But for the radio collar ...

Three of the articles in your January/March 2003 issue [SWARA 26:1] immediately caught my attention. First, the article on what is happening to the cheetahs in the Mara. Second, that Maasai-wildlife interactions may not be quite so benign as we should like to think. And third, that perhaps scientists should balance the concerns of tourists when attaching radio collars to wildebeest and other animals.

As someone who has relied on radio tracking Serengeti lions for nearly 20 years, I should like to share with SWARA readers a few important benefits of radio tracking.

By being able to monitor a great many lion prides in the Serengeti during a mysterious disease epidemic in 1994, we were able to determine the cause of the outbreak (canine distemper), measure its impact (35 % mortality) – *and* alert the Kenya Wildlife Service (KWS) that the disease was likely to reach Kenya soon after the wildebeest migration headed north from Tanzania (the first cases hit the Mara that October).

As a direct result of these efforts, we were subsequently able to finance some large-scale vaccination programmes among domestic dogs around the Serengeti. And we received a substantial grant from the National Science Foundation of the US to measure the effectiveness of this vaccination programme in stemming transmission of infectious disease from domestic dogs into wild carnivores.

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More recently, we learned something through radio tracking that, otherwise, we could never have known. This was after a radio-collared lioness from the Serengeti National Park was speared by Maasai in the Ngorongoro Conservation Area. (We have since sponsored a Tanzanian graduate student to study the causes of lion/pastoralist conflict in the NCA).

The twist to this last case was that the spearing victim lived right in the middle of the Serengeti – as far from human disturbance as a carnivore could be anywhere in the Serengeti /Mara ecosystem. Without the help of radio tracking, we should never have known what happened to her.

I doubt, therefore, that the KWS cheetah project will ever learn as much as it needs to know about that animal's population decline – until it, too, tries using radio telemetry. Better for tourists to see the occasional cheetah with a collar on than to court the risk of a species' extinction!

And, by the way, the radio collars on wildebeest (such as the one pictured in SWARA) have been used to help refine

the boundaries of the Serengeti ecosystem – which have traditionally been defined by the limits of the wildebeest migration. The GPS signal on these collars has shown precisely where the migration leaves the protected areas, and now these spots are under consideration by the Tanzanian government for increased protection status.

How else are you going to figure out where an individual wildebeest goes if you do not use a satellite collar?

The bottom line is that conservation requires reliable, systematic data. Animals range more widely than we suspect, and we cannot sustain their populations without knowing where they go. I am not aware of any radio-tracking study in Tanzania that does not have a direct conservation application.

The Tanzania lion project provides tourists with information as to why we collar the animals – especially since we know that tourists are likely to see such animals in our study area. Wildebeest have been radio-collared by two different research groups over the past five years, and there were never more than six to eight collars in place at any given time.

I suspect that no one made any effort to educate Kenya's tourists about the value of these studies, as it must have seemed almost inconceivable that any tourist would ever see a radio-collared animal. So your article could, instead, have congratulated the photographer for witnessing a one-in-one-hundred-thousand event!

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