

## THE PROPOSITION

For PhD candidates, their thesis propositions are an opportunity to publicly express their professional and personal convictions about science and society. In this feature they explain their most thought-provoking proposition. This time, a proposition from Jasper Lamers who received his PhD in Plant Physiology on 13 January.



# ‘Good birders make good scientists’

‘While I was doing my PhD research, I went out birdwatching every weekend, preferably on both Saturday and Sunday. During the week, I set an alarm so I could go out into the water meadows before work. For me, being good at birding comes down to being able to identify something special. That is not just a matter of chance. There are four traits that birders have which come in handy in science too. Firstly, you need to have a good memory: good birders know all the bird calls by heart.

Secondly, you need perseverance. You have to go out looking a lot, and you often won’t see anything. Sometimes you will, in which case you are lucky. You also need to recognize patterns, which is the third essential skill. You have to know where to look and what species to expect in a particular habitat. And if there are

10,000 birds there, you have to be able to pick out the one anomalous one. Finally, you have to document your observations well, because if you find something rare, you’ll want to be able to prove it.

I myself identified a bird that’s rare in the region: the Eurasian wryneck, a well-camouflaged woodpecker. I was out looking for another species, a black redstart. Suddenly there was the wryneck in a tree. It was sheer coincidence.

For my research, I made large datasets of the salt stress responses of plants, in order to identify sodium-specific responses. It helped that I was good at remembering the names of genes: I could quickly connect the genes with the literature and find out which process they were involved in. That could come from my birding, or vice versa. It’s a chicken-or-egg situation.’ ss