NEW STATE RECORDS AND ANNOTATED FIELD DATA FOR LOUISIANA BUTTERFLIES AND SKIPPERS

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INTRODUCTION

During the past ten years an annotated list of the Rhopalocera of Louisiana was compiled (Lambremont, 1954; Ross & Lambremont, 1963). The present report constitutes a third paper in this series and summarizes collection data for 1962, 1963, and 1964. This supplement adds five new state records (in the list these are marked with *) for Louisiana, which now has recorded a total of 111 species of butterflies and skippers.

Only those specimens that represent significant revisions of our earlier concept of distribution, abundance, range, or flight date, or that are new state records will be mentioned. Many additional collections that duplicate earlier data were made, but these will not be listed in this paper. We have followed the style used in the paper by Ross & Lambremont (1963) and the nomenclature of Ehrlich & Ehrlich (1961) for the butterflies and dos Passos (1964) for the skippers.

The names of collectors and contributors are abbreviated as follows: ETA (Edward T. Armstrong), YHA (Yousef H. Atallah), JBC (Joan B. Chapin), HRH (Henry R. Hermann, Jr.), MMJ (Mary M. Johnson), ENL (Edward N. Lambremont), JBL (John B. Lambremont), BLM (Burt L. Monroe), LDN (Leo D. Newsom), DKP (Dale K. Pollet), GNR (Gary N. Ross), RHW (Ricard H. Witten), and RNW (Roger N. Williams).

SATYRIDAE

Euptychia cymela cymela (Cramer). This satyr was collected in Allen, Calcasieu, Red River, Vernon, Webster, and Winn parishes (= counties) in April, 1962. This extends our known distribution in a southwesterly direction. The species has not been found in the marshy southeastern one-third of the state, and appears to be associated principally with the pinelands.

Euptychia gemma gemma (Hübner). This satyr has been recorded from Calcasieu Parish near the southwestern corner of the State, and also from Natchitoches Parish in the north-central and East Baton

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Rouge Parish in the south-central part of the State. Fresh specimens were caught in April, 1962 and 1964. Its overall distribution resembles that of *E. cymela*, although the record from Baton Rouge (1δ) was obtained on 16 Oct. 1963 (ENL) in an area well away from the pinelands. This specimen was collected in a mixed live oak (*Quercus virginiana* Mill)-sweet gum (*Liquidambar styraciflua* L.) forest that has a very abundant population of *Euptychia hermes* throughout the spring and summer.

Nymphalidae

Chlosyne gorgone gorgone (Hübner). This species was previously known only from the Shreveport area in the very northwest corner of Louisiana. We have collected it in abundance in Grant, Natchitoches, and Winn parishes in central Louisiana during the middle of April of 1962 and 1964. At one location, two miles north of Pollock, Grant Parish, 18 April 1964 (JBL, ENL, and GNR), $9\delta\delta$ and 1199 were taken in an open grassy field in the pinelands. Most were feeding on the aster *Coreopsis lanceolata* L. (Compositae). Hundreds of other individuals were seen at this and other nearby localities. We feel that this species is clearly established as a Louisiana resident.

Chlosyne nycteis nycteis (Doubleday). Lambremont (1954) listed two specimens from opposite sides of Louisiana, while Ross and Lambremont (1963) recorded no new collections of this species. We have found it to be locally abundant although one is likely not to see it except at scattered times. A sizable emergence occurred in a live oak-sweet gum forest bordering the senior author's home between 15–20 May 1963, five miles south of Baton Rouge, during which time 11 fresh males were taken. C. nycteis was taken also in Natchitoches, Red River, and West Feliciana parishes in April, 1963 (GNR and ENL). Thus, it appears to be generally distributed throughout Louisiana.

Phyciodes texana seminole (Edwards). This species was taken in Iberville Parish south of Baton Rouge at Plaquemines, 4 May 1963 (ETA). A late season individual was caught on the L.S.U. campus in Baton Rouge on 30 Nov. 1963, 1& (ETA). This butterfly is not very abundant in Louisiana, but has been collected at widely separated points at Shreveport and Baton Rouge. It flies from early in the season (April) until late autumn (November).

*Polygonia comma (Harris). Three new specimens have been taken in Louisiana. All were captured in the Florida Parish area east of the Mississippi River and north of Lake Pontchartrain. The collection data are: West Feliciana: two miles NW of Tunica, 20 March 1963, 13, 19 7 & & and 3 & & at five different localities between 15 March and 1 April of 1963 and 1964 (GNR, ENL, and HRH). This species was always found on or near red cedar (*Juniperus virginiana* L.). Its distribution in the State in West Feliciana and Natchitoches parishes indicates that it is well established, although it occurs only locally in conjunction with red cedar.

Callophrys henrici turneri (Clench). Two males were reported previously (Ross and Lambremont, 1963) both in West Feliciana Parish. We have subsequently obtained $8 \delta \delta$ and $23 \circ \varphi$ from four different locations in the same parish. Collecting dates were from 15 March to 1 April 1963 and 1964, with the largest single number (21) taken on 21 March 1964 (GNR, ENL, and HRH). The adults were found on redbud (*Cercis canadensis* L.) and red cedar. There is no doubt that this hairstreak is well established in this part of Louisiana.

Callophrys irus (Godart). This species was listed by Lambremont (1954) on the basis of Skinner's report (1907), although Skinner considered *C. irus* and *C. henrici* conspecific. We have obtained a single specimen, a male with an unmistakable stigma on the upper forewing from Grant Parish: three miles E Bentley, 18 April 1964 (GNR, ENL, and JBL). It was resting on false indigo (*Baptisia tictoria* L.) in a pine forest.

Eurystrymon ontario ontario (Edw.). Lambremont (1954) recorded one specimen from New Orleans. Now, a second specimen has been taken. The data are: East Baton Rouge: Baton Rouge, 11 May 1964, 1 \circ (MMJ).

*Panthiades m-album (Bdv. & LeC.). This species is here recorded for Louisiana for the first time. The collection data are: West Feliciana: two miles NW of Tunica, 20 March 1963, 1 ° (ENL and GNR). The specimen was taken in a dense uplands hardwood forest in the bluff lands of the Tunica Hills.

Celastrina argiolus pseudargiolus (Bdv. & LeC.). This lycaenid is not often seen in Louisiana. We have been told of several additional specimens from St. James and St. John parishes along the Mississippi River between Baton Rouge and New Orleans and also have collected a male in West Feliciana Parish on 15 March 1964 (GNR) and a female at Baton Rouge on 25 April 1964 (ENL). D. K. Pollet reported a female from Gramercy, St. James Parish, on 29 July 1959, which is the latest flight date known for this species in the State.

PIERIDAE

Anthocharis genutia genutia (Fabr.). Lambremont (1954) reported

(GNR and ENL); East Baton Rouge: ten miles SE Baton Rouge, 22 March 1964, 1 & (ENL, GNR, and JBL). The latter specimen was found dead on the shoulder of a road.

Nymphalis antiopa (L.). Lambremont (1954) and Ross and Lambremont (1963) recorded four individuals for Louisiana during late summer and early autumn. The captures of two additional specimens have been called to our attention: St. John: Reserve, 14 May 1956, 1° (DKP) and East Baton Rouge: Baton Rouge, 5 May 1964, 1° (HRH). The latter mentioned specimen constitutes the earliest season record for this species. All six specimens known from Louisiana have been taken in the southeast portion of the State.

RIODINIDAE

Calephelis virginiensis (Guérin). Lambremont (1954) reported a single male specimen from St. Tammany Parish in his collection. We have taken two additional males from Grant: two miles N Pollock, 18 April 1964 (GNR, ENL, and JBL). Both were obtained while they fed on blossoms of the aster *Coreopsis lanceolata* L. in an open grassy clearing beside a pine forest.

LYCAENIDAE

Satyrium liparops liparops (Bdv. & LeC.). One additional specimen, from Grant Parish, was collected as a pupa on a sweet gum tree in a dense forest of sweet gum, live oak, and cedar (*Juniperus virginiana* L.) in the Kisatchie National Forest. The adult emerged 12 days later. The collection data are: 18 April 1964, 1 $\stackrel{\circ}{}$ (ENL, GNR, and JBL).

*Satyrium calanus calanus (Hübner). This species constitutes a new Louisiana record, represented by six specimens recently collected in East Baton Rouge Parish. The first was taken in a light trap on the L.S.U. campus: Baton Rouge, 8 May 1962, 1° (JBC). The identification was confirmed by Mr. Harry K. Clench. Additional records are: Baton Rouge, 10 May 1963, 1° (YHA) caught at night at a lighted window; five miles S Baton Rouge, 25 April 1964, 1° , 1° (ENL) taken at the edge of an oak forest and Baton Rouge, 13 May 1964, 1° and 20 May 1964, 1° (RNW) caught feeding on sunflowers (*Helianthus annuus* L.). Thus far we have this species only from the vicinity of Baton Rouge, but it has been taken in three consecutive years.

Callophrys gryneus gryneus (Hübner). Ross and Lambremont (1963) reported a single female for Louisiana taken in March, 1962. This beautiful hairstreak now has been taken as follows: Natchitoches: two miles SW Derry, 19 April 1964, 433 (GNR, ENL, and JBL); West Feliciana:

the falcate orange tip from Louisiana for the first time in Jackson and Lincoln parishes. It has since been obtained in Webster Parish (in the north), Natchitoches Parish (in central Louisiana), and West Feliciana Parish (in south-central Louisiana) flying in April. Five males and one female were taken on 4 April 1964 at Shongaloo in Webster Parish (LDN), and two males and two females were netted at two different localities (Grand Ecore and Montrose) in Natchitoches Parish on 19 April 1964 (ENL, GNR, and JBL). The West Feliciana Parish specimen was a male, taken on 22 April 1963 (RHW) at Retreat. Thus, this species is widely distributed in the State, but is much more abundant in the northern half.

HESPERIIDAE

Achalarus lyciades (Geyer). Only three specimens were reported previously, all taken in the northern and western parts of the State. One additional male was taken in Allen Parish, 25 April 1962 (BLM).

*Thorybes pylades (Scudder). These four specimens constitute a new state record: Grant: two miles N Pollock, 18 April 1964, $2\delta\delta$ (GNR, ENL, and JBL); Vernon: two miles NE Leesville, 19 April 1962, 1δ (GNR); Winn: one mile W Winnfield, 18 April 1964, 1δ (ENL, GNR, and JBL). The male from Vernon Parish was determined by Dr. J. M. Burns. All specimens were taken in pine forests.

Pholisora catullus (Fabr.). Only three specimens were reported previously. The new listings are: Grant: three miles E Bentley, 18 April 1964, 1 $\stackrel{\circ}{}$ (ENL, GNR, and JBL) and Winn: eight miles WSW Winnfield, 19 April 1964, 1 $\stackrel{\circ}{}$ (JBL, ENL, and GNR).

MEGATHYMIDAE

*Megathymus yuccae yuccae (Bdv. & LeC.). A single female has been taken which constitutes the first record of a member of this family for Louisiana. The data are: West Feliciana: one mile E Bains, 1 April 1963 (GNR and ENL). No yucca plants were seen in the immediate area but a large colony of these plants is located about four miles NNW of Bains near the town of Weyanoke. This specimen was sent to Mr. H. A. Freeman who determined it to be typical *M. yuccae* and stated that it constitutes the most western record known for this subspecies.

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AN AGGRESSIVE ENCOUNTER BETWEEN CATOCALA CARA (NOCTUIDAE) AND POLYGONIA INTERROGATIONIS (NYMPHALIDAE)

Upon entering a wooded area of the city limits of Lafayette, Louisiana near the Vermilion River about 2:00 P.M. CST on 22 June 1962, I noticed *Catocala cara* (Guenée) turning up at every hand. I had considered it generally a nocturnal species, seldom active during the day except when startled from its hiding place. Nothing occurred to change my mind until I noticed one of the underwings flying slowly near a wound in an elm tree. The moth settled and began feeding on the sap that issued from the wound. A *Polygonia interrogationis* (Fabricius) was attracted to the same patch of sap. It darted at the underwing, which arose and engaged the butterfly in aerial combat for one or two minutes. Finally both insects settled, about three inches apart, and fed at the same bit of sap for about five minutes. Then the moth ran across the bark in the direction of the butterfly, its wings fluttering in short, rapid strokes that did not exceed a 45° angle above the body. The butterfly, evidently startled, flew off and did not return.

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