

SC55 Doc 10.2: MIKE Baseline Information

The MIKE baseline information is not complete. Therefore, no decision on ivory sales should be taken at SC55. SC55 Doc. 10.2 raises several questions concerning the quality, integrity and usefulness of the baseline data presented, including:

INCLUSION OF ALTERNATE SITES INSTEAD OF AGREED SITES:

No MIKE data have been provided for two of the selected sites in Asia, Gua Musang in Malaysia and Mondulkire in Cambodia (Table 1). This omission is neither mentioned nor explained. Instead, the sites seem to have been replaced by sites in two other countries, Kuibiri in Thailand and Deomali in India. This exchange was not agreed to by the Standing Committee nor the MIKE-ETIS Subgroup. The preliminary MIKE report presented in October 2006 (SC54 Doc. 26.2 Rev.1) makes no mention of a possible replacement and states instead that population survey results for the selected sites were expected by late 2006 - early 2007. The original MIKE proposal (Doc. SC41.6.3 Annex) states "*it should be noted that taking one of these alternative sites may disturb the overall balance of the sample*" (emphasis added). The new sites are not appropriate substitutes. Their last-minute substitution without approval of the Standing Committee or the Subgroup is unacceptable. Data have been provided for only 16 out of the 18 required sites in Asia. **SSN therefore concludes that the agreed baseline has not been completed.**

Though the preliminary MIKE report stated that "*civil strife has prevented any data being collected*" for **6 African sites**, the current report, published only 7 months later, states that data are now available for all 6 sites. It is not clear how the 12 months of carcass and law enforcement data said to be available for two of these sites (Garamba and Kahuzi Biega in DR Congo) could have been collected since the last Standing Committee meeting. For the other four sites, data have now been inferred from "*ETIS proxy data*". However, no explanation is provided on how site-specific carcass data, required over a minimum of 12 months, have been replaced by country-specific ETIS data on seizures of illegal ivory, or on how the level of illegal killing has been calculated. The 51 sites presented for Africa also include one alternate site for which no data had been presented in the preliminary report (Park W in Benin).

Moreover, data said to have been collected (Table 3.1.1) are not reported for eight sites in Africa with respect to presentation of carcass counts and man hours spent (Table 3.4.1). No data at all are reported for three sites (Caprivi (Namibia), Cahora Bassa (Mozambique), Gash Setit (Eritrea)). Data are lacking for other sites for years in which data collection is said to have occurred: Chobe (Botswana)(2000), Chewore (Zimbabwe)(2002-3), Nyami Nyami (Zimbabwe)(2003), South Luangwa (Zambia)(2000-1), and Samburu (Kenya)(2004-5). It is unclear, therefore, how the baseline has been completed for these sites.

BIASED SELECTION OF MIKE SITES:

The MIKE results cannot be considered representative for elephants throughout their range: The selection of MIKE sites is **strongly biased towards protected areas.** In Africa, 84% of elephant range lies outside of protected areas, thus most elephants exist in places where poaching is more likely. The MIKE report to CoP13 states with regard to central Africa: "*...in two of the three MIKE sites in which inventories were conducted both inside and outside national parks elephant abundance was several times higher within the national park boundary than beyond. Both the interpolation maps...and table...highlight clearly the consistent, and in some cases enormous differences in signs of illegal killing of elephants and human pressure from hunting camps inside national park boundaries compared to the areas surveyed outside their borders where the legal*

basis for protection is less stringent, and conservation efforts may be reduced. In conclusion, the MIKE sites represent a relatively small sample of the population of forest elephants of central Africa. The sites are biased towards well-known and important national and international elephant populations, all of which are based in and around National Parks and protected areas” (CoP13 Doc. 29.3 Annex 9). According to Blake and Hedges (2004) an increase in elephant density within a protected area may represent not an increase in population size but elephants seeking refuge from higher hunting pressures outside.

QUESTIONABLE DATA QUALITY:

The data presented in the MIKE report originate from different time periods, covering between 6 and 73 months between January 2000 and December 2006 (Table A3.1.1). There is large variation in the number of man-hours spent on patrols in each site (between 28 and more than 240.000 hours spent in one site in one year) (Table 3.4.1). This means the significance of data collected is highly variable and may be questionable for sites with few man-hours spent. Man-hours spent on patrols have dropped for some sites, in Namibia, Zimbabwe, South Africa and Zambia and for all sites in South Asia where data are available for more than one year.

For 18 sites in Africa data coverage is only up to 2004 at the latest, with data from three of these sites (two in Zimbabwe, one in Zambia) only up to 2003 or possibly 2002 (Table A3.1.1 and Table A.3.4.1). The data from Namibia only goes up to June 2004. The data are up to 2006 for only 9 countries. This means that the data cannot provide a picture of the present situation. The baseline may have changed, particularly considering the large seizures, indicating increased poaching, made since CoP13.

For 29 African and four Asian sites the population surveys presented were conducted over three years ago (Table A3.2.2). This would have disqualified them from the baseline data before SC53 agreed to a “*clarification*” - proposed by the MIKE CCU – that population surveys dating back to 2000 could be used. Some surveys now date back seven years. Also, population surveys and counting of carcasses did not occur at the same time – with up to five years elapsing between the two events.

Population estimates have been collected by 8 different methods (aerial sample count, aerial total count, line transect dung count, individual recognition, ground total count, genetic dung count, ground sample count and informed estimate). **Thus data from different sites are not equivalent and cannot be properly compared.**

The total number of carcasses counted by MIKE over nearly 7 years in Africa is 2,779 and over 3 years in Asia is 124 (bearing in mind that sites began data delivery in different years). The SSN seizure database records 47,225.92kg of ivory has been seized since CoP13. Using an average tusk size of 3.68kg (Hunter et al, 2004) and 1.8 tusks per elephant, seized ivory alone over less than 2 years equates to 7,129 dead elephants. The MIKE process, despite significant levels of investment in terms of both time and money, may therefore not be portraying a true picture of the levels of illegal killing of elephants.

In the data analysis, up to **six different scores of 29 subjective “influencing factors”** are attributed to each site. It is not comprehensible from the document how variables have been applied and data processed; the data, as presented, are almost impossible to interpret. The process lacks objectivity. CITES decisions (Variable 30) have been omitted as an influencing factor as no data were said to be “*currently available*”. The Secretariat states that it would be “*cumbersome*” to include a descriptive report on influencing factors for each site. Given the potential effects of accepting these data, ignoring such an important consideration is not justifiable. The Parties must be given all available data upon which to make their decisions.

Although the MIKE report hypothesizes that an increase or decrease in illegal killing can be ascribed to certain causal factors, the Standing Committee should take a precautionary approach, noting the general acknowledgement that **a causal link between CITES decisions and illegal activity cannot be proven.**

ANALYSIS IS BASED ON QUESTIONABLE HYPOTHESES:

The assumptions on which the analysis is based on are debatable. The report does not explain how “*levels of illegal killing*” have been calculated, or how alleged effects of influencing factors have been “*adjusted for*” and “*noise smoothed out*”. SSN questions the report’s key assumptions that site attributes remain constant over time, the probability of detection of a carcass remains constant within a site, and it is always possible to tell if a carcass results from illegal killing or other mortality. Even using these assumptions, the report acknowledges that the levels of illegal killing are “*subject to considerable uncertainty*”, a conclusion borne out by the wide confidence limits for most sites (Table A3.6.1).

LACK OF OVERSIGHT BY THE SUBGROUP AND TAG:

Neither the MIKE-ETIS Subgroup (which is tasked with overseeing, on behalf of the Standing Committee, further development, refinement and implementation of MIKE) nor the TAG (Technical Advisory Group) nor the range States involved were consulted on the current baseline report before its publication, despite serious concerns already having been raised about the lack of consultation at SC 54.

CONCLUSION:

The MIKE report stresses that considerable uncertainty remains at present and that the analysis will benefit from more data in the future. The current report already differs from the preliminary report presented to SC54 only 8 months ago (October 2006) because new data have become available in the meantime.

As no data have been reported for a number of the originally-selected sites, and as the data provided is of low quality, the MIKE baseline remains far from complete.

MIKE may, over time and subject to long-term funding security, provide a useful analysis of illegal killing of elephants in both Africa and Asia. However, acceptance of the MIKE data as presented, or the MIKE process as it stands, would be, in the view of SSN, premature and risky. Therefore, MIKE should now be fully evaluated, restructured in the light of experience and presented again to CITES Parties for consideration, and if appropriate, support.