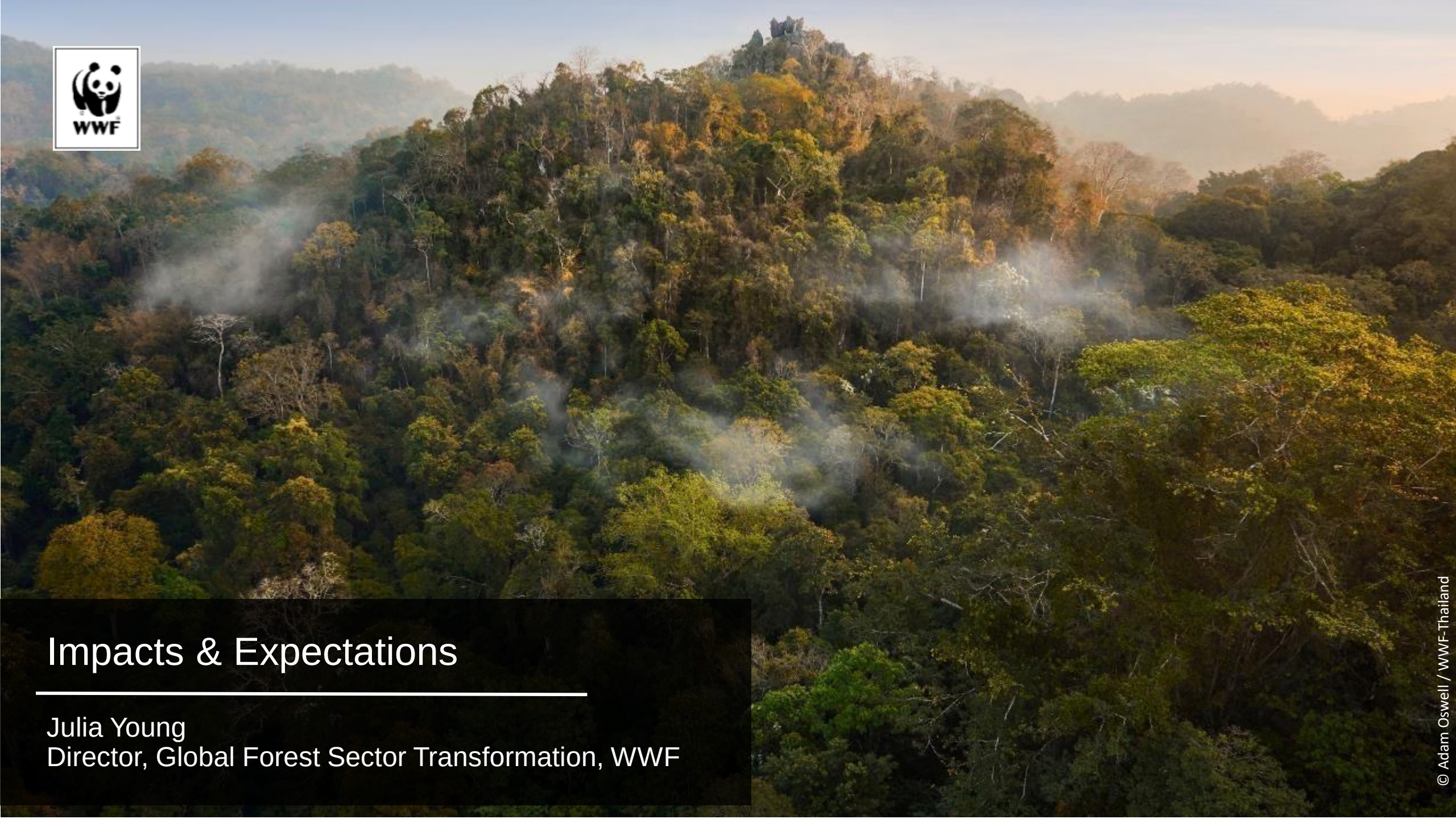


Impacts & Expectations

Julia Young
Director, Global Forest Sector Transformation, WWF

Nature is at a Tipping Poi

1°C

Temperature increase since pre-industrial times… most ecosystems will struggle at 2°C warming

75%

Terrestrial habitats altered by humans
Plus 60% of oceans

60%

Overall decline in vertebrate population sizes (i.e., mammals, mammals, birds, reptiles, amphibians and fish) between 1970 and 2014

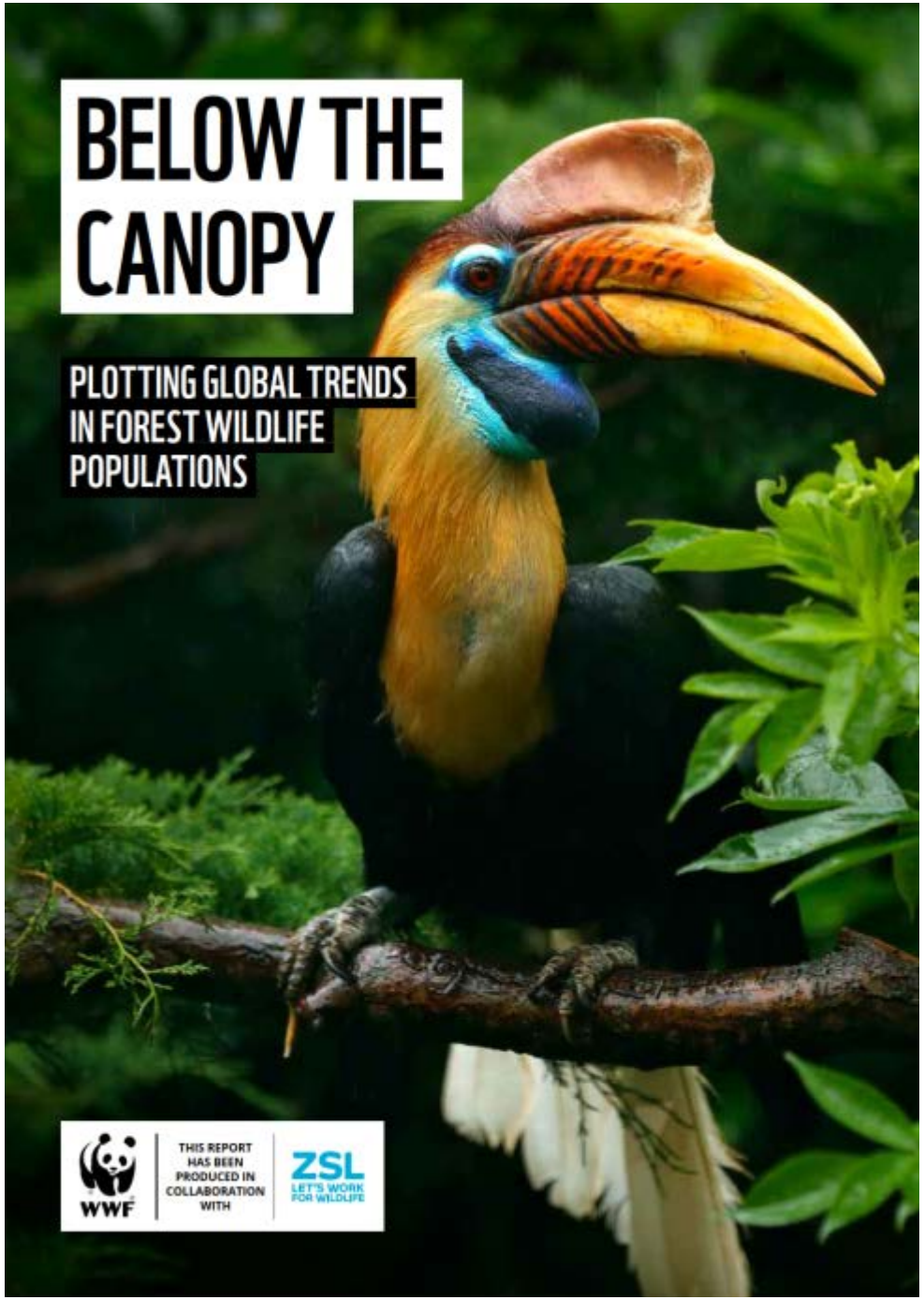
1. When Earth loses 75%+ of species in geologically short interval
Source: WWF Living Planet Report 2018, IPCC report, Barnosky, A. D. et al. "Has the Earth's sixth mass extinction already arrived?"

Problem

- Global targets and indicators on forests focused on area gained/lost
- Evidence suggests rise of “empty forests”
- Risk of misleading outcomes and unseen degradation of biodiversity
- Lack of global data and indicator on forest biodiversity

Objectives

- Produce first global appraisal of forest biodiversity trends
- Develop global indicator on forest biodiversity
- Is forest cover a good proxy for forest biodiversity?



Higher integrity means higher environmental values

Resilience - to pressures from e.g. climate shocks, fire and invasive species

Biodiversity - keeping species off the Red Lists in healthy populations

Human health - e.g. avoiding disease outbreaks and haze from fires

Indigenous cultures - homelands for vulnerable peoples

Watershed protection - clean, predictable water flows

Carbon stocks and sinks - vast stores and active carbon uptake

Regional climate protection - e.g. large-scale rainfall patterns

Aesthetic, spiritual & recreational values - sacred places, tourism

Anchoring ecological & evolutionary processes - space to migrate and adapt

Why does this matter for climate change?

- Some localised studies into the effects of defaunation on forest regeneration and carbon.
- Variation in results.
- Meta-analysis to tell global story.
- 43 papers, covering 41 landscapes in 27 countries.

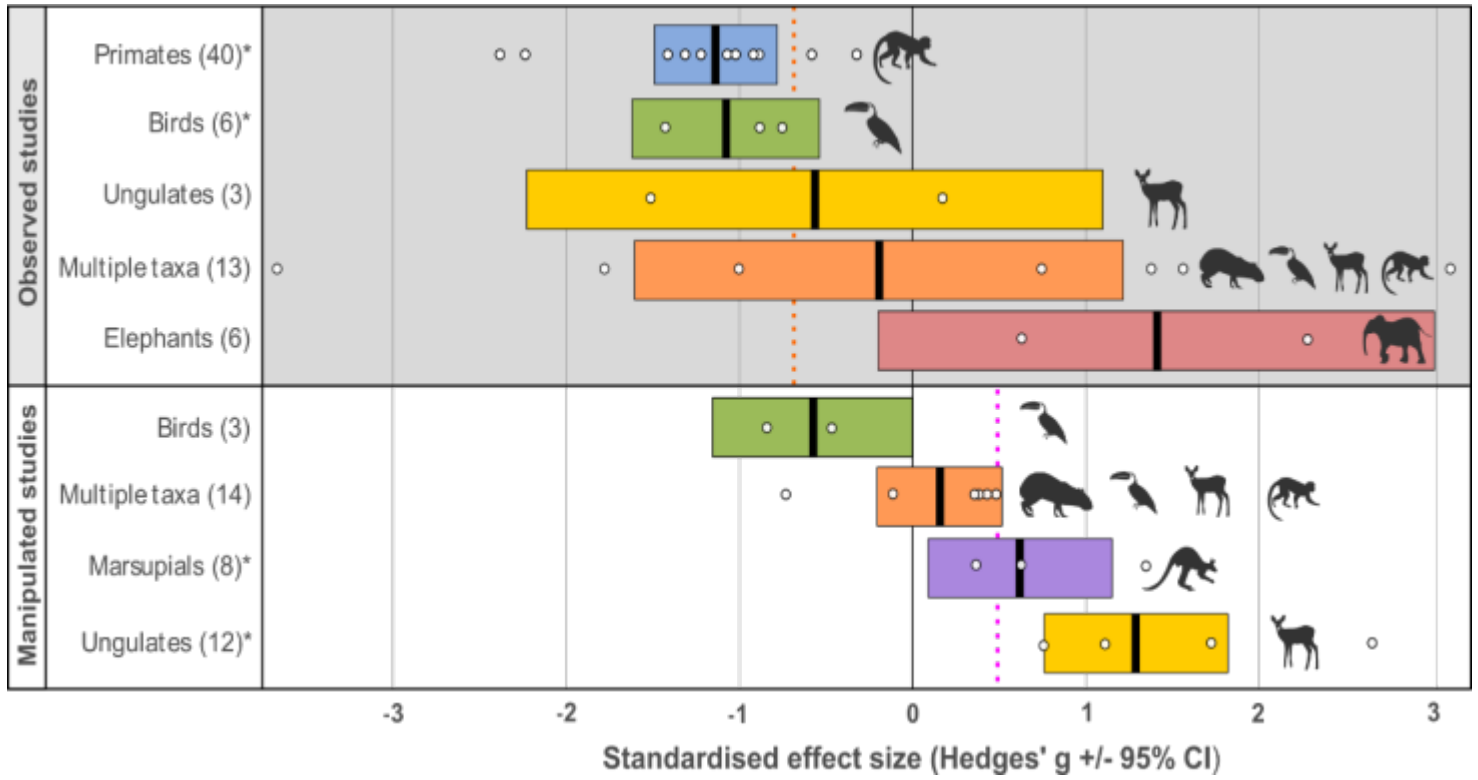


Figure: Effect sizes of defaunation on forest regeneration by taxonomic group category.

Loss of **primates and birds** cause the greatest declines in forest regeneration, emphasising their key role in maintaining carbon stores.

Gardner at al., 2019, Quantifying the impacts of defaunation on natural forest regeneration worldwide, forthcoming in Nature Communications

Where WWF seeks solutions

Degradation can be reversed and **resilience** can be built through effective **protection** and **improved management**.

Deforestation between now and 2030 is not inevitable, nor is it necessary. **Better land-use planning** can halt deforestation without undermining the local and global economy or supplies of food, energy and wood products.

Restoration at scale can be achieved by working with governments, the finance sector, forest-dependent communities and companies, bringing back habitats, ecosystems and functions (**carbon, water, biodiversity**), and contributing to socio-economic development.


Landscape Approaches


REDD+


Responsible Forest Management


Responsible Purchasing


Forest-friendly Infrastructure


Protected & conserved areas and indigenous reserves


Well Managed Plantations


Diet Shift


Tenure Reform


Valuing Ecosystem Services


Reuse and Recycling


Investment in Locally Controlled Forestry

Our vision: A world enriched by extensive, resilient forest landscapes benefiting biodiversity, people and climate

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DEMONSTRATING IMPACT & VALUE FROM FOREST CERTIFICATION UNDER PEFC

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