

Sandhill Crane Mortality Due to Blizzard of March 1996 in Nebraska

Gary R. Lingle, Platte River Whooping Crane Maintenance Trust, 2550 N. Diers Ave. Suite H, Grand Island, Nebraska 68803, (308) 384-4633 (4634), lingle@hamilton.net

Storm-related mortality of migratory birds undoubtedly occurs regularly but is difficult to quantify particularly with respect to small passerines crossing large bodies of water. Hurricanes, tornadoes, hail storms, and blizzards are among the primary causes of such deaths. On 13 March 1990, an unusual series of tornadoes and hail storms killed an estimated 30,000 waterfowl (primarily Snow Geese *Chen caerulescens*) in south central Nebraska. Sandhill Cranes *Grus canadensis* are less susceptible to direct weather-related trauma due to their size and stature. The greatest known cause of mortality of cranes in Nebraska is collisions with utility lines which increase during adverse weather conditions. On 22 March 1966, several hundred Sandhill Cranes were estimated to have died due to a blizzard, an unprecedented event at that time. The conditions leading up to that incident were very similar to those occurring on 24 March 1996 when another blizzard struck the Big Bend reach of the Platte River during the peak of the crane migration when an estimated 519,984 Sandhill Cranes were present. Several thousand cranes died as a result of the 1996 blizzard, making this event the greatest single cause of natural mortality reported for this species. Post-mortem examination of several carcasses confirmed trauma associated with collisions with the ground and other objects as the major cause of death. Events such as this reinforces the need to protect and maintain suitable habitat throughout the staging area of the Big Bend to minimize the risk of a future catastrophic event that could decimate cranes or other migratory species. As habitat conditions continue to degrade, the birds are forced to concentrate at remaining sites exposing them to increased risks. I report the details of the 1996 blizzard.