

## A NEW CLIFF SWALLOW FROM CANADA.

BY HARRY C. OBERHOLSER.

The form of *Petrochelidon albifrons*<sup>1</sup> inhabiting most of western Canada proves to be subspecifically distinct from the typical race. It may be described as follows:

*PETROCHELIDON ALBIFRONS HYPOPOLIA*, subsp. nov.

*Chars. subsp.*—Similar to *Petrochelidon albifrons albifrons* from eastern United States and Colorado, but larger; frontal band paler, more whitish; breast more grayish (less ochraceous).

*Description.*—Type, adult male, No. 195055, U. S. Nat. Mus., Biological Survey collection; Fort Norman, Mackenzie, June 11, 1904; E. A. Preble, original number, 1830. Forehead creamy white; crown metallic blue black; hind neck brownish gray; back and scapulars, like crown, but streaked with brownish gray and whitish; rump cinnamon; upper tail-coverts light fuscous, the tips of the feathers whitish; tail fuscous; wings fuscous black, with a slight metallic bluish or greenish sheen, the inner edges of the primaries and secondaries paler and on terminal portion narrowly edged with brownish white, the outer webs of the inner secondaries and of the tertials margined with the same, and the greater wing-coverts slightly tipped with paler brown; lores and narial bristles, brownish black; sides of the head below the eyes, together with the upper throat, between chestnut and bay; chin and centre of the lower throat, black; sides of neck light brownish gray; breast, sides, and flanks, light brownish gray, the centre of the breast washed with pale cinnamon; remainder of the lower parts dull white, the crissum washed with chestnut; lining of wing light brownish gray; edge of wing barred with dull light cinnamon and brownish gray.

*Measurements.*—Male:<sup>2</sup> wing, 110-115 (average, 112.1) mm.; tail, 49-52 (50.7); exposed culmen, 6-8 (7.2); tarsus, 11-13 (12.3); middle toe without claw, 10.5-12 (11.3).

Female: wing, 108-111.5 (average, 110.2) mm.; tail, 49.5-51.5 (50.7); exposed culmen, 6-8-7.2 (7.0); tarsus, 13; middle toe without claw, 12-12.5 (12.3).

*Geographic distribution.*—Breeds in northwestern North America, north to Mackenzie and central Alaska; west to central British Columbia; south to Montana; and east to Alberta and Mackenzie. Migrates through Wyoming and California. Winters probably in South America.

This is the largest of the races of *Petrochelidon albifrons*, and differs from *Petrochelidon albifrons tachina* still more than from the typical *Petrochelidon albifrons albifrons*. The difference in measurements between *Petrochelidon albifrons albifrons* and our new Canadian race may be seen by comparison of the figures above given for the latter with the following dimensions of *Petrochelidon albifrons albifrons* taken from Colorado, Wyoming, and eastern United States birds.

Male:<sup>3</sup> wing, 105-112 (average, 107.6) mm.; tail, 47-51 (49.9); exposed culmen, 7-8 (7.2); tarsus, 12-13 (12.6); middle toe without claw, 11-12 (11.8).

Female:<sup>4</sup> wing, 102-109 (average, 107.2) mm.; tail, 47-51 (48.9); exposed culmen, 7-8 (7.4); tarsus, 11.5-13 (12.5); middle toe without claw, 11-13 (11.9).

Breeding birds from Dickey in southern Idaho, the Snake River in eastern Washington, and from Ashcroft in central southern British Columbia, are apparently referable to *Petrochelidon albifrons albifrons*. Specimens from Greybull and Saratoga, Wyoming, are in size about half-way between *Petrochelidon albifrons albifrons* and *Petrochelidon albifrons hypopolia*, but in color they are decidedly nearer the former, and are here included under that race. A single specimen from Pembina, North Dakota, indicates that the bird from at least the northeastern part of North Dakota is the eastern form. The present new race migrates through the western United States, as spring examples from Wyoming and southern California indicate.

All the specimens of *Petrochelidon albifrons hypopolia* examined are included in the following list:

*Alaska.* Nulato (May 24, 1867); St. Paul Island (about June 10, 1918).

*Arizona.* Tucson (April 18, 1918).

*Mackenzie.* Fort Resolution (June 23, —); Fort Good Hope (June 20, 1904); Fort Norman (June 11, 12, and 14, 1904).

*California.* Laguna Station, San Diego County (May 4, 1894).

*Montana.* Milk River at 49° north latitude (July 25, 1874); Johnson Lake (June 3, 1910); Fort Benton.

*Wyoming.* Ten Sleep (May 31, 1910).

<sup>1</sup>For the change of name from *Petrochelidon lunifrons* to *Petrochelidon albifrons*, cf. Rhoades, Auk, XXIX, No. 2, April, 1912, pp. 193-195.

<sup>2</sup>Five specimens, from Alaska, Mackenzie, and Montana.

<sup>3</sup>Seven specimens.

<sup>4</sup>Eleven specimens.