Walking in England’s New Forest in 1892, butterfly collector S. G. Castle Russell encountered such numbers of the insects that they “were so thick that I could hardly see ahead”. On another occasion, he “captured a hundred purple hairstreaks” with two sweeps of his net.

Patrick Barkham, who recounts these riots of nature in his 2010 book on butterflies, laments never seeing such a sight. However, new research suggests Barkham is a rarity, because a lot of people are forgetting, or just don’t appreciate, how much wildlife there was.

To gauge this effect, Lizzie Jones at Royal Holloway, University of London, compared population records dating back to 1966 of 10 UK bird species against public perceptions of those birds. More than 900 people told her how abundant they thought the species – including declining ones such as house sparrows – were today and when they were aged 18.

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Although, of course, younger people were 18 more recently than older participants, they were generally worse at describing how many more birds there were at this age. “You’d expect younger people would be better,” says Jones, who on Friday is presenting her work at the British Ecological Society conference in Belfast, UK.
The problem of forgetting past natural abundance, or of new generations not knowing about it, is known as shifting baseline syndrome, an idea coined in 1995 by Daniel Pauly at the University of British Columbia in Canada, but which is only slowly being backed up with evidence. Photos of fishermen in Florida, who, over generations, pose equally proudly with ever-shrinking catches, famously illustrate the concept.

Jones says her work is the most conclusive empirical evidence of shifting baseline syndrome so far. The biggest problem, she says, is that current generations are likely to view what they see around them as completely normal.

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Naturalist Chris Packham describes the syndrome as a curse for conservation. “We all think the world was perfect when we first encountered it, i.e. when we were young.” He recalls turtle doves nesting in the grounds of his Hampshire school in 1970, a species that has long since vanished from the county. But he says good records are important so that we aren’t reliant on such subjective anecdotes.

For Jones, tackling the syndrome is simple: get older generations to describe how things were. “All we need to do is get grandparents to talk to grandchildren about environmental things,” she says.

The alternative is people losing connections to wildlife and the will to care about stopping its loss, she says. “If we don’t learn about nature from an early age, and we don’t go and experience it and recognise species, then [our collective amnesia] could just get worse and worse.”

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