Table 1 Relative variance types used in the different studies

Impact category	Quantification	Measure	Frequency of use
Ecological/ Environmental (n = 95)	area (ha)	Actual area infested or damaged	3
		Potential area infested or damaged	2
	% or proportion	Proportion infested or damaged (of specified area)	8
		Proportion killed (of specified area)	4
		Within-tree proportion damaged (e.g., defoliation)	3
		Potential area within trees infested or damaged	1
		Potential proportion of canopy loss	1
		Changes in tree health conditions	1
		Changes in plant physiology (e.g., evapotranspiration)	1
		Changes in plant mechanical features (e.g., tensile response)	3
		Changes in soil properties (e.g., C and N levels)	1
	counts	Actual number of trees infested or damaged	1
		Potential number of trees infested or damaged	1
		Actual number of trees killed	4
		Potential number of trees killed	4
		Actual number of specific damage (e.g., exit holes)	2
		Actual number of associated species abundance or presence (e.g., larvae)	2
		Rise (fall) in associated species abundance or presence (e.g., birds)	1
	metrics	Size of damage (e.g. leaf damage)	3
		Loss of carbon sequestration (e.g., tones)	1
	risk ratios	Specific damage categories (e.g., of bark or ecosystem services loss)	2
Social / Cultural (n = 35)	%	Proportion of respondees affected (e.g., allergies)	3
		Potential proportion of respondees affected	1
	counts	Actual numbers of respondees affected	2
		Potential numbers of respondees affected	1
		Rise (fall) in specific crime	1
		Rise (fall) in specific sounds	1
	risk ratios	Specific health outcomes (e.g., rashes)	1
	$	Health costs	1
		Loss of landscape value	1
Economic (n = 24)	$ (total, per area, per tree, per hour)	Pest management costs	1
		Survey costs	1
		Estimated suppression costs (purchase & pesticide application)	3
		Removal and replacement costs	9
		Potential removal and replacement costs	1
		Support and overhead	1
		Potential loss of value (from removal/mortality)	2
		Estimated economic costs	1
		Loss of property value	2
		Loss of air pollution removal	1
		Actual human health treatment costs	1