

**PURPLE MARTINS (*PROGNE SUBIS*) SURVIVE  
LATE WINTER STORM**

Bill Summerour

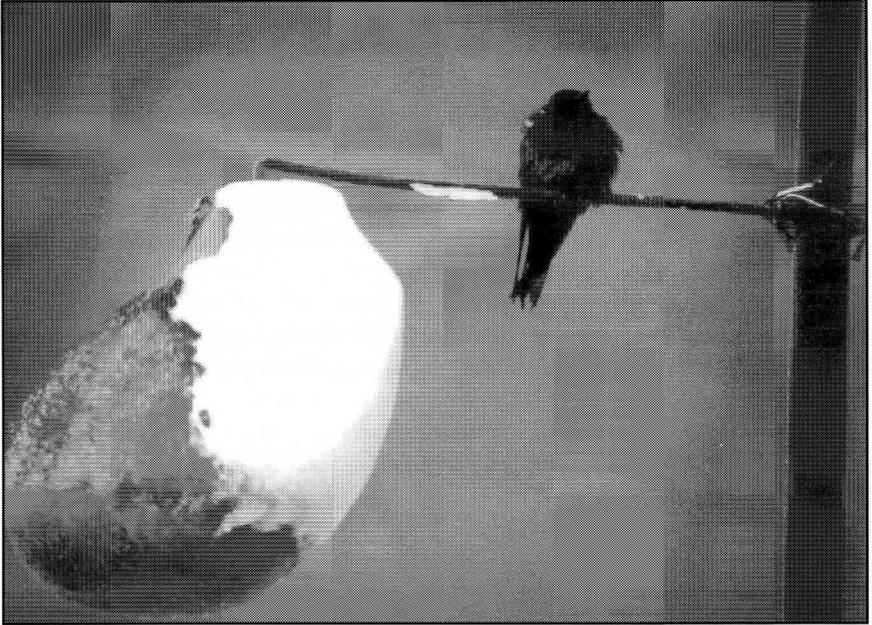


Figure 1. A martin warms up in subfreezing temperatures after the worst winter storm in Alabama history. (Photo by Bill Summerour)

There seems to be a generally held belief that early arriving Purple Martins (*Progne subis*) are vulnerable to perishing from exposure or starvation as a result of late winter cold spells. Living on a farm two miles west of Jacksonville in northeast Alabama, which was among the hardest hit areas by the winter storm of '93, gave me an opportunity to observe first hand the effect this storm had on a colony of early martins. I was able to get an exact count of the individuals that went to roost on the evening of 12 March, the night the storm hit, and an accurate count of the survivors four days later.

The first martins arrived on 22 February, a male and female that appeared to already be paired when they arrived. My neighbor, Carl McGinnis, has had a martin colony for 25 years, and since martins have a very strong site fidelity, it was no surprise that they went straight to his gourds, ignoring my first year housing only 100 feet away. Over the next two weeks, a dozen more birds trickled in, all singles and mostly males. Like the first two, they also went straight to their old colony site.

## ALABAMA BIRDLIFE

By 12 March, however, a few birds had ventured over to inspect my new gourds and that evening four went to roost in them; eleven went to roost in Carl's, for a total of 15, actual count.

The snow started about 8:00 o'clock that evening and continued all night, driven by blizzard force winds. By morning there was a foot of snow on the ground with waist deep drifts around the barns and outbuildings. The wind blew snow into the gourds, filling them with ice and sealing over the openings. One of Carl's poles holding eight gourds was blown down. The gourds landed on a pad of snow on top of a shed which helped cushion the impact, but they were soon covered under a blanket of new snow, entombing the martins inside the gourds. One bird did manage to free itself and sought shelter in a wood pile on the leeward side of my barn. I flushed it accidentally as I walked around the barn to take pictures during the storm. It labored off the ground and flew into the blowing snow, and disappeared into the whiteness. I figured it would die of exposure.

As darkness fell on the 13th, the snow tapered off and the winds died down. That night the temperature fell to near zero (2° in Birmingham). Looking out the window at this cold, bleak scene, it was hard to imagine how any martin, still alive, could survive the night.

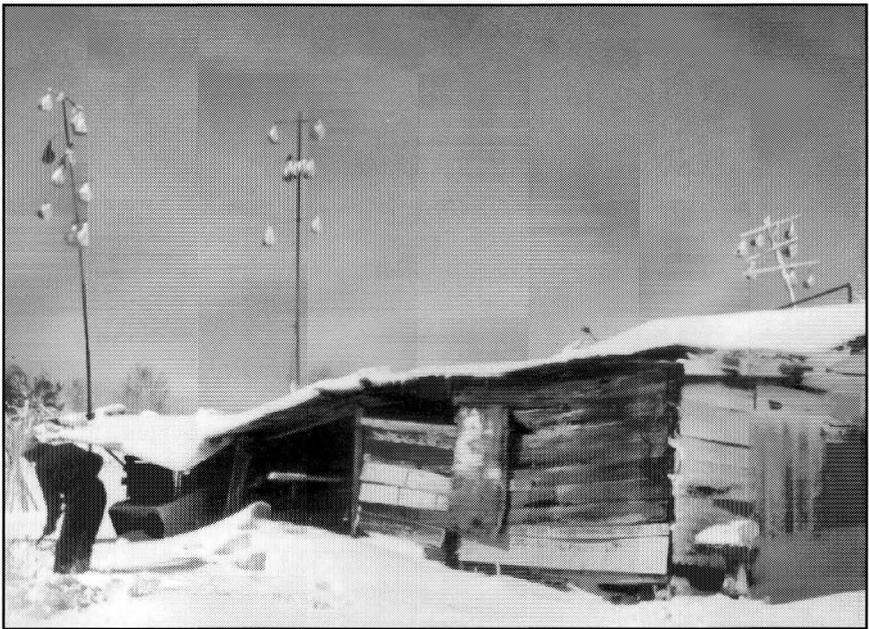


Figure 2. Carl McGinnis digging out after the storm. Notice the martin, center pole, middle crossbar. (Photo by Bill Summerour)

The next morning broke sparkling clear and still, except for the popping and cracking of trees and limbs breaking under a heavy load of snow. There was no sign of life around my gourds where four martins had gone to roost. The gourds hung like lifeless ice balls against the bright blue sky.

Next door Carl was shoveling out a path to his outbuildings where the martin poles were located (Figure 2). There, above him, sitting on one of the poles was a lone martin, facing into the early morning sun trying to gather up a little warmth in the near zero temperature (Figure 1). Later in the morning as the sun melted the snow from the gourds, other birds emerged to dry out in the sun and bask in the subfreezing temperatures.

That afternoon, 24 to 30 hours after the blizzard had blown down Carl's pole, he pulled the gourds down from the roof of the shed where they had fallen, and two martins flew out from under the snow! A third martin could not free itself because its tail was frozen to a sheet of ice in the bottom of the gourd. We managed to get it out unhurt, but it later died due to its weakened condition and probably shock.

On 15 March, the fourth day after the storm began, I counted 14 martins sitting on the crossbars, all busy preening and tidying up after the storm. Of the 15 counted going to roost before the storm, 14 had survived. These birds had survived heavy snow, blizzard force winds, temperatures near zero, wind chills well below zero, and no food for three or four days and perhaps longer.

While it is true that 15 martins is not a sample of 100 or 1,000 birds scattered randomly over the entire storm area, these observations do show that early arrivals are well adapted to surviving very cold and adverse conditions, including heavy snow. If these birds survived the worst winter storm in Alabama history, then it is reasonable to assume that most early arriving martins can handle the routine, even severe, cold spells that occur in Alabama almost every spring. **Bill Summerour**, 2012 Cedar Springs Dr., Jacksonville, AL 36265.

