

Does the Vulnerable sun bear *Helarctos malayanus* damage crops and threaten people in oil palm plantations?

ROSHAN GUHARAJAN, NICOLA K. ABRAM, MOHD AZZUMAR MAGGUNA, BENOÎT GOOSSENS
SIEW TE WONG, SENTHILVEL K. S. S. NATHAN and DAVID L. GARSHELIS

TABLE S1 Mean destructiveness of mammal species ranked by respondents (n = 104) from oil palm plantations in the lower Kinabatangan, Sabah, Malaysian Borneo (Fig. 1), with the total number of records and the number of records in which respondents were able to rank the species.

| Species | Mean \pm SD destructiveness rank ¹ | Total no. of records | No. of ranked records ² |
|---|--|-------------------------|--|
| Muntjac <i>Muntiacus</i> spp. | 0.00 \pm 0.00 | 2 | 2 |
| Civet <i>Viverra zangalunga</i> , <i>Paradoxurus hermaphroditus</i> | 0.25 \pm 0.50 | 4 | 4 |
| Sun bear <i>Helarctos malayanus</i> | 0.33 \pm 0.58 | 5 | 3 |
| Bornean orang-utan <i>Pongo pygmaeus</i> | 0.40 \pm 0.51 | 16 | 15 |
| Macaque <i>Macaca</i> spp. | 0.60 \pm 0.49 | 117 | 105 |
| Bearded pig <i>Sus barbatus</i> | 0.68 \pm 0.47 | 73 | 63 |
| Porcupine <i>Hystrix</i> spp. | 0.71 \pm 0.47 | 20 | 17 |
| Bornean elephant <i>Elephas maximus borneensis</i> | 0.80 \pm 0.41 | 55 | 44 |

¹Ranks: 0, not destructive; 1, destructive.

²This number was used in the calculation of the mean destructiveness rank.

SUPPLEMENTARY MATERIAL 1 Questionnaire used to interview oil palm plantation workers and farmers in the lower Kinabatangan floodplain region, Sabah, Malaysian Borneo (Fig. 1).

Oil Palm Plantation Farmer/Worker Interview Sheet

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| Oil Palm Plantation Farmer/Worker Interview Sheet | | | | | |
| Plantation information | | | | | |
| Owner | | | | | |
| Size | | | | | |
| Location | | | | | |
| Palm ages | | | | | |
| Condition (Sparse/Dense understory) | | | | | |
| Respondent information | | | | | |
| Age | | | | | |
| Ethnicity | | | | | |
| Religion | | | | | |
| Occupation | | | | | |
| Time working in plantation | < 1 year 1–5 years 6–10 years > 10 years | | | | |
| Time in Sabah | < 1 year 1–5 years 6–10 years > 10 years | | | | |
| Species | 0 = Rare 1 = Common 2 = Very common | 0 = Morning 1 = Noon 2 = Evening 3 = Night | 0 = Within planted area 1 = Plantation–forest border | Encountered during specific weather season? 0 = Unsure 1 = No 2 = Rain 3 = Dry | Encountered during forest fruiting season? 0 = Unsure 1 = No 2 = Yes (which month?) |
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| Species (Feeding) | 0 = Palm fruits 1 = Palm shoots 2 = Other crops (record in notes) | If fruits, 0 = Loose fruits 1 = Fruit bunches 2 = Fruits on palm | How do you know? 0 = Seen 1 = Sign 2 = Heard from others | 0 = Not destructive 1 = Destructive | Notes |
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| Species (Feared) | Attacked/threatened people? 0 = No 1 = Yes | No of times? 0 = 3 or fewer 1 = 4 or more | How dangerous? 0 = Least 1 = Dangerous 2 = Extremely | Reaction? 0 = None/Retreat 1 = Chase away 2 = Catch/trap 3 = Kill | Notes |
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| Sun bear-focused questions | | | | | |
| Encountered in this plantation? 0 = No 1 = Yes | If yes, 0 = Seen personally 1 = Heard from someone | How often? 0 = Rare 1 = Common 2 = Very common | What was the bear doing? | Encountered during specific weather season? 0 = Unsure 1 = No 2 = Rain 3 = Dry | Encountered during forest fruiting season? 0 = Unsure 1 = No 2 = Yes (which |

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|--|---|---|---|--|--|
| | | | | | month?) |
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| Distance from forest? 0 = In forest/forest edge 1 = < 2 km 2 = ≥ 3 km | Feeds on oil palm fruit? 0 = No 1 = Yes | 0 = Loose fruits 1 = Fruit bunches 2 = Fruits on palm | How do you know? 0 = Seen 1 = Found sign 2 = Heard from others | Destructive? 0 = No 1 = Yes | Reaction? 0 = None 1 = Retreat 2 = Chase away |
| | | | | | |
| Attacked/threatened people? 0 = No 1 = Yes | Are bears hunted/killed in oil palm plantations? 0 = No 1 = Yes | How do you know? 0 = Seen 1 = Found evidence 2 = Heard from others | Is bear hunting targeted (1) or opportunistic (2)? | Hunted for specific body parts (1, record parts in notes), to protect crops (2), or in self-defense (3)? | What happens to the body parts? 0 = Subsistence 1 = Sold (record information in notes) |
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| Notes | | | | | |
| What is your opinion on bears? | | | | | |

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| Should people be given the chance to hunt/keep wildlife? 0 = No, 1 = Yes | | Which species? | |
| Should wildlife be protected? 0 = No, 1 = Yes | | Which species? | |