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*Wilson Bull.*, 98(3), 1986, pp. 483-484

**Swallows taking insects from pond surfaces.**—The abundance of flying insects is strongly affected by weather (Williams 1961, Taylor 1963); hence, it should be adaptive for birds that are primarily aerial insectivores to have alternative foraging strategies for times when flying insects are scarce. Early in this century, Forbush (1929) claimed that in early spring, Tree Swallows (*Tachycineta bicolor*) in New England left their breeding areas in cold windy weather and went to sheltered places “where the sun shines more warmly—where they can still find insects or can pick benumbed ones from the water or ice along the shore.” Recently, Erskine (1984) reported observations of Tree Swallows and Violet-green Swallows (*T. thalassina*) foraging on the ground and cited other reports of Tree Swallows, Purple Martins (*Progne subis*), and Northern Rough-winged Swallows (*Stelgidopteryx serripennis*) foraging on the ground and from ice surfaces. One of us (RRC) recently observed Tree Swallows taking active winter stoneflies (Plecoptera) from the surface of frozen ponds. King (1958, 1967) reported Barn Swallows (*Hirundo rustica*), Common House-Martins (*Delichon urbica*), and a Bank Swallow (*Riparia riparia*) taking dormant winged insects from the surface of the sea along the coast of England. We could find no published accounts of North American swallows taking benumbed or dead insects from water surfaces. Here we describe two such events that occurred in 1983 and 1984 near Denver, Colorado, during cold weather in the spring.

Mild weather prevailed in Colorado during 8-10 May 1983, with the air temperature in Denver reaching 27°C on 9 May (Denver Local Climatological Data, U.S. Dept. Commerce, 1983). The temperature did not exceed 5°C on 11 May, although it rose to 18°C on 12 May, only to drop again as a storm (rain, snow, and high wind) passed through the area on 13 and 14 May. From 16:00 to 17:00 on 14 May, MLD observed a mixed-species flock of swallows flying rapidly back and forth, close to the surface of Windsor Lake, a 25-ha pond

in southeastern Denver County. The flock included about 70 Barn Swallows, 35 Violet-green Swallows, 15 Cliff Swallows (*H. pyrrhonota*), 5 Bank Swallows, and 5 Tree Swallows. The birds frequently contacted the water surface with their beaks, as if picking small objects from the water. The water surface was littered with dead or moribund Diptera, apparently midges (Chironomidae), about 6 mm in body length. The air temperature was 5°C and the sky was overcast; there was little or no wind.

In 1984, mild weather prevailed in the Denver area on 16 and 17 April, with the air temperature reaching 24°C on 17 April, followed by a cold period with temperatures not exceeding 13°C on 18 April. From 08:30 to 10:00 on 19 April, Cohen observed this same food source and swallow feeding behavior in a flock of swallows at Cottonwood Marsh, a 7-ha pond in Walden Ponds County Park in eastern Boulder County. The flock included about 200 Tree Swallows, 50 Barn Swallows, 10 Violet-green Swallows, 10 Bank Swallows, and 5 Cliff Swallows. The sky was mostly cloudy with patches of fog, the air temperature ranged from 6 to 9°C. There was a 9-km/h N to NE wind. The birds' frequent contact with the surface again was clearly the type of action that swallows use to pick up small objects and unlike the action they use to drink from a water surface (Cohen, pers. obs.). Flying insects appeared to be scarce, and swallows did not appear to be foraging in the air as well as at the pond surface.

Swallows are commonly seen flying low over water surfaces in the early spring, perhaps foraging on active newly emergent insects (Erskine, pers. comm.). The observations reported here suggest that the taking of dead or moribund insects from water surfaces during cold weather may be a more common foraging behavior in swallows than has previously been recognized.

We thank K. L. Bildstein, A. J. Erskine, D. J. Hayes, K. Munthe, and R. A. Wolinski for critical comments on the manuscript.

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*Received 30 Apr. 1985, accepted 31 Jan. 1986.*