

## THE GREAT GANNET WRECK OF '91

by Blair Nikula

*"Skua!" arose the cry from the small group of birders assembled on the sands of First Encounter Beach. Normally such a pronouncement would have engendered a frantic pressing of eyeballs to oculars and skeptical "where's," as anxious birders struggled to spot the specter, sure that such an apparition, if it existed at all, in an instant would be nothing more than a rapidly disappearing speck on the horizon. But not this time. These birders had heard this same call several times previously this damp October morning, and, perhaps somewhat numbed and jaded by what they had so far witnessed, their response was almost casual as they trained a battery of optics on the heavy, dark form powering its way before them just beyond the tidal flats. As the imposing bird continued southward, the white semaphores of its primaries flashing conspicuously, it dropped low, changed course slightly, and pumped its way toward several Pomarine Jaegers that were resting on the flats. Taking no chances with this oceanic bully, the jaegers rose to avoid its threatening approach. Just beyond, several more jaegers followed suit, then several more, and more still. In an instant the air was filled with a swirling mass, as some sixty Pominines and a myriad of gulls prudently avoided challenging the pelagic pecking order. His authority effortlessly asserted, the avian Darth Vader continued on and was gone, leaving his human admirers amazed and applauding this once-in-a-lifetime spectacle.*

One of the most exciting birding features in eastern Massachusetts is the frequent appearance of seabirds close to shore. Indeed, nowhere else on the East Coast, and in few other sites anywhere in North America, can pelagic birds be seen with such frequency from land. The long, hooked arm of Cape Cod creates a natural trap, snaring southbound seabirds blown shoreward by easterly gales. When conditions are right, which happens all too rarely to suit most of us, Cape Cod Bay can become a seething caldron boiling over with windblown pelagics. In late October 1991, conditions were right—very right.

During Sunday, October 27, the remains of marginal Hurricane Grace merged with a deepening low pressure system north of Bermuda. Simultaneously a strong high pressure system became nearly stationary over eastern Canada. An intense pressure gradient developed between the two systems, and an upper level block in the atmosphere resulted in a slow and most unusual westward movement of the storm over the next three days. Late in the day on October 30, the potent storm passed to the south of Cape Cod headed for the New Jersey shore. Three days of northeasterly gales had generated huge seas (over thirty-foot waves), and the storm passage and peak winds coincided with high tide along most shorelines facing east and north, resulting in the most

extensive coastal flooding in memory. Although not as intense, this storm was of greater duration and created even more devastation than the blizzard of 1978. It also produced one of the most memorable pelagic shows ever recorded from these shores. The following chronology summarizes that week's avian events. A complete accounting of all the sightings is not possible here, but *Bird Observer's* October 1991 and November 1991 Bird Sightings will provide the interested reader with additional specifics.

Pelagics were extremely scarce throughout the summer and fall of 1991, both from shore and on Stellwagen Bank. Thus, we had little reason to think that this storm was going to produce much in the way of birds, and observations during the first two days of the storm tended to confirm the low expectations. On Monday, October 28, under overcast skies, northeast winds picked up rapidly in the early morning and were soon gusting over forty-five miles per hour. Dick Forster spent two hours at Sandy Neck in the morning, visited several other sites along the Cape Cod Bay shore, and ended up in Provincetown. Although large numbers of gannets (about ten thousand) were passing and scoters were numerous, he saw little else except a handful of jaegers and several shearwaters. He returned to Sandy Neck for two and one-half hours again the following morning (October 29), but saw even fewer birds, although at Corporation Beach in Dennis that same morning, Bob Pease estimated that gannets were passing at the rate of six thousand per hour. Later in the day, Dick discovered some sixty gannets in Town Cove (an inland bay), Orleans—an unprecedented sight and the first indication that something out of the ordinary was in the works. However, even more incredible was Hugh Ferguson's report of another sixty gannets on Lake Wequaquet in Barnstable, two and one-half miles south (i.e., inland) of the tip of Sandy Neck!

Early on Wednesday morning, October 30, the wind, although still of gale force, had subsided somewhat, and the sun was breaking through the clouds. Wayne Petersen spent an hour at Sandy Neck early in the morning, and I went to Corporation Beach for about forty-five minutes before work. Although gannets were still moving in modest numbers, and some were passing over land behind the parking lot at Corporation Beach, there again was little indication that anything significant was imminent. However, by midmorning the skies had darkened again, it began to rain, and the winds increased. Bob Abrams and Tom Cameron arrived at Sandy Neck around 11:00 A.M., and during the next hour, they saw eighty jaegers passing. After breaking for lunch, they returned to find jaegers streaming past and during the next hour recorded three hundred more jaegers in flocks containing up to fifty-six birds. Some of the birds were being blown over land and were passing over and behind the parking lot. Regrettably, at about 2:30 P.M., their jaeger total at 440 birds (virtually all Pomarines), the police forced them to leave. They then went to Scorton's Creek in Sandwich, and during the next hour or so recorded another 120 jaegers.

Meanwhile, Ken Hamilton was at Gray's Beach in Yarmouth Port, on the southeast corner of Barnstable Harbor, where jaegers were also streaming by in flocks. Eventually, however, he too was forced to leave by the police, but not before he had recorded 420 jaegers. By late afternoon winds were regularly gusting over sixty miles per hour, with the peak gust of seventy-eight miles per hour recorded in Chatham just after 5:00 P.M. We can only wonder how many more jaegers would have been tallied had the local constabulary not been so excessively protective!

As word of the day's events spread that night, discussions centered around whether any birds would still be around the next morning and where they would be seen. This storm, with its backward progression, was clearly not typical, and the standard "Sandy Neck during the storm, First Encounter the next day" rule of thumb was much in question.

I opted for First Encounter Beach and arrived there the next morning (October 31) at 6:15 A.M. The storm, somewhat weakened, was at this time off the New Jersey coast well to our southwest, but winds were still out of the northeast, occasionally gusting to gale force, and the skies remained overcast and threatening. During the first forty-five minutes a few distant jaegers appeared, but there was little else and virtually no gannets; not a good sign, I incorrectly surmised. By 7:00 A.M., my optimism waning, I began debating whether or not to head for work, when suddenly a string of seventeen Pomarine Jaegers materialized before me. Accompanying the jaegers were not one, but two skuas, one leading the flock and the second bringing up the rear. Although I had seen skuas at this site on a number of occasions, two at once was a first for me and probably anyone. Perhaps work could wait.

More jaegers and small numbers of gannets and kittiwakes appeared. Then, fifteen minutes after the first sighting, two more skuas arrived. The jaegers began appearing in bunches, frequently a dozen or more in a flock, and there was a great deal of milling about. By 9:00 A.M. the jaeger total was approaching three hundred, and two more skuas had brought that total to six birds. Finally, to my relief, after almost three hours alone other birders began to arrive.

By this time jaegers were almost everywhere: flying every which way out over the water; sitting on the now-exposed flats; and one group after another heading directly over land (in some cases low overhead) on a direct course to the ocean three miles to the east. Over the next couple of hours, several more skuas cruised past, their numbers culminating in a group of three birds that flew in and landed on the flats in front of us! This trio spent several minutes resting and preening, affording most of us the best views we have ever had of these exalted birds, and allowing us to confidently identify two of them as Great Skuas (as was at least one, if not all, of the earlier birds). The third bird of this group, however, appeared somewhat smaller and was uniformly dark, lacking

the mottling present on the other two, raising suspicions that it might have been of another form.

The pace slackened by noon, although there was still a fairly steady stream of jaegers. By 1:30 P.M., when most of us had reached our saturation point and decided to leave, the jaeger count stood at approximately eleven hundred birds, virtually all Pomarines as best we could determine; we had identified only thirteen Parasitics. The skua totals numbered ten sightings involving seventeen individuals that, because we could not be certain that some were not repeats (though we had no sense that there was any repetition), we decided to report very conservatively as twelve or more birds.

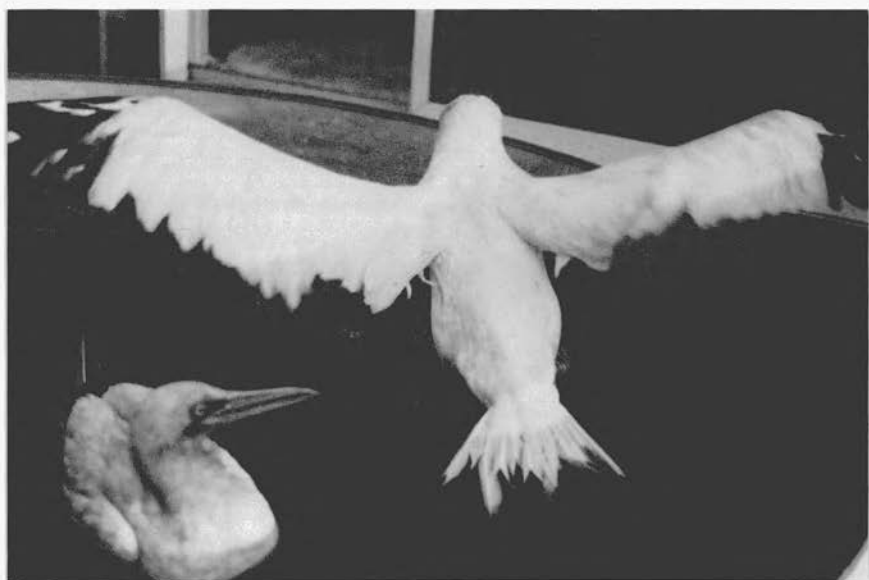
The jaeger count is one of the largest one-day totals ever recorded anywhere in the world, while twelve or more skuas is probably the largest number ever seen from land in North America. Although the stercorarids stole the show, there were other birds moving, including about 105 phalaropes (apparently both species, though only Red was positively identified), two Dovekies, one large alcid species, fifteen hundred kittiwakes, and two thousand gannets.

Meanwhile, Bob Abrams (to his eternal regret) spent the day at Sandy Neck, but amazingly in seven hours saw only six jaegers. He and others, however, did record an impressive three hundred Leach's Storm-Petrels, while we saw no storm-petrels at First Encounter Beach. How could the species composition on the same body of water at two sites only about twenty miles apart (as the jaeger flies) have been so radically different?

On Friday, November 1, skies were still overcast and the wind still northeast at moderate speeds, but apparently few birders were out. One local birder, who spent a short time at First Encounter around midday, saw several jaegers, so it seems that there may have been a fair number of birds still in the bay.

The sun finally broke through the clouds early on Saturday, November 2, and the wind was light out of the west, a pleasant day. Yet a few pelagics still lingered; in two hours at First Encounter, I and many others recorded several jaegers, several storm-petrels, and about one thousand gannets. Some of the gannets headed overland to the east, and at least three or four were seen to come in from the east and head out over the bay—most bizarre behavior for this species. The most remarkable sighting this day, however, came from Dorothy Arvidson and Becky Barber who counted some three hundred gannets on Lake Wequaquet! A couple of fishermen told them that even larger numbers had been present during the previous days. They found at least fifty birds still present on November 3.

As amazing and exciting as the jaeger and skua flight was, the most significant aspect of the week-long storm was probably the impact it had on gannets. Never before in this area, or anywhere else apparently, have numbers of gannets been found away from the immediate shoreline. Normally even one



*Gannet Photos Courtesy of the Orenda Wildlife Trust*



gannet on a freshwater lake would be remarkable; hundreds staggers the imagination. In addition to the birds on Lake Wequaquet, five gannets were seen on just one corner of Long Pond in Harwich early on October 31, but unfortunately no search of any other large ponds on the Cape was undertaken, so we will never know the full extent of this unprecedented phenomenon. Scores of incapacitated gannets were reported as well, including one in the Burger King parking lot in Barnstable, another on the grounds of Barnstable High School in Hyannis, and yet another that surprised a jogger on a bicycle path in Barnstable. The Orenda Wildlife Trust, a nonprofit organization that now handles virtually all wildlife rehabilitation on Cape Cod, treated seventy exhausted gannets, fifty-two of which survived to be released. Most of these birds were recovered on October 31 and November 1; they were force-fed herring and then released as quickly as possible, most within a day or two, as they apparently do not adapt well to captivity. One fulmar and two Leach's Storm-Petrels (but no jaegers) were also treated by Orenda, but none of the three survived.

Obviously, any seabird in the North Atlantic encounters severe weather regularly; gale force winds are a routine event, and hurricane force winds occur at least a few times a year. Undoubtedly, these birds have evolved some means to deal with heavy winds and seas, although just what these adaptations are remains for the most part a mystery to we littoral humans. It does appear that many (if not all) seabirds generally ride out these storms on the wing rather than in the water. Nonetheless, some of the smaller species do succumb to the elements from time to time. Dovekie "wrecks" are the best known and most frequent (historically at least) example, but phalaropes and storm-petrels are occasionally reported in numbers far ashore as well. The larger species, on the other hand, even though regularly blown close to shore, seem able (except for the odd individual or two) to avoid being blown over land. Gannets are routinely present in large and sometimes spectacular concentrations along Massachusetts' outer coast during migration, often very close to shore. They are in fact less pelagic than many seabirds. Yet, despite their tendency to hug the shore, these impressive birds are extremely rare even a short distance inland.

Why were gannets so affected by this storm? Although it was a powerful gale, the wind speeds certainly set no records. Two aspects of the tempest were, however, exceptional: its duration and its movement. Most northeasters develop to our south and move steadily up the coast, passing fairly rapidly. Consequently, gale force winds rarely last more than twenty-four hours. This storm, in sharp contrast, developed to our east and moved very slowly westward toward land, generating three days of gales and heavy seas. It also struck at a time when gannet (and apparently Pomarine Jaeger) migration was peaking.

However, several aspects of this gannet wreck suggest that other factors contributed to the bird's predicament. Displaced gannets were first noted as early as midday on the second day (October 29) of the storm, when winds (on

shore at least) had not yet exceeded fifty miles per hour. Jaegers, on the other hand, did not appear in numbers until the storm peaked on the third day (and no incapacitated jaegers were reported). It therefore seems doubtful that either the storm's strength or duration was, initially at least, the primary factor in the extreme displacement of these powerful sulids. This was also not simply a case of inexperienced youngsters being caught in their first major blow; the vast majority of the gannets, both over Cape Cod Bay and inland, were adults, and only four of the seventy incapacitated birds brought into Orenda were classified as "immature" birds.

Thus, the gannets must have been considerably stressed before the storm developed. The most likely source of stress would be a widespread food shortage. Indeed, most of the birds brought in for rehabilitation showed no signs of ill health, appearing simply exhausted and hungry; once fed, they recovered rapidly. The general paucity of fish-eating seabirds throughout the fall on Stellwagen Bank and elsewhere off southern New England is consistent with this supposition, as is the fact that in the weeks following the storm, exceptional numbers of gannets were noted off the Connecticut coast far into Long Island Sound, where they are normally quite rare. It is also very curious that the birds on Lake Wequaquet remained in this presumably inhospitable environment for so long, some of them for at least four days after the storm passed. Were they simply too weakened or disoriented to leave? Or were they able to find food on the lake, perhaps more food than they could find along the coast? (The fishermen at the lake indicated that they had seen the gannets diving and catching fish, and they expressed concern that the birds would eat all the fish!) The storm may have simply exacerbated what was already a difficult situation for gannets.

The 1991 Halloween northeaster wreaked great havoc upon a variety of coastal inhabitants, some of whom had no business being there in the first place. But for a handful of birders, fortunate enough to be in the right places at the right times, it provided some incredible, imperishable memories.

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