JOURNAL

OF THE

New York Entomological Society.

EDITED BY WILLIAM MORTON WHEELER.

Published articles relating to any class of the subkingdom Anthropoda, subject to the acceptance of the Publication Committee. Original communications in this field are solicited.

PROCEEDINGS OF THE NEW YORK ENTOMOLOGICAL SOCIETY.

MEETING OF MARCH 3, 1908.

Held at the American Museum of Natural History, President C. W. Leng in the chair, with fourteen members and three visitors present.

The proceedings of the two preceding meetings were read and approved.

The Treasurer, Mr. Davis, made the following report :

Journal's account	$188.76 bal.
Society's account	998.04 bal.
	$1,186.80 total bal.

The Librarian, Mr. Schaeffer, reported the receipt of the following exchanges :

Canadian Entomologist, XL, No. 2.

Verhandl. d. k. k. zool. bot. Gesellschaft. in Wien, LVII, No. 10.

Mittheil. aus. d. Naturhist. Museum Hamburg, XXIV, 1907.

Deutsche Entomologische Zeitschrift, No. 1, 1908.

Wiener Entomologische Zeitung, XXVII, Nos. 2 and 3.

Zeitschrift f. wissenschaftliche Insektenbiologie, III, Nos. 10, 11 and 12.

The Ants of Porto Rico and the Virgin Islands, etc., by Prof. Wm. M. Wheeler.

Brooklyn Institute Museum Science Bull., Vol. I, No. 12.

Bulletin de la Société Imperiale des Naturalistes de Moscow, Nos. 3 and 4, 196.

Professor Wheeler read the following report :

"At a meeting of the New York Entomological Society held at the American Museum of Natural History, Feb. 4, 1908, a committee of three was appointed to draft resolutions expressing the deep regret felt by the members of the Society at the loss of President Morris K. Jesup.

"*Be it resolved*, therefore, that the Secretary of the New York Entomological

Society be instructed to spread on the minutes and communicate to the Board of Trustees of the American Museum of Natural History and to Mr. Morris K. Jesup's family, the sincere regret which the Society feels on losing one who manifested such broad and unfailing interest in all matters pertaining to natural history and the natural sciences in general."

E. B. SOUTHWICK,
W. M. WHEELER,
RAYMOND C. OSBORN,
Committee.

On motion the report was accepted.

Mr. Dickerson announced that the Newark Society had planned an outing at Great Piece Meadows, N. J., on Decoration Day, and invited the New York members to coöperate.

Mr. Engelhardt spoke on albinism and melanism among insects, illustrating the subject with an interesting series of specimens. His remarks were in substance as follows:

Albinism is due to the absence of pigment. The term "albino" was first applied by the Portugese to the white negroes of west Africa; it is now applied to any individual in whom there is deficiency of pigment in the skin, hair or eyes. The absence of pigment is normal in the polar bear, the northern white owl, etc. The seasonal change of color in such animals as the white fox and ptarmigans is due to cold and brought about by the formation of numerous air bubbles which tend to conceal the pigment, the latter being rarely entirely absent in the hair or feathers. It is doubtful whether albinism occurs among insects, unless cave insects and other subterranean forms may be designated as such. Among Lepidoptera a number of white varieties are recognized. Melanism is due to the excess of pigment and occurs among insects, fishes, reptiles, birds and mammals. Moisture is given as a primary cause of its appearance but many facts are still wrapped in doubt. The hot and moist atmosphere of the tropics and the cool damp climate of mountain regions and polar lands both cause melanism. The black leopard of southern Asia is only a melanotic variety of the common leopard. Butterflies and moths inhabiting mountain regions of high altitude are usually darker than individuals of the same species living in the drier and warmer lowlands.

The following specimens were exhibited: *Colias philodice* ♀ ♀ of normal form and albinic variety. *Colias philodice* ♂ ♂ of normal form and melanotic variety. The latter were exceptionally fine examples, entirely suffused with black, captured at Bethlehem, Pa., in August, 1907. *Argynnis myrina* ♂ ♂, normal and melanotic forms, the latter taken at Overbrook, N. J., May 30, 1907. *Papilio glaucus* and var. *turnus* ♀ ♀; the black form with upper wings entirely black and orange spots on lower wings absent. *Sabulodes transversata* ♀ ♀, normal and melanotic forms. *Cicindela partruelis* and *C. consentanea*, *Cicindela rugifrons* and *C. modesta*. *Dictyophorus micropterus*; red form from Florida and black form from Texas. *Melitæa rubicunda* ♂ ♂, normal form and aberration with yellow spots entirely absent. *Melitæa mæglashani* ♂ ♂, normal form and aberration with red spots entirely absent *Colias behrii* ♂, illustrating typical mountain species.

In the discussion which followed the reading of Mr. Engelhardt's paper, Mr. Schaeffer stated that the white color of the *Colias* var. was due not to absence of pigment, but to the abundance of white coloring matter present.

Professor Wheeler stated that among ants the subterranean forms lacked pigment owing to the absence of light action, and doubted if there was any such thing as true albinism among insects.

Mr. Joutel affirmed that he had found what he took to be true cases of albinism in the white patches about the eye spots on the wings of certain Bombycine moths. He also stated that he could effect a difference in the color of the adult by feeding their caterpillars in the dark. Both Mr. Engelhardt and Mr. Dall supported this by evidence which they had seen.

Mr. Dow's remarks, "A Little Inquiry into Nomenclature," dealt mainly with the names of insects as Linnæus found them when he decided upon the binominal names now used. He and Latreille some years later depended largely for this system on the posthumous work of John Ray, 1724, in which insects are divided into three classes; those with complete, partial and no metamorphosis being the divisions used. Lobsters were therefore put in the second class. Ray applied no names. Scholarship in that age being almost wholly classical, Linnæus adopted every name he could find in Greek and Latin literature. Hebrew writings allude to only nine insects. Pliny's Natural History was used almost completely, but less than a dozen of Pliny's names were Latin, the rest being formed from the Greek. That literature supplied over 300, largely from Aristotle. Hence it happens that the present generic names are derived from Greek almost exclusively. Specific names are Latinized because Latin was the language in common use among scholars. De Geer, 1740, wrote of a *Podura atra*, *aquatica*, etc. Linnæus, 1755, immediately took the first adjective as the specific name. The first distinction between scientific and common names occurred after his death. Identification of insects mentioned by classic Greek authors discloses more blunders than correct conclusions.

Scarabæus. This name is over 6,000 years old. Its sound influenced Carabus, which by root is Keras + bous, *i. e.*, a beetle with ox-horn shaped mandibles, probably *Scarites.*

Cerambyx, a beetle with cup-shaped antennæ, or mandibles, probably a lamellicorn.

Psyche was the only Greek name for butterflies, although their metamorphosis was known for thousands of years. Psyche was symbolical of the soul and was so used.

Phalæna was the only Greek word for moth. It was mythological, a monster which arose from the sea and devastated whole provinces. As a moth it meant the destroyer, *i. e.*, the cutworms, noctuids. The term was used by Walker, in 1856, to cover most of the moths and was applied even later to the Arctiids.

Papilio, found only in Ovid and Pliny, means butterfly and flying moth; literally a tent flap, from the method of folding the wings when at rest. This and *Curculio* are evidently Greek words, although they do not occur in extant Greek writings. *Curculio* is first found in Plautus, an early comedian, who borrowed everything from Greece. It was applied then as now to a grain-eating weevil.

Sphex Greek, *Vespa* Latin, *wasp* English, have the same root, the only entomological name common to the Aryan people, hence one of the oldest of all names.

Latreille to differentiate a genus invented *Polistes*, literally a builder of cities, to apply to the paper-making wasps.

Argynnis, as it now appears, is a misprint. Fabricius wrote *Argyreus* and failed to write legibly or read proof.

Arctia was the she bear, as the children called the caterpillars "wooly bears," then as now.

Lycæna was the she wolf, because the children called the caterpillars "were wolves."

Ichneumon in Egyptian and Greek, the rodent, which ate the eggs of the sacred crocodiles, was applied by Linnæus to the egg parasites — now cuckoo-bees. It is, of course, misapplied to the present superfamily.

Mr. Leng called attention to a paper by C. J. Gahan (Annals and Magazine of Nat. Hist., ser. 8, Vol. I, Feb., 1908) in which the following new names are proposed for North American longicorns, viz :

Cyllene caryæ Gahan for *C. picta* of our lists.

Obrium rufulum (Dej. Cat.) Gahan for *O. rubrum* of our list.

Typocerus zebra Oliv. for *T. zebratus* of our list.

In reference to the first change proposed, Mr. Gahan points out that the figure, description and food plant given by Drury are clearly identical with our *C. robiniæ*, the locust tree borer. The hickory tree borer is therefore without a name. Mr. Gahan also points out the great difference in the punctuation of the ♂ pronotum of the two species. In denuded specimens this character is easily seen.

In reference to the second change, Mr. Gahan states that *Obrium rubrum* Newn. is a synonym of *Batyle suturalis*, so that a name is required for the insect we have for many years identified as *rubrum*.

In connection with the third change proposed it may be recalled that we have already substituted Förster's name *nitens* for the *Leptura* previously known as *zebra*.

Mr. Leng also called attention to papers by Dr. Walter Horn (Stett., Ent. Zeit., 1907, p. 329) referring to the synonymy of *Cicindela tortuosa* of our lists, which, according to the German authors, should read *Cicindela trifasciata* Fab. subsp. *ascendens* Lec. and *Cicindela trifasciata* Fab. subsp. *sigmoidea* Lec.; the latter being the Californian variety. In another paper (D. E. Z., 1907, p. 22) Dr. Horn refers to *C. scutellaris* Say and its varieties. In a previous paper Dr. Horn had cited *obscura* Fab. as having priority, but that name being preoccupied, he restores Say's name. He mentions aber. *oberleitneri* Gess'l var. *rugifrons* which is usually green. This name has never been used in our lists and it represents a form that is barely separable. He also proposes to substitute *modesta* for *lecontei* Hald. because Dejean first described *modesta* as "d'un brun obscur un peu broncé," to which Mr. Leng thought some exception might be taken.

Society adjourned.

MEETING OF MARCH 17, 1908.

Held at the American Museum of Natural History, President C. W. Leng in the chair, with twelve members and twelve visitors present.

On motion of Mr. Davis the by-laws were suspended in order to have the lecture open before the business session.

Professor Wheeler delivered his interesting lecture upon "Desert Ants," illustrated by many handsome colored slides.

Mr. Davis announced that as in obedience to the Society's order, he had purchased five new Globe-Wernicke book-cases, which would shortly be delivered.

Mr. Dow, chairman of the Field Committee, announced that the Society would take its first excursion of the season to Garrett Rock, near Paterson, N. J., on May 3.

The Librarian, Mr. Schaeffer, stated that he had the opportunity to exchange ten volumes of the Journal for the "Biologia" parts containing the Longicornia. He was authorized to make the exchange. The Librarian reported the receipt of the following exchanges:

Canadian Entomologist, Vol. XL, No. 3.

Report of the Entomological Department N. J. Agric. College Exp. Sta. for 1907.

Zoölogical Record, Insecta, Vol. XLIII, 1906.

Society adjourned.

MEETING OF APRIL 7, 1908.

Held at the American Museum of Natural History, President C. W. Leng in the chair, with sixteen members and three visitors present.

The minutes of the preceding meeting were read and approved.

The Librarian, Mr. Schaeffer, reported the receipt of the following exchanges:

Verhandl d. k. k. Zool. Bot. Gessellschaft in Wien, Vol. LVIII, No. 1.

Proc. Amer. Philos. Soc., Vol. XLVI, No. 187.

Mittheilungen d. Schweizerischen Entom. Gesellschaft, Vol. XI, No. 7.

Zeitschrift f. wissenschaftliche Insektenbiologie, Vol. IV, Nos. 1 and 2.

Bull. North Carolina Dept. Agric., Vol. XXIX, No. 1.

Ann. Museo Nacional de Montevideo, Vol. VI, No. 3, pt. 3.

Mr. Davis proposed as an active member Mr. George W. J. Angell, 235 West 76th St., New York City.

On motion of Mr. Bischoff, the by-laws were suspended and the Secretary was authorized to cast a single ballot for the election of Mr. Angell.

The Librarian requested permission to expend $10 for four book-cases to be used in storing the back numbers of the Journal in his office at the Brooklyn Museum. The request was granted.

The first paper of the evening was by Mr. Schaeffer, who exhibited the Lampyridæ which he collected in the Huachuca Mts., Ariz. He remarked that the Lampyridæ show much more than any other family the Sonoran character of the Coleopterous fauna of this region, while the Lampyridæ from Brownsville, Texas, have very few representatives of the semi-tropical fauna, the latter being more abundantly represented among the phytophagous Coleoptera. Mr. Schaeffer called attention to the genera *Euryopa*, *Discodon* and *Pectonotum*, new to our fauna, about which he made some remarks for publication in the June number of the Society's Journal, together with the descriptions of the new species. Of the 32 species exhibited 12 were new. Only two or three are also found in Mexico, which again, as Mr. Schaeffer said, shows strongly what he had stated at a previous meeting, namely, that very few of the species described in the "Biologia" are found in southern Arizona and southern or southwestern Texas. He also called attention to the close resemblance of a moth *Tripocris* to *Lycus fernandezi*, the moth mimicing the *Lycus* so closely that when on the wing they could scarcely be distinguished. Another Lampyrid, *Lycostomus laripes*, was very abundant on oak and with it occurred, but very infrequently, a Cerambycid, *Erytroleptus insignis*, which, when alive, resembles the *Lycostomus* so closely in action and color that it could be easily overlooked. Specimens of the mimetic moth and Cerambycid beetle were also shown.

Mr. R. P. Dow spoke informally upon "Nomenclature; a little of its Poetry."

This side of naming insects has been neglected since its great advocates, Linnæus, Latreille, Schrank and Westwood. To Latreille we owe the beautiful image of *Parnassius*, with *Apollo* as its type. They are the creatures which fly around the summit of the sacred mountain of poetry, guarded by Apollo himself.

Schrank furnished *Pieris*, the flies which cluster around the fountain of inspiration. True, the *Colias* seek the mud puddle, but it is better far to see in every mud puddle the Pierian Spring than to mistake the spring for some mud puddle.

Westwood dwelt upon the followers of the great god Pan, contributing to entomological nomenclature the satyrs, dryads and other nymphs. The dictionaries are utterly wrong in deriving Pamphila from pan + phila, *i. e.*, beloved by all. Fabricius adapted the name to mean "the especial favorite and messenger of Pan, the god of Nature students." *Eudamus* Swainson is Pan's well-beloved. Hesperidæ generally are devoted to the God of the Setting Sun, *i. e.*, the west. This fact, their color and all render the Indian names given to them peculiarly appropriate.

Linnæus gave us *Sphinx* but did not carry out the imagery to the species. Like *Phœnix*, they represent a re-incarnation of the Egyptian gods, demi-gods and heroes. Linnæus began and Schrank continued the Saturnians, a race of peaceful giants, archaic in form, and preceding the whole cosmogony of Zeus. Linnæus gave us *Heliconius*, the attendants flitting around the fountain of the Muses. Its type is *charitonia*, the clown, but an airy fairy clown at that.

Linnæus gave us the whole army before Troy for ten wasted years. The type of all butterflies represents the *Psyche* of his first ambition. It is *Papilio Machaon*, the physician, son of Æsculapius, and with his brother *Podalirius*, surgeon-in-chief to the Greek forces. Cuvier and Westwood were right in this assumption. Scudder, in his guess at *Antiopa*, as the type, was incorrect.

Linnæus, followed by Fabricius, named Lepidoptera after living men, but never except the minor ones, the plebeians as opposed to the patricians. The only exception is the *Huntera* of Fabricius.

Each named some Tortricids after discoverers. Hochenwarth (1789) is the only man who named a species after himself.

Mr. Dickerson exhibited a number of cases of the bagworm and the parasites which infest them. He spoke concerning the life history and habits of the bagworm, of the results of the work of various parasites and of disease in checking the spread of this economically important insect in various parts of the State of New Jersey. Mr. Dickerson expects soon to publish the result of his work on the bagworm.

In connection with the importance of disease in checking the number of insects, Professor Smith spoke of the advantages of giving more attention to this in connection with the gypsy moth and other injurious insects.

Society adjourned.

MEETING OF APRIL 22, 1908.

Held at the American Museum of Natural History, President C. W. Leng in the chair, with eighteen members and three visitors present.

The reading of the minutes of the preceding meeting was postponed.

The Librarian reported the receipt of the following exchanges:

Trans. Wisconsin Acad. Sci., Vol. XV, Pt. II.

Berliner Entomol. Zeitschrift, Vol. XLII, No. 2.

Canadian Entom., Vol. XL, No. 4.

Zeitschr. f. Wissensch. Insektenbiologie, Vol. IV, No. 3.

Annales de la Soc. Entomol. de Belgique, Vol. LI, 1907.

Mr. Dow, chairman of the outing committee, spoke concerning the proposed excursion to Garrett Rock, Patterson, N. J., Sunday, May 3.

Dr. Zabriskie, with a very appropriate speech, presented to Professor Wheeler a number of ash trays which had been manufactured from beach-clams obtained at Rockaway Beach.

Mr. Leng exhibited a collection of *Cychrus* obtained from the eastern United States, and spoke concerning "The Northeastern Species of *Cychrus*." This paper is soon to be published, so Mr. Leng's remarks are not here set forth, but one statemeet of Mr. Leng's concerning the improbability of *Cychrus* feeding exclusively on snails led to considerable discussion. Mr. Wheeler brought out the point that the length of the head had been instrumental in strengthening the idea that the *Cychrus* feeds on snails. Mr. Schaeffer said that though they were fond of snails they would feed on almost any soft-bodied insects. Mr. Davis remarked that at Lakehurst he had found *Cychrus elevatus*, but with a possible exception of a few under bark he had found no snails in that locality. Evidently, therefore, they must feed on something else.

Mr. Leng's paper also mentioned Jordan's law that two closely allied species seldom occur in the same locality and that if they do their habits are different. Professor Wheeler stated that in his opinion this law would not hold good and mentioned, to support his belief, cases in which two species of ants, very closely allied, lived in the same locality and under the same ecological conditions ; also of two closely allied species of sea-bean which he had seen growing together on the beaches of Porto Rico.

Mr. Davis mentioned that if the theory of mutation were correct we should expect to find closely allied forms closely associated and cited the case of his finding several allied species of morning glory in the same locality.

Mr. Davis showed a collection of *Cecropia* cocoons opened by woodpeckers and by mice. The woodpeckers pierce with their bills cocoons that are on branches sufficiently large not to give way before their blows. The birds are careful to make the holes near the center of the cocoon so as to reach must readily the pupa within. Mice, however, when opening cocoons on elder-bushes and like situations, do not work so definitely, for while they usually pull the cocoons open from the bottom, they are just as likely to make two or even three holes in them before deciding on any definite mode of procedure.

Mr. Davis also exhibited and made a few remarks on four species of *Chauliodes* from Staten Island, and a fifth one from New Jersey, these being all of the species so far known from eastern North America.

Mr. Harris spoke concerning the results of his examination of Mr. Lütgen's collection.

Society adjourned.

MEETING OF MAY 5, 1908.

Held at the American Museum of Natural History, President C. W. Leng in the chair, with eighteen members and one visitor present.

The Librarian, Mr. Schaeffer, reported the receipt of the following exchanges:

Bolletin Museu Goeldi, Vol. V, No. 1.

Wiener Entom. Zeitung, Vol. XXVII, Nos. 4 and 5.

Deutsche Entom. Zeitschrift, 1903, No. 2.

Mr. Dow, of the outing committee, reported that eleven members were present at the field trip to Garrett Rock, Paterson, N. J., and announced that the next expedition would be to Rockaway Beach on Sunday, May 10.

The death of Professor Willis G. Johnson, recently a member of the Society, was reported and the President requested Mr. Osborn to prepare a suitable notice for publication in the next Journal.

Dr. Zabriskie spoke on the "Microscopical Examination of External Structures of Certain Heteropterous Insects of the Genera *Chariesterus*, *Leptocorisa*, *Zicca* and *Acanthocerus*." Numerous lantern slides illustrated Dr. Zabriskie's talk. The remarks were chiefly explanations of the lantern slides, projections of etched tracings of camera lucida drawings from microscopial mounts of dissections. The dissections were from external structures of both sexes of a species belonging to each of the four genera mentioned in the title, *i. e.*, *Chariesterus gracilicornis*, *Leptocorisa filiformis*, *Zicca tæniola* and *Acanthocerus lobatus*, all members of the family Coreidæ as tabulated in Uhler's check-list, and nearly all collected in Cuba. The specimens were selected from a fine lot of Heteroptera donated to Mr. Zabriskie by Professor C. T. Baker, lately of the Agricultural Exp. Station of Cuba, and of the Museum at Para, Brazil.

The illustrations showed something of the remarkable uniformity of external structures in the family Coreidæ, so far as these have been examined. The antennæ of the successive species differ in length and contour, but all have the small, cuplike supplementary segment between the third and fourth segments; the labium varies in length as compared with the segments of the beak, the barbs of the two outer lancets vary in coarseness and number, but otherwise have the same general form. All species have the pair of peculiar stout spines, situated near the margin of the cleft and near the base of the second segment of the beak. They all have the general form of "comb" at the apex of the tibia, on the inner side of the anterior legs, apparently differing only in the number and coarseness of the spines. All have the general form of curious "wing-lock" on the under surface of the hemielytron, or anterior wing, consisting of a thickening of the distal, acute angle of the clavus, in which thickening lies a deep pit, furnished on the anterior side with one or more rows of stout, curved spines, and on the posterior side with a small prominence furnished with several rows of fish-scale-like spines and the same general form of "wing-clasp." The opposing upturned costal edge of the posterior wing, on expansion of the wings, glides into the pit, under the points of the stout spines in the anterior wing, and evidently forms a firm union in flight.

In the last species mentioned, *Acanthocerus lobatus*, there is a remarkable exhibition of secondary sexual characters. The posterior legs of the male are greatly enlarged and furnished with a formidable armature of stout spines. The female has the supero-posterior angles of the metathorax slightly protuberant, with a faint orange color. The male has the same angle of the metathorax furnished with a prominent lobe, rising from a stout base, quickly thinning out into a spatula-shaped process extending longitudinally at an angle of 45 degrees with the longitudinal axis of the insect, varying in length in different specimens, in some cases equalling one half of the diameter of the thorax, and of a striking orange color.

Professor Wheeler read an interesting paper on *Cremastochilus* which is to be published in the June number of the Journal.

Mr. Dow exhibited a specimen of *Promethia* moth which was abnormal in the shape of the angles of the wings.

Mr. Stebbins exhibited a moth, *Estigmene acræa*, with the fore wings darker than the normal form.

Mr. Osborn spoke of finding a species of *Cheilosia* (one of the Syrphidæ) at Garrett Rock near Paterson, N. J., which had heretofore been taken only in Colorado.

Mr. Schaeffer remarked that Mr. Schott had taken a rare beetle, *Anatrichus minutus*, at Huntington, Long Island.

Society adjourned.

MEETING OF MAY 29, 1908.

Held at the American Museum of Natural History, President C. W. Leng in the chair, with sixteen members and seven visitors present.

The minutes of May 5 were read and approved.

The Librarian, Mr. Schaeffer, reported the receipt of the following exchanges:

Descriptions of New Species of South American Geometrid Moths by William Warren.

Descriptions of New Curculionid Beetles of the Tribe Anthonomini by W. D. Pierce.

Descriptions of Three New Species of Saturnian Moths by William Schaus.

On a Collection of Thysanopterous Insects from Barbadoes and St. Vincent Islands by H. F. Franklin.

Notes on some Western Orthoptera by A. N. Caudell.

Canadian Entomologist, XL, No. 5.

Verhandlungen d. k. k. zool. Bot. Gesellschaft in Wien, LVIII, Nos. 2 and 3.

Tijdschrift voor Entomologie, 1908, No. 1.

Mr. Dow, chairman of the field committee, announced an excursion of the Newark, Brooklyn and New York societies to Great Piece Meadow on Decoration Day.

On motion of the secretary the June meetings of the society were dispensed with.

Professor J. B. Smith gave an illustrated lecture on the "Development of Mouth Parts in Insects." He mentioned the Thysanoptera as having the simplest type of mouth parts. The Hemiptera not having mandibles present at any stage in their development were emandibulate, while all of the other orders showed the mandibulate character at some stage in their development. He dwelt particularly upon the mouth parts of the locust as being particularly typical of the mandibulate type and pointed out the homology between these and corresponding parts of other insects. In connection with the Diptera he said that there existed in text-books a great deal of misconception concerning the homology of their mouth parts.

Professor Wheeler differed from Professor Smith in the assumption that the Hemiptera were emandibulate during their entire development and showed drawings of the early embryos of *Ranatra* and *Zaitha* as evidence. He also took issue with Professor Smith on the homology of some of the mouth parts of the Diptera.

Mr. Engelhardt exhibited a collection of Sesiidæ comprising all but three of the species recorded from the eastern United States. His remarks related briefly to their feeding habits and economic importance. He mentioned briefly the life history of several species heretofore unknown and spoke of a new species of *Memythrus*.

Mr. Barber spoke briefly concerning the species of Berytidæ. He mentioned the distinguishing characteristics of the different species, and of the capture of *Jalysus multispinosus* Ashmead at Lakehurst, N. J., by Mr. W. T. Davis. He also recorded a new species of the family from the Huachuca Mountains, Arizona. Specimens of all the species were exhibited.

Society adjourned.