distinct, close to the antennae. Thorax grayish sericeous, ground color yellow, a double brown line on the dorsum and an abbreviated one each side of it, reaching to the transverse suture; on the pronotum a narrow median black line; a black stripe from the humerus to the base of the wing. Disk of metathorax and knobs of halteres infuscated. Abdomen light brown, darker along the

median line; the horny genital appendages are rather elongate, yellow, not infuscated. Legs brownish yellow, tips of femora and tibiae more infuscated, tarsi dark brown. Wings hyaline and brown, with almost the same pattern as in *P. albivitta*. The tip of the wing is not bent back so far as in the latter species. The brown color follows the fifth vein to the margin, differing in this respect from Mr. Edwards's specimen.

Length, 28 mm.; of wing, 22 mm.

Lake Union, Seattle, Washington, the last of August.

The most important structural difference between this and *P. albivitta* is in the male lamellae, which are more than twice as large in the present species.

GALL OF EURYTOMA SP. ON THE CAT'S-CLAW THORN.

BY C. H. TYLER TOWNSEND, LAS CRUCES, N. MEX.

Specimens of a very hard rounded gall were found on branches and twigs of the cat's-claw thorn (*Acacia* sp.), which grows plentifully from near base to part way up the Organ Mts., at the north end of the range, about three miles southeast of San Augustine. These galls greatly resemble those of *Rhodites*. At the date on which they were found, Nov. 26, 1892, they appeared to be empty, the insects having mostly escaped through numbers of small holes in each gall. The galls were quite plentiful. From those containing exit holes, the following brief description is drawn.

Gall.—Length (measured on twig), 10 to 19 mm.; greatest width $8\frac{1}{2}$ to 16 mm.

Oblong-rounded or suboval, very hard, always formed on one side of the twig, the other side of the twig even with the surface of the gall and its bark left intact, the bark of the rest of the twig or branch being split by the growing of the gall and adhering to its surface in imperfect strips, being best preserved next the sides of twig. Smaller specimens do not show this. Color reddish brown, more or less grayish where covered with bark and in smaller galls. Bulged surface that is not covered by bark finely roughened, sometimes more or less split in process of swelling.

Four galls. The small ones show only from one to three holes each. A larger gall shows about twenty exit holes, and in addition numbers of very minute holes through which parasites of the gall flies must have escaped. The minute holes are about

one-eighth the diameter of the larger ones. Cutting into one side of this gall revealed a small live white hymenopterous larva, about 2 mm. in length and apparently full grown, resting in a small cell. Old galls show irregular small hollowed cavities and cells inside.

From a specimen which was bred from the galls, Mr. Wm. H. Ashmead determined the genus as above. It is possible, however, that the *Eurytoma* is not the gall-maker, but a parasite of the latter.

ENTOMOLOGICAL NOTES.

In August, 1894, a perfect, and evidently freshly emerged, specimen of *Limenitis arthemis* was caught at Nonquitt, Mass., in an exposed place close by the sea.

C. G. Soule.

Dr. McCook is to be warmly congratulated on the successful issue of the third and final volume of his "American spiders and their spinning work," which has appeared four years after the second volume. The author is more at home in his delineation of the out door world than in systematic work, with which this volume is mainly concerned, yet he has applied himself to this task with commendable zeal and success and describes 123 species and 30 genera. Apparently (as the table of contents curiously shows) he had intended to carry his work beyond the "orb weavers," but his courage or his time gave out as he saw his work grow to portentous dimensions. We have to thank him for thirty large and careful plates of spiders colored besides a mass of structural details; they will greatly facilitate future study. The price of the complete work is now justly advanced to \$50. Unhappily the title page is marked 1893, though the preface is dated July 1894, and the volume was not issued until December, 1894.

Mr. and Mrs. Peckham have given us (Trans. Wisc. acad., x) a new series of their admirable experiments with spiders in a paper on their visual powers and color sense; they "prove conclusively that Attidae see their prey (which consists of small insects)

when it is motionless, up to a distance of five inches; that they see insects in motion at much greater distances; and that they see each other distinctly up to at least twelve inches"; they are guided by sight rather than by smell. The experimenters are further "of the opinion that all the experiments taken together strongly indicate that spiders have the power of distinguishing colors."

Certainly the "U. C." [Upper California?] entomological society has done a unique thing in issuing from Berkeley, Cal., as a Californian journal of entomology "The Entomologists' Daily Post Card" at \$2.00 a year. A card of regulation size and color is printed on both sides in clear type, leaving a meagre space for an address. The number before us contains an editorial on Note taking, part of a list of species in Edwards's last catalogue of butterflies, and a portion of a tabular key to the genera of Nymphalidae. It is a curious venture.

In a recent paper on the Siphonaptera (Proc. Bost. soc. nat. hist., xxvi, 312-355) Dr. A. S. Packard gives an excellent resumé of published observations on the embryology, postembryonic history and anatomy and the adult structure of the fleas, adding new data from his own preparations and numerous figures. He is led to regard them as forming a distinct order standing nearer the Diptera than any other, but with many points of relationship to the Coleoptera.

Hansen gives in English (Ent. tidskr., xv, 65-89, pl. 2-3) an important paper on the structure and habits of *Hemimerus*, a