

TABLE A1. Profiles of the seven protected areas on Hainan in which LEK survey work was carried out. Details from Kadoorie Farm & Botanic Garden (2001-2003).

Nature Reserve	Classification	Approximate GPS coordinates	Size (km ²)	Elevation (m)
Bawangling	National	N18°56'—19°15' E109°16'—109°25'	67	300–1510
Diaoluoshan	National	N18°39'—18°48' E109°43'—109°57'	380	50–1499
Jianfengling	National	N18°37'—18°47' E108°45'—108°56'	78	100–1412
Jiayi	Provincial	N18°50'—18°56' E109°05'—109°14'	86	400–1654
Limushan	Provincial	N19°06'—19°20' E109°38'—109°49'	75	up to 1412
Wuzhishan	National	N18°49'—18°58' E109°39'—109°47'	134	250–1864
Yinggeling	National	N18°57'—19°08' E109°15'—109°34'	504	up to 1550

TABLE A2. The minimum adequate model that explains factors which affect the likelihood of recognizing a pangolin from a photograph shown to respondents across seven reserves on Hainan, with AIC. Fixed effects include reserve, respondent age and gender, and random effects include village community and interviewer.

Model	Lowest AIC
glmer (recognize.pangolin ~ Reserve + Age + Sex + (1 Community) + (1 Interviewer), family=binomial)	433.0

TABLE A3. Results of the minimally adequate model for the effects of reserve, respondent age and gender on the likelihood of recognizing a pangolin from a photograph shown to respondents. Effect size values show how coefficients differ from the intercept of nature reserve (Bawangling) and gender (female).

Coefficient	Effect Size	Standard Error	z	p
Intercept	-0.335	0.529	-0.634	0.526
Reserve (Jiayi)	-0.206	0.431	-0.479	0.632
Reserve (Yinggeling)	2.313	0.799	2.894	0.004**
Reserve (Diaoluoshan)	0.795	0.550	1.444	0.149
Reserve (Jianfengling)	0.025	0.453	0.055	0.956
Reserve (Limushan)	0.960	0.582	1.650	0.099.
Reserve (Wuzhishan)	0.418	0.518	0.807	0.420
Age	0.025	0.009	2.876	0.004**
Gender (male)	1.333	0.298	4.475	<0.0001***

TABLE A4. The minimum adequate model that explains factors which affect the likelihood of ever having seen a pangolin across seven reserves in Hainan, with AIC. Fixed effects include reserve, respondent age and gender, and random effects include village community and interviewer.

Model	Lowest AIC
<code>glmer(seen.pangolin ~ Reserve+Age+Sex+(1 Community) + (1 Interviewer), family=binomial)</code>	624.9

TABLE A5. Results of the minimally adequate model for the effects of reserve, respondent age and gender on the likelihood of ever having seen a pangolin. Effect size values show how coefficients differ from the intercept of nature reserve (Bawangling) and gender (female).

Coefficient	Effect Size	Standard Error	z	p
Intercept	-1.840	0.483	-3.811	0.0001***
Reserve (Jiaxi)	-0.223	0.404	-0.552	0.581
Reserve (Yinggeling)	1.145	0.468	2.446	0.014*
Reserve (Diaoluoshan)	1.129	0.490	2.305	0.021*
Reserve (Jianfengling)	0.227	0.421	0.540	0.589
Reserve (Limushan)	0.327	0.430	1.760	0.447
Reserve (Wuzhishan)	0.467	0.447	1.044	0.297
Age	0.047	0.008	6.014	<0.0001***
Gender (male)	1.034	0.261	3.962	<0.0001***

TABLE A6. The minimum adequate model that explains factors which affect last-sighting reports of pangolins across seven reserves in Hainan. Dependent variables include reserve and year (2010-2014). The model with lowest AIC is selected. Residual deviance is not greater than degrees of freedom, so there is no overdispersion.

Model	AIC	Residual deviance	Degrees of freedom
glm(Pangolin.Count~ Reserve +Year, family=poisson)	97.6	27.7	27
glm(Pangolin.Count~ Reserve, family=poisson)	96.0	28.1	28

TABLE A7. Results of the minimally adequate model for the effects of reserve on total number of pangolin last-sighting reports per year (2010-2014). Effect size values show how coefficients differ from the intercept of nature reserve (Bawangling).

Coefficient	Effect Size	Standard Error	z	p
Intercept	-1.609	1.000	-1.609	0.108
Reserve (Jiaxi)	2.398	1.044	2.296	0.022*
Reserve (Yinggeling)	6.931x10 ⁻⁰¹	1.225	0.566	0.571
Reserve (Diaoluoshan)	2.398	1.044	2.296	0.022*
Reserve (Jianfengling)	2.708	1.033	2.622	0.009**
Reserve (Limushan)	4.710x10 ⁻¹⁶	1.414	0.000	1.000
Reserve (Wuzhishan)	1.609	1.095	1.469	0.142

TABLE A8. The minimum adequate model that explains factors which affect reported abundances of pangolins across seven reserves in Hainan, with AIC. Fixed effects include reserve and respondent gender, and random effects include village community and interviewer.

Model	Lowest AIC
model<-glmer(None.Or.Rare~Reserve+Sex+(1 Community) + (1 Interviewer), family=binomial)	681.6

TABLE A9. Results of the minimally adequate model for the effects of reserve and respondent gender on reported abundance of pangolins. Effect size values show how coefficients differ from the intercept of nature reserve (Bawangling) and gender (female).

Coefficient	Effect Size	Standard Error	z	p
Intercept	-0.812	0.547	-1.485	0.137
Reserve (Jiaxi)	0.082	0.467	0.174	0.862
Reserve (Yinggeling)	-1.969	0.536	-3.673	0.0002***
Reserve (Diaoluoshan)	0.767	0.668	1.148	0.251
Reserve (Jianfengling)	1.082	0.671	1.613	0.107
Reserve (Limushan)	-1.864	0.725	-2.570	0.010*
Reserve (Wuzhishan)	-0.844	0.683	-1.235	0.217
Gender (male)	0.417	0.291	1.435	0.151

TABLE A10. Cultural information about pangolins collected across seven reserves in Hainan.

Cultural Information	Frequency of Report
Pangolin skin can be used as leather	55
Unlucky to see pangolin during the day (e.g. you might then die or get sick; someone died after they touched a pangolin; a child was born with scales because someone saw a pangolin during the day; someone saw a pangolin during the day and then died at home two months later; grandmother told me they are unlucky to see during the daytime)	24
If you see a pangolin during the day you must go back to the village to worship and engage in ritual activities (e.g. kill the pangolin, slaughter cattle or offer wine to the ancestors)	11
Scales are evil spirits	5
Pangolins ward off evil and scales are lucky (e.g. lots of children hang a scale around their neck)	5
Pangolins are known as gaomixin (高迷信), highly superstitious beliefs about pangolins	2
Valuable phosphorus in pangolins	2
Pangolins locally named “dirty tricks”, i.e. they cause trouble	1
You must visit graves to protect the coffins and ward off evil pangolins	1

TABLE A11. Reported medicinal uses of pangolins reported by respondents across seven reserves in Hainan.

Pangolin Part	Reported Medicinal Use	Frequency of Report
Scales	Medically valuable but don't know use	12
Scales	Increase lactation	3
Scales	Help a sore throat	2
Pangolin blood mixed with rice then dried	Children with urticaria	1
Whole pangolin	Medically valuable but don't know use	1
Skin	Drugs	1

TABLE A12. The minimum adequate model that explains factors which affect the likelihood of reported hunting of pangolins across seven reserves in Hainan, with AIC. Fixed effects include reserve and respondent age, and random effects include interviewer.

Model	Lowest AIC
glmer(hunt.pangolin~Reserve+Age + (1 Interviewer), family=binomial)	556.1

TABLE A13. Results of the minimally adequate model for the effects of nature reserve and respondent age on the likelihood of reported hunting of pangolins. Effect size values show how coefficients differ from the intercept of nature reserve (Bawangling).

Coefficient	Effect Size	Standard Error	z	p
Intercept	0.466	0.830	0.561	0.574
Reserve (Jiaxi)	1.220	0.450	2.711	0.007**
Reserve (Yinggeling)	4.115	1.048	3.929	<0.0001***
Reserve (Diaoluoshan)	-1.982	0.916	-2.164	0.030*
Reserve (Jianfengling)	-0.775	0.921	-0.841	0.400
Reserve (Limushan)	-3.157	0.931	-3.392	0.007**
Reserve (Wuzhishan)	-2.537	0.929	-2.729	0.006**
Age	0.018	0.008	2.306	0.021*