Unique weka

Wekas are among the most enjoyable of our native birds to watch, and there is no other place in the lower North Island where this is easier than on Kapiti Island. Their mammal-like behaviour, inquisitive nature, tameness in man's presence, protectiveness shown to chicks and primaeval-sounding call combine to set the weka apart from all other New Zealand birds. These intrinsic values must be recognised, just as we recognise those of the kiwi. If it was shown that wekas threatened the survival of little spotted kiwis on Kapiti Island, removal

of wekas would need to be considered. But if kiwis are established satisfactorily on islands free of wekas, an option currently being pursued by the Wildlife Service, any threat posed to the kiwis by wekas on Kapiti Island would become less critical.

We should not be trapped into managing an island nature reserve solely for one species of bird, unless this is the only way to save that species from extinction. Other birds and other values of the whole island system must be kept in mind when deciding our aims for management.

Editor's footnote: Since receipt of this article, we have heard of a 75 percent reduction in the weka population in the Gisborne area. As yet no cause has been determined for such a dramatic loss, although avian disease or the effects of the drought have been mentioned as possibilities.

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BUT WHAT RISK CAN WE ACCEPT?

asks Jim Jolly, Scientist, N.Z. Wildlife Service, in his reply to the above article.

wrote the article on little spotted kiwis both to draw attention to problems facing the little spotted kiwis on Kapiti Island in trying to breed in the presence of wekas, and to promote discussion of the issues concerned.

The response by Ian Atkinson and Peter Daniel raises some valid points but, regrettably, also accuses me of showing a prejudice against wekas and using unsound arguments.

It is not possible in a Forest and Bird article to present all the results of five years of research. This does not mean that the arguments presented and views expressed are based on "inferences and assumptions'', as alleged by Atkinson and Daniel. The statements in my article are based on our research findings and cautious interpretations of them. In contrast, Atkinson and Daniel have, I believe, made several unsupported and incautious assertions, some of which need further comment.

The history of the growth of the little spotted kiwi population on Kapiti is even less well known than its origin. Atkinson and Daniel correctly point out that the kiwis increased in the presence of wekas, but this is not to say that this happened at times of high weka density. Weka populations are known to fluctuate wildly on the mainland and, if similar fluctuations occurred on Kapiti then it is possible that the kiwi population increased only at times of low weka numbers.

My concern for the kiwi population today is based not only on the fact that wekas have preyed on two thirds of kiwi nests in the two study areas but also that:

- The eggs from 90 percent of the 32 kiwi nests found so far in our study have been lost.
- There has been no chick production in the young forest study area.
- Our chick searches in older forest have found some chicks where we know a few nests survive.
- Our habitat surveys of the whole island and 580 hours of chick searches

over half of it, indicate that these disturbing findings apply to the little spotted kiwi population of the whole

In spite of these high losses, Atkinson and Daniel rightly point out that as the kiwi is a long-lived bird, few young birds need to be recruited to the adult population each year to prevent it from going into decline. However, it is unsound for them to base their argument on an average adult life expectancy of 20 years. The average life of kiwis is unknown and could just as easily be 10 years. One must argue from the evidence, which indicates that for the whole island (of which only a maximum of one-third appears to produce chicks), only 3 percent of eggs hatch.

For the kiwis to achieve a stable population then, not only would adults have to live 20 years on average, but also 50 percent of all juveniles must survive to breed. Previous studies of birds of many species have found that much higher losses occur at this stage of their life-history.

Atkinson and Daniel also believe that techniques used in our study have caused the high incidence of weka predation. They suggest we have led wekas to the study nests. If this was so, then it is difficult to explain how the eggs in nine of the 32 nests were already broken when we first found the nests. Furthermore, we arrived to find wekas in the act of preying on eggs in five other nests. Nests are visited by us much less frequently than is implied by Atkinson and Daniel because we can detect the presence of the incubating male from some distance by use of radio-telemetry. We have, in fact, never been caught at a nest by a weka and have no evidence that our activity attracts wekas to nests.

Atkinson and Daniel also allege, incorrectly, that the nests we studied are not a representative sample. Radiotelemetry has enabled us to track the kiwis to their nests and to determine whether or not nesting was successful irrespective of the length or conspicuousness of the breeding burrow.

We now know that by no means all egg losses are from that part of the study area with shorter burrows.

Atkinson and Daniel are also incorrect in suggesting that wekas cannot prey on kiwi chicks because the chicks come out of their nests only at night. The chicks are active, often unaccompanied by adults, in daylight at both dawn and dusk. Wekas are known to attack fully-fledged young birds of other species. The chances of actually seeing a weka prey upon a kiwi chick are extremely small - as are the chances of finding fragments of eggshell in weka faeces when, at the most, only one or two kiwi eggs are available to any pair of wekas in an entire year. Neither comment by Atkinson and Daniel gives any insight into the problem.

Atkinson and Daniel conclude by pointing out the undisputed value and attraction of the weka. I agree with their sentiments but they should not overlook the fact that the little spotted kiwi population on Kapiti is of far higher value than the wekas, both scientifically and to the New Zealand public as a whole, as it is the last known population of one of only three kiwi species. It is therefore extraordinary that Atkinson and Daniel should state that "... if kiwis are established satisfactorily on islands free of wekas, ..., any threat posed to the kiwis by wekas on Kapiti Island would become less critical." Any threat to the kiwis on Kapiti will always be critical. As mentioned in my original article, there are only two other islands, Little Barrier and Codfish, where a population anywhere near as large as that on Kapiti could establish.

Whatever our research effort, it may never be possible to prove "... that wekas threatened (sic) the survival of the little spotted kiwis...' — at least not until it is too late. I suggest that the question Atkinson and Daniel should ask themselves is, "How much risk to the endangered kiwi species is acceptable for the sake of the wekas?" This is the crucial question I intended to raise in my article.