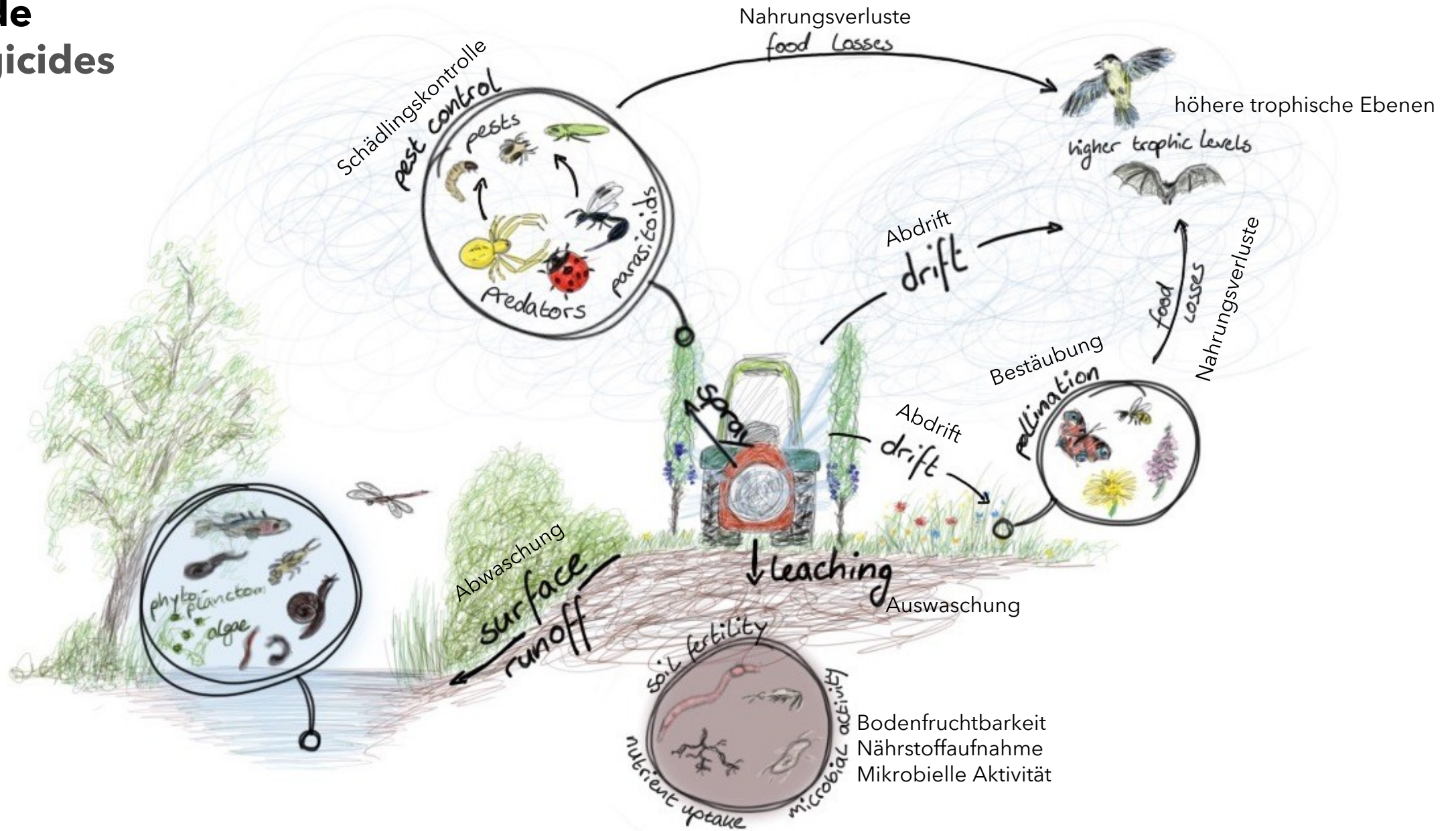


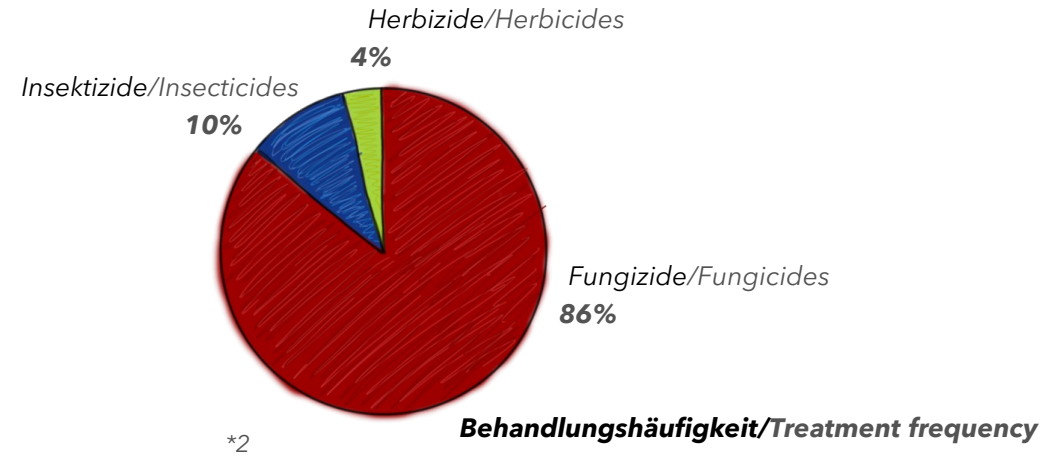
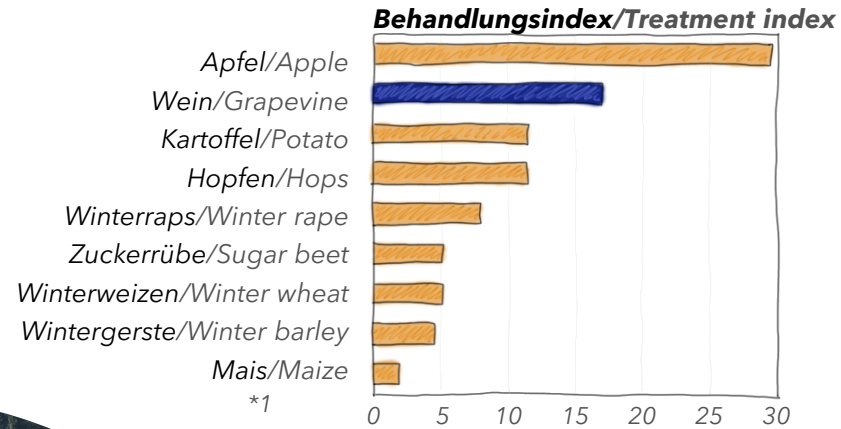
Weniger Fungizide = mehr Nützlinge?
Less fungicides = more beneficial arthropods?

Jo Marie Reiff, Sebastian Kolb, Christoph Hoffmann, Kai Riess, Martin H. Entling

Fungizide Fungicides



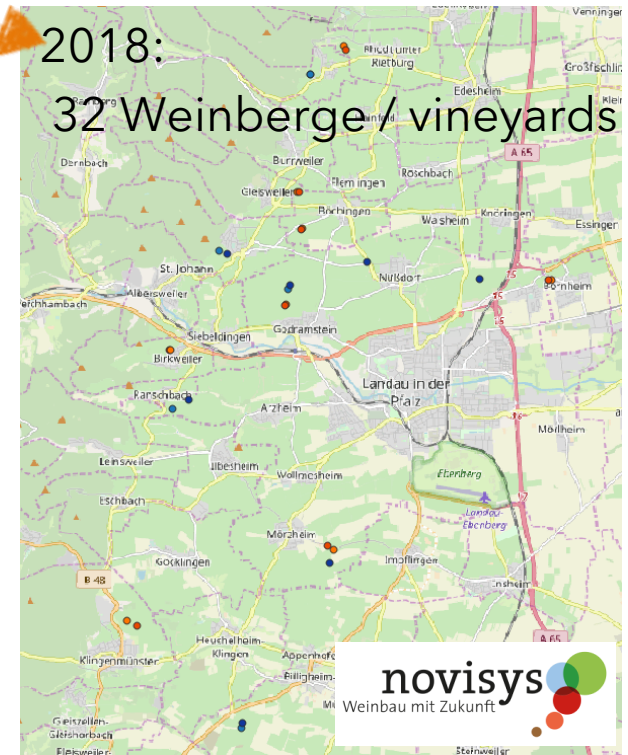
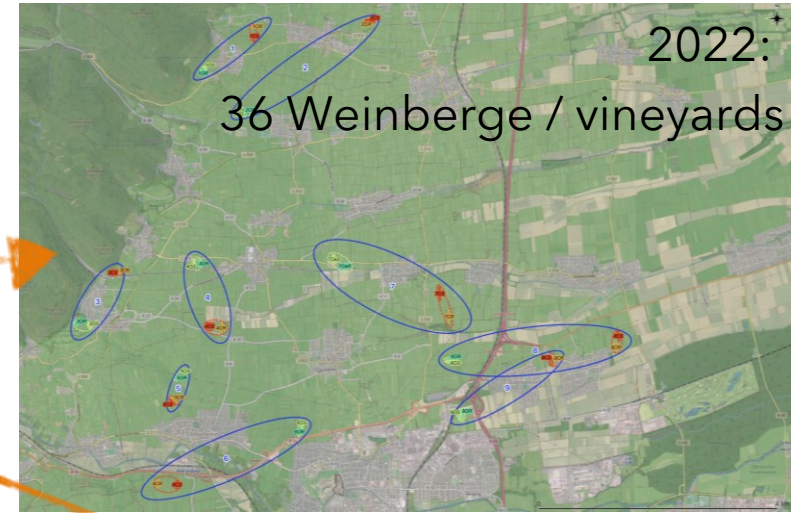
Fungizide Fungicides



➤ **Pilzwiderstandsfähige Rebsorten**
Fungus resistant grape varieties

1 JKI (2024), <https://papa.julius-kuehn.de/index.php?menuid=43>
2 Roßberg & Ipach (2015), [doi:10.5073/JFK.2015.12.03](https://doi.org/10.5073/JFK.2015.12.03)

Versuchsdesign Study design



häufig **ökologisch**, häufig **konventionell**
bewirtschaftet

half under **organic**, half under
conventional management

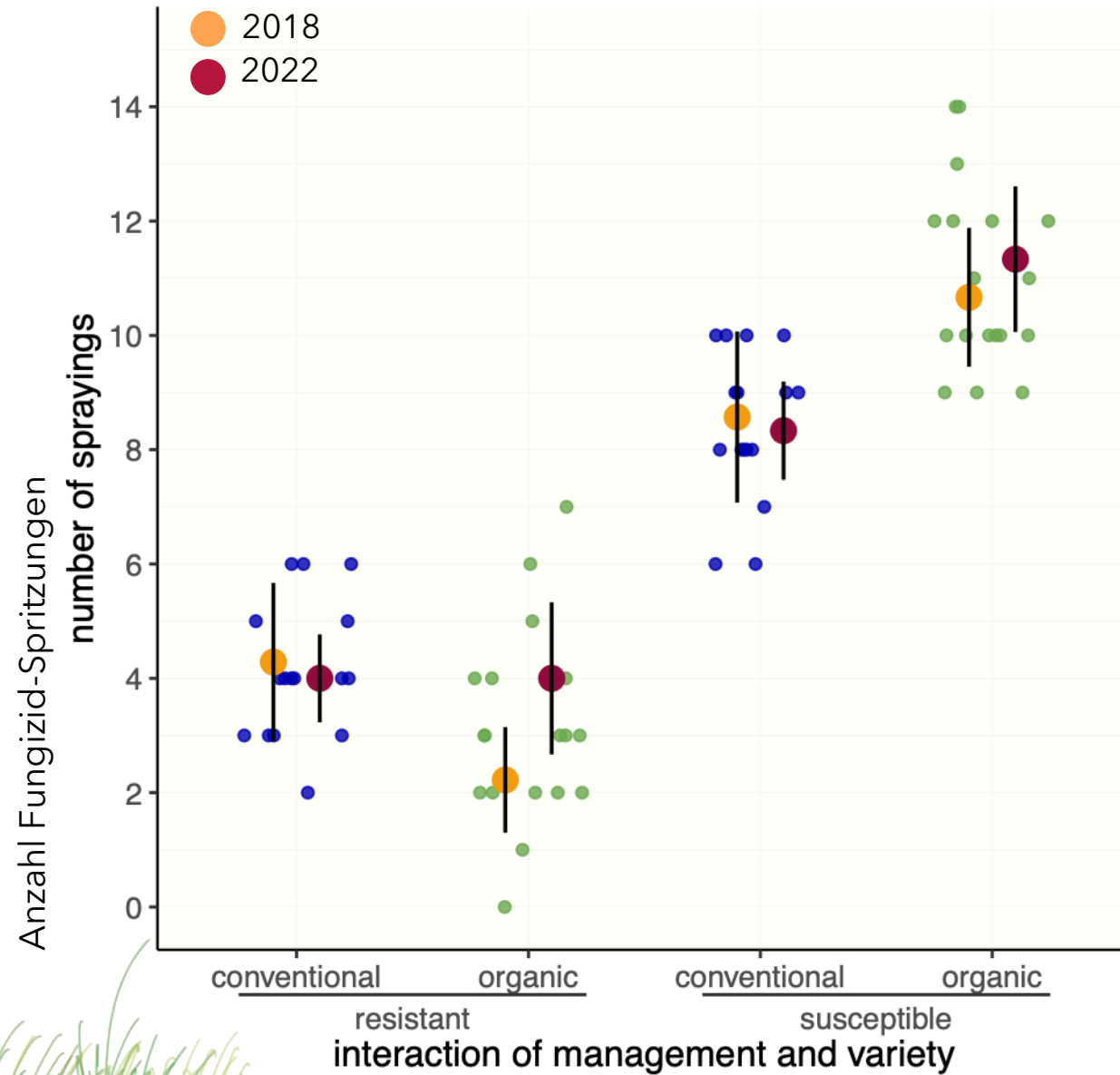
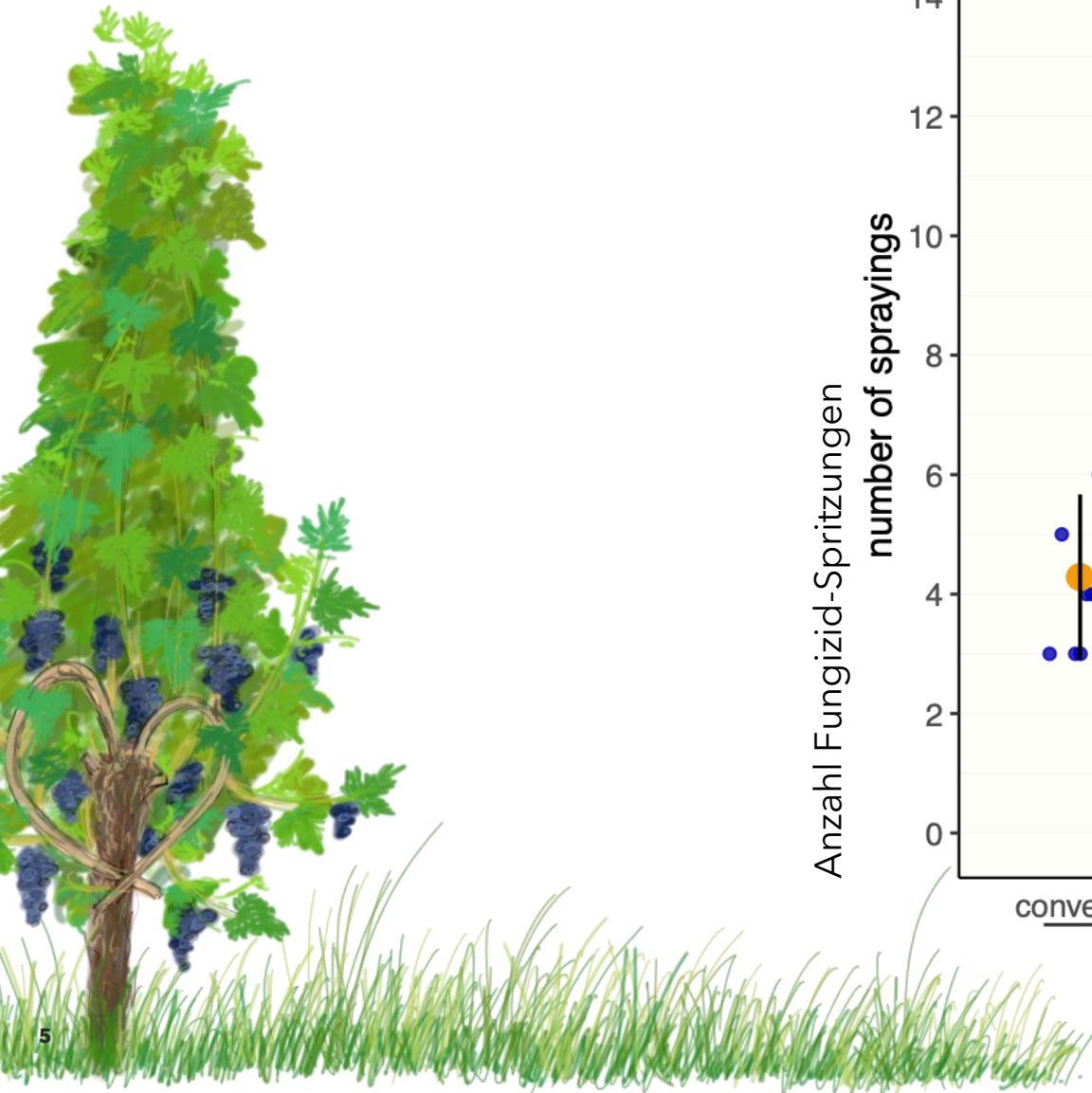
häufig mit **resistenten Sorten** bepflanzt
half planted with **resistant varieties**

novisys
Weinbau mit Zukunft

RPTU

Pflanzenschutz

Fungicide sprayings



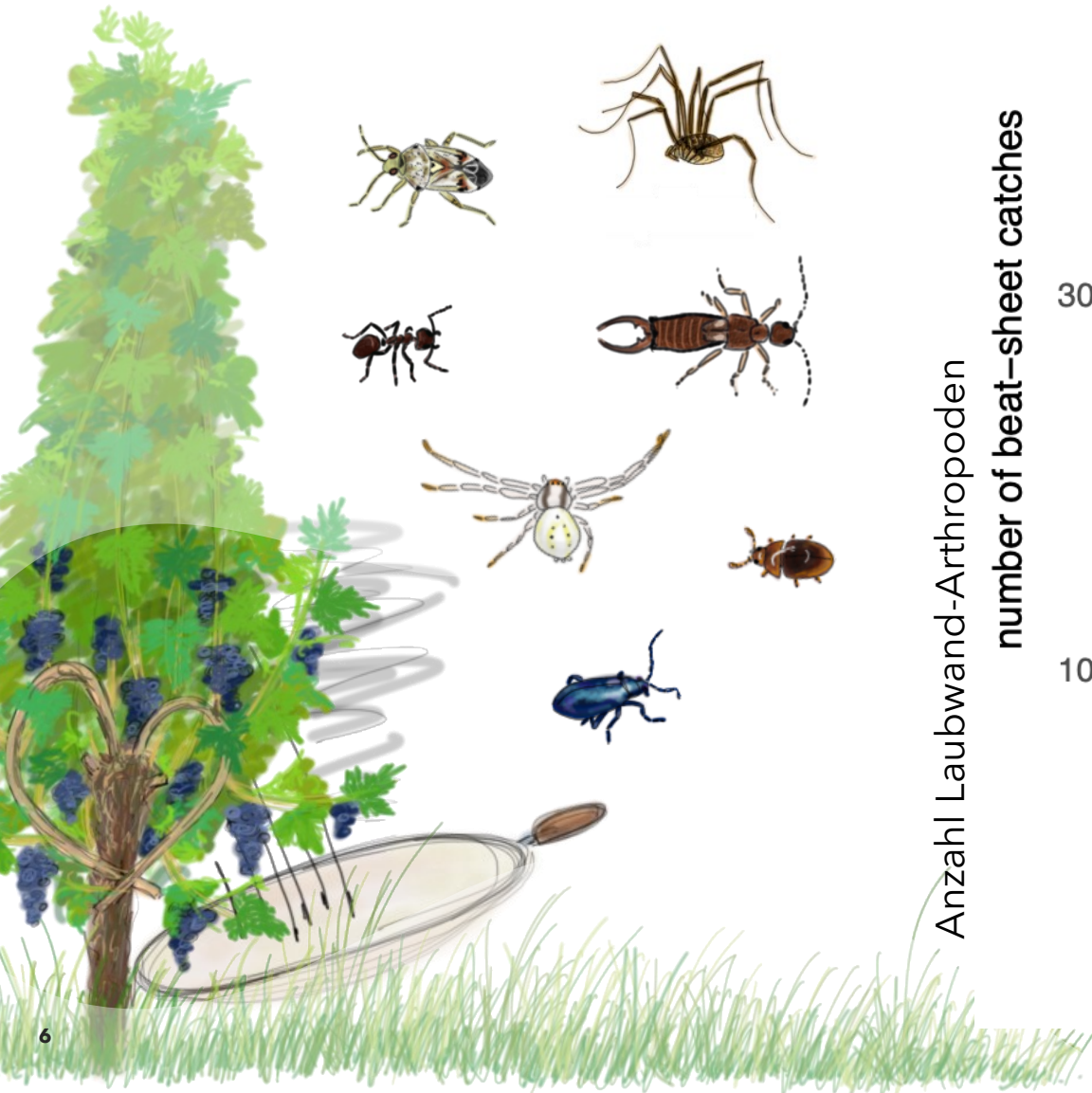
Rebsorte / Variety ***

Management
2018 n.s.
2022 ***

Interaktion / Interaction ***

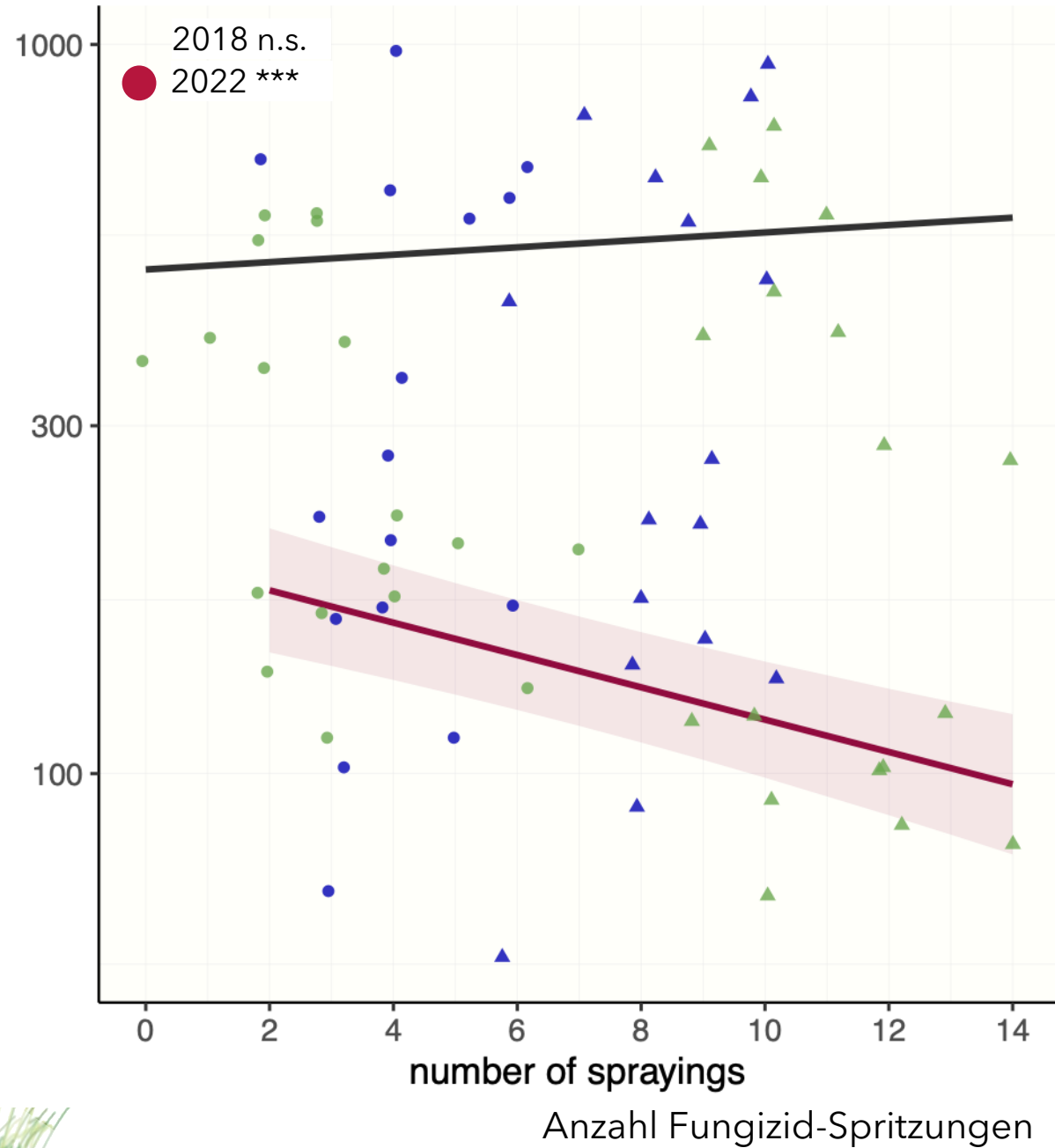
Laubwand-Arthropoden

Canopy-dwelling arthropods



Anzahl Laubwand-Arthropoden

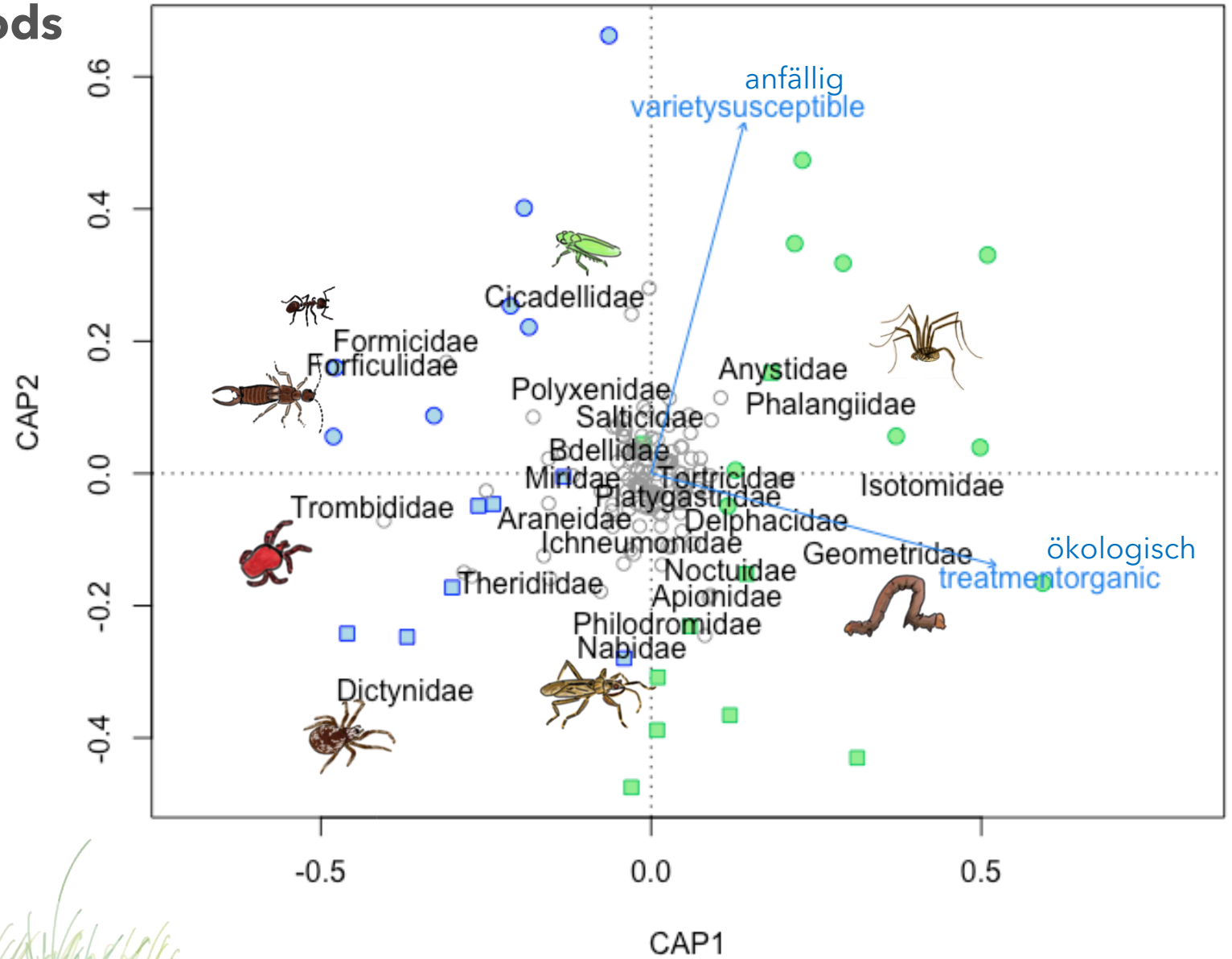
number of beat-sheet catches



Laubwand-Arthropoden

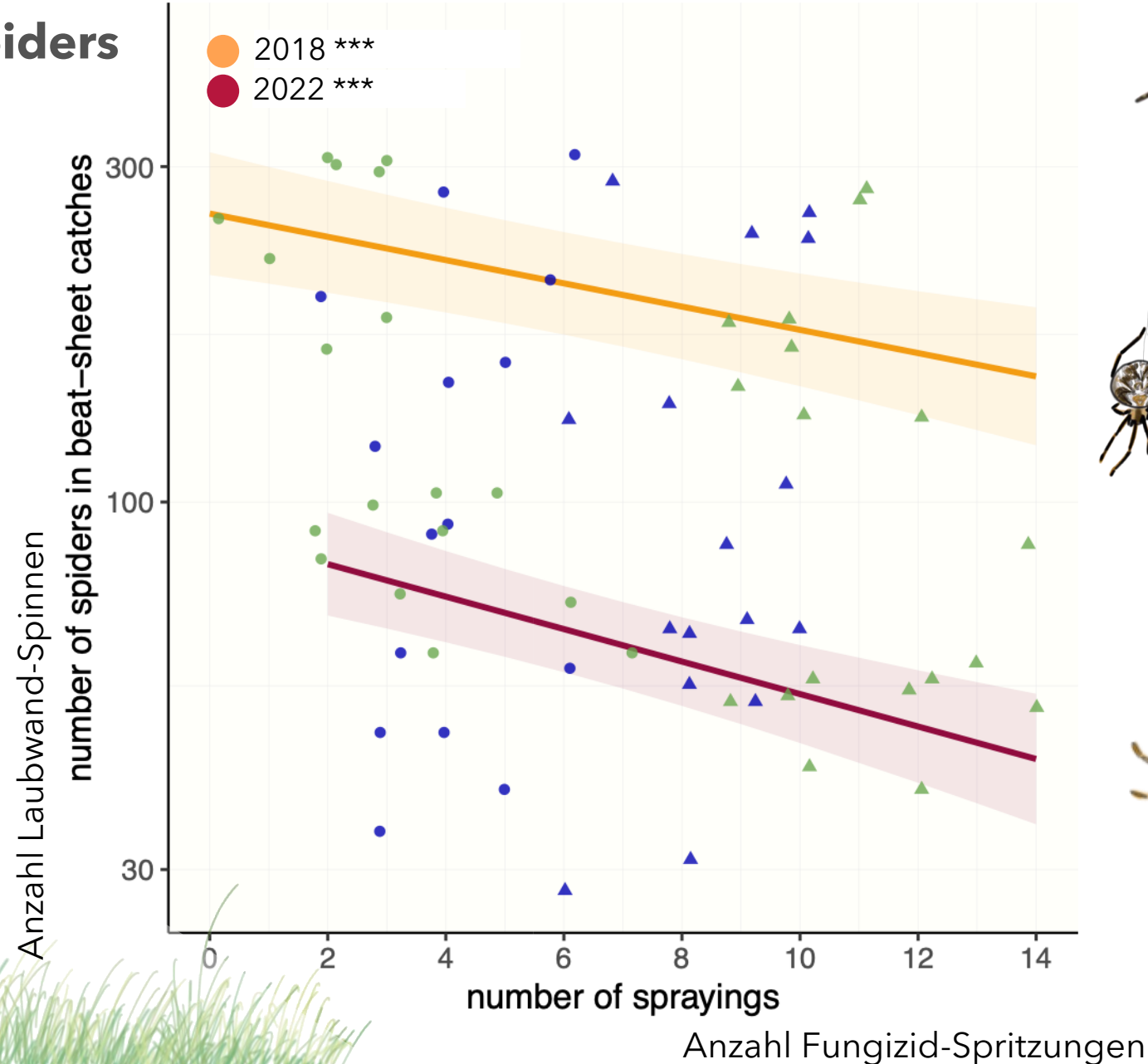
Canopy-dwelling arthropods

2018
Rebsorte/Variety **
Management .



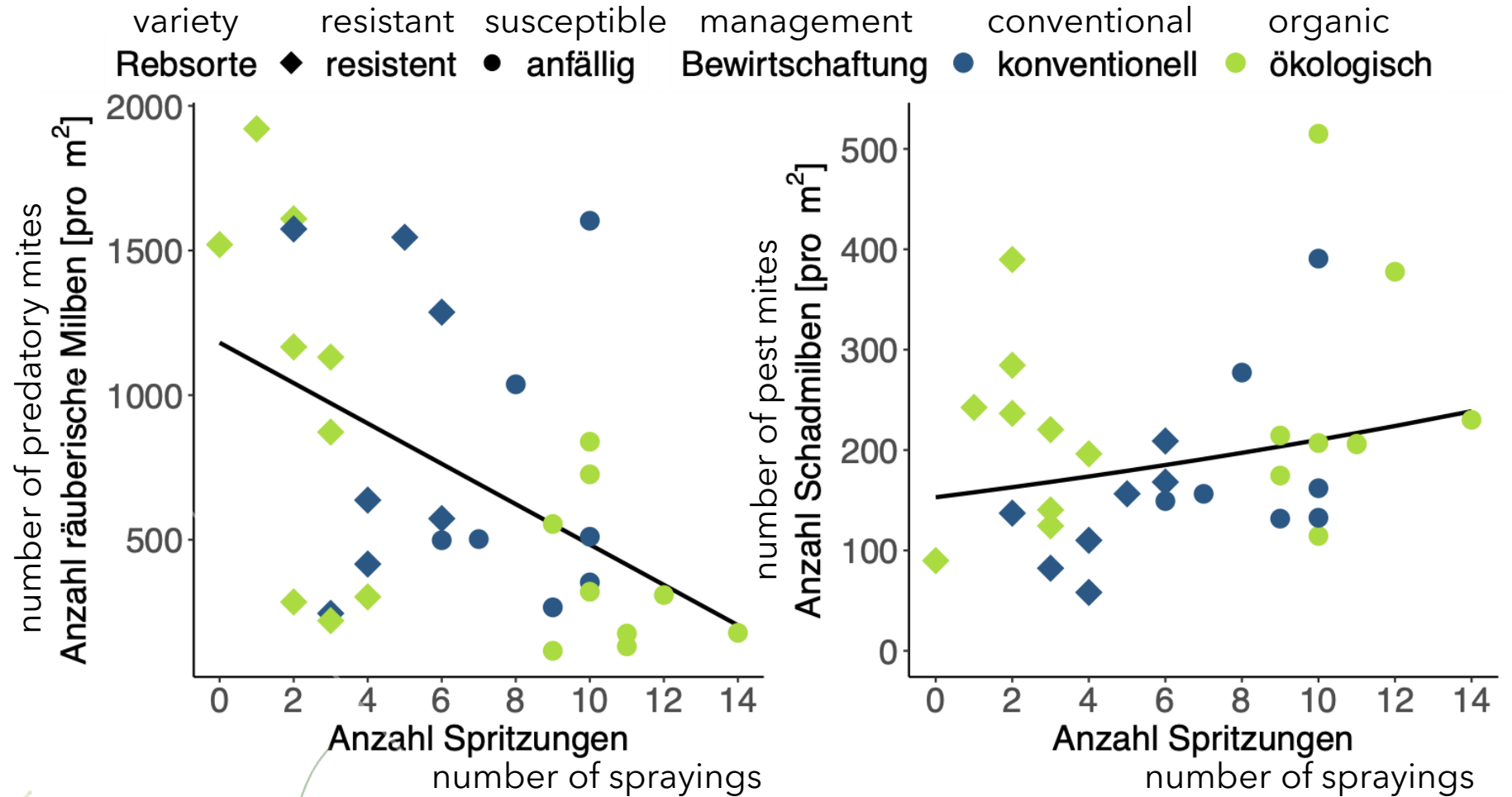
Laubwandspinnen

Canopy-dwelling spiders

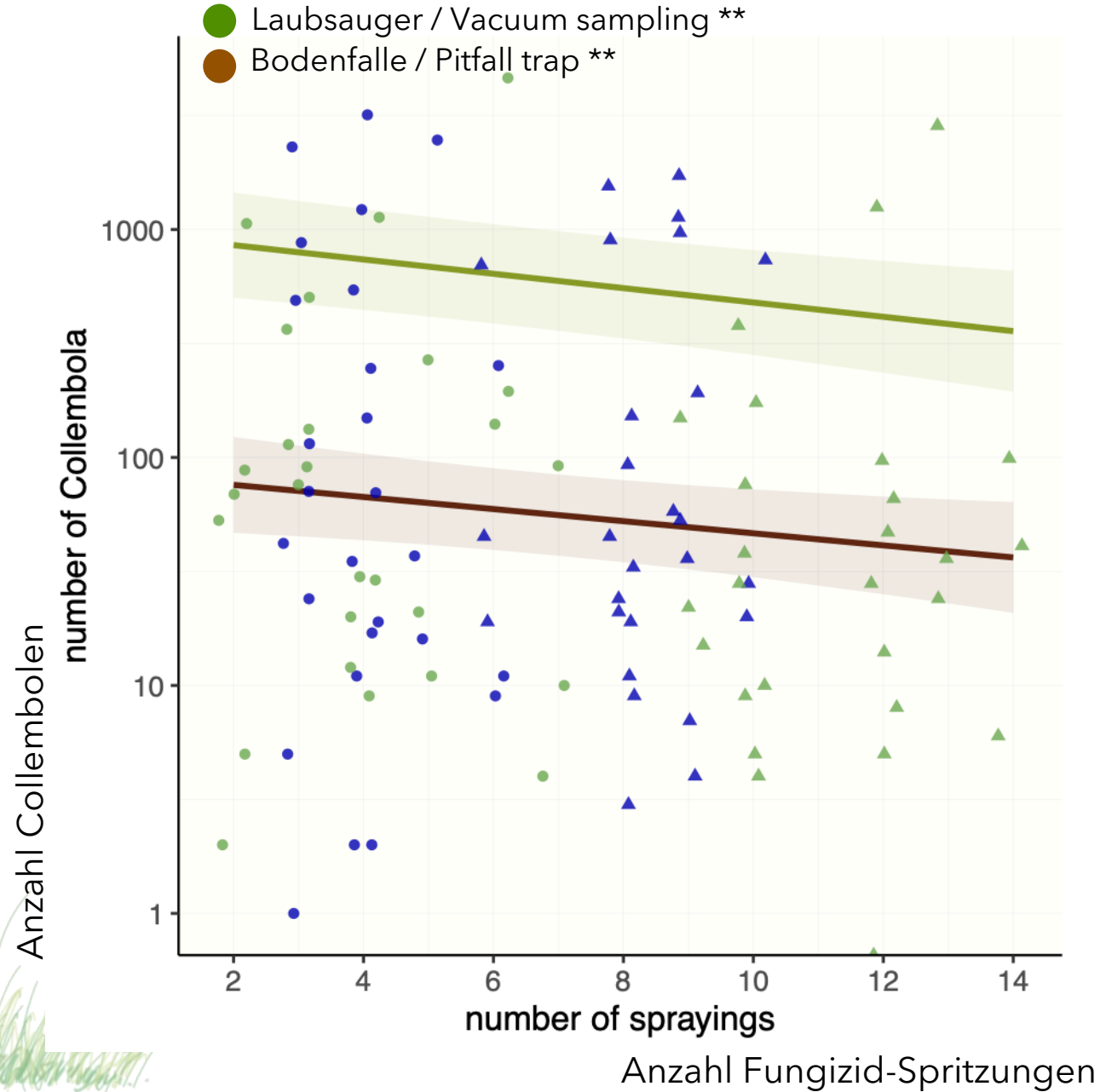
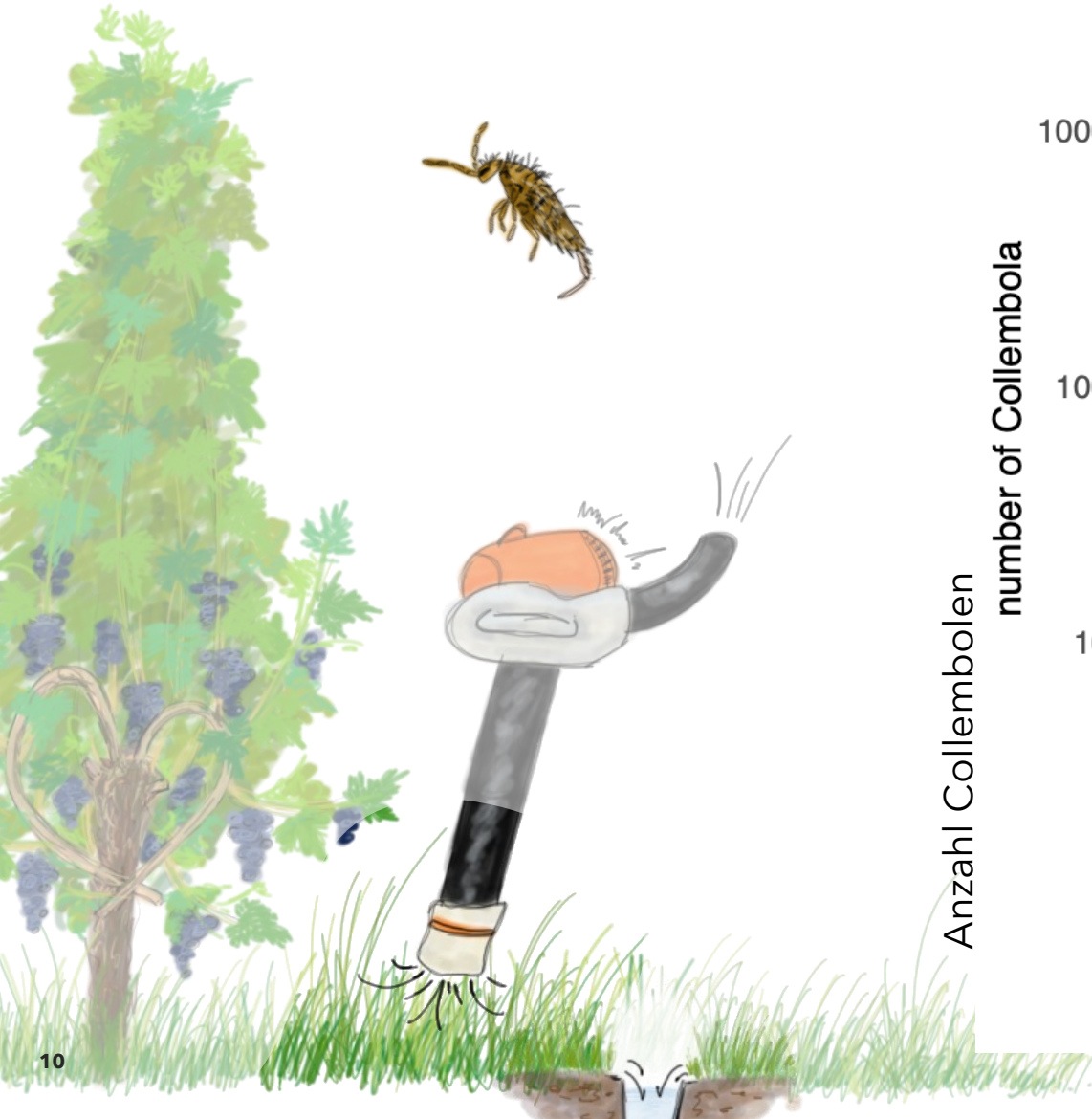


Raub- und Schadmilben

Predatory and pest mites

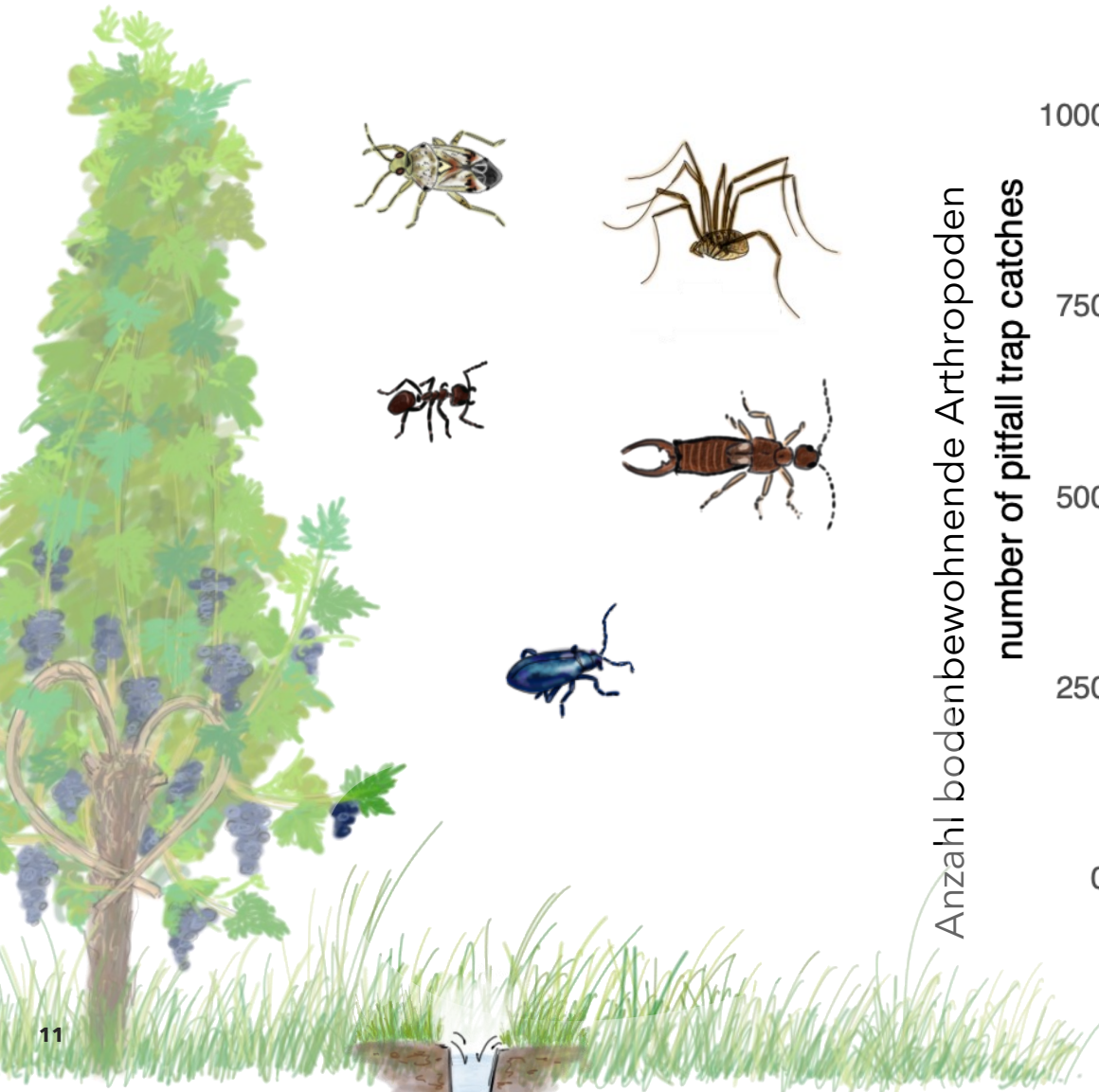


Springschwänze (Collembola) Springtails

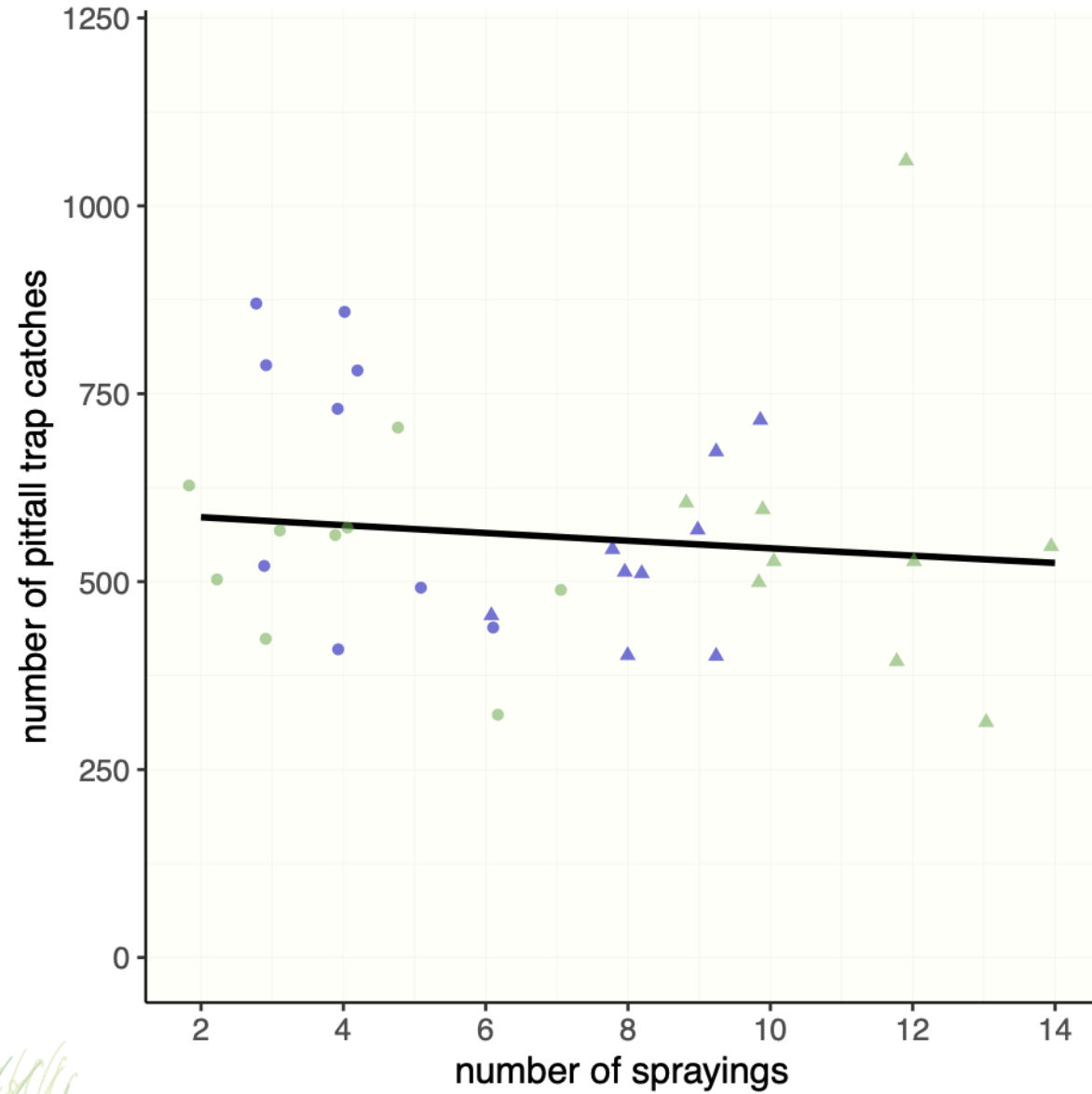


Bodenbewohnende Arthropoden

Ground-dwelling arthropods



Anzahl bodenbewohnende Arthropoden

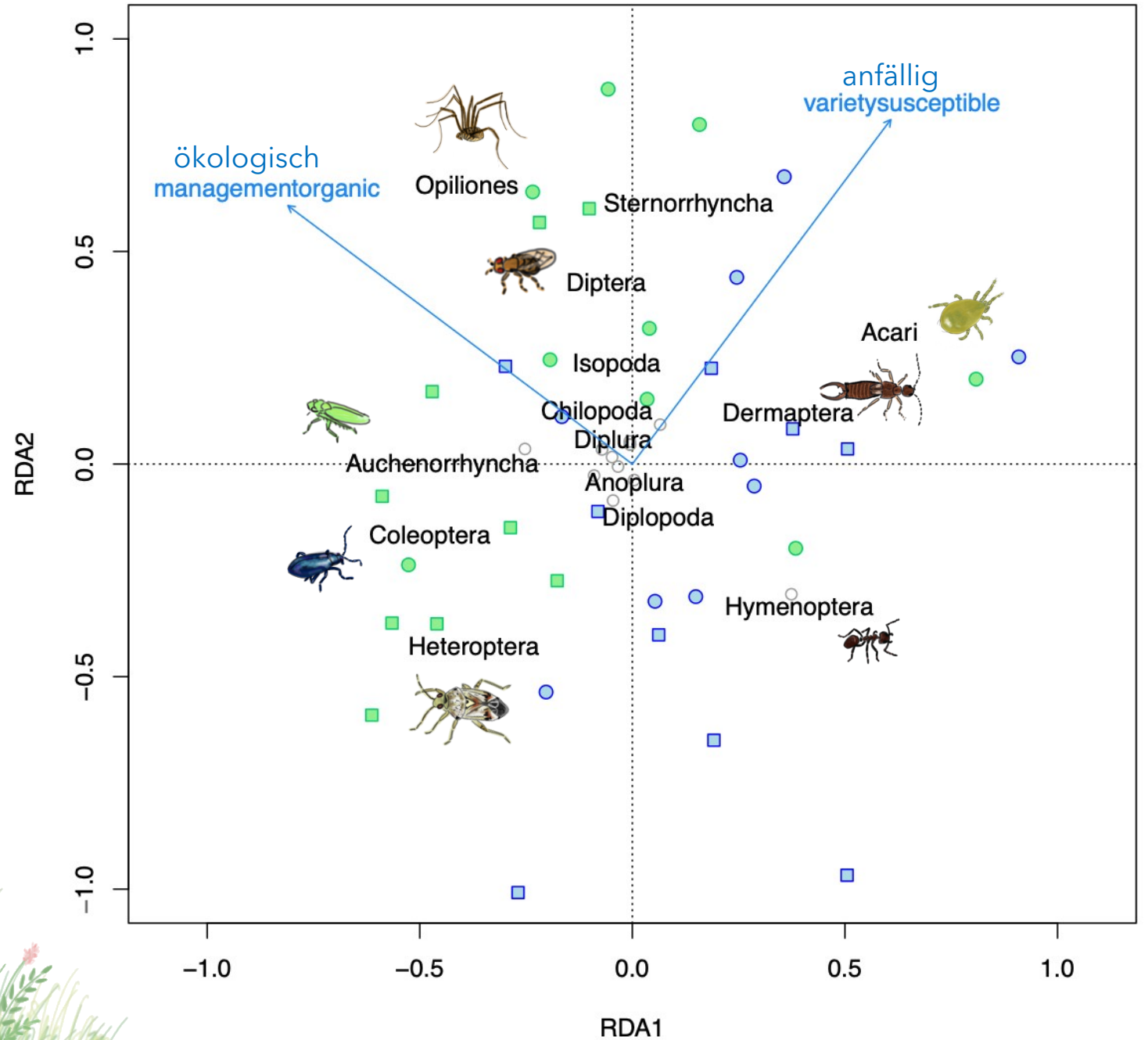


Anzahl Fungizid-Spritzungen

Bodenbewohnende Arthropoden

Ground-dwelling arthropods

2022
Rebsorte/Variety n.s.
Management **



Weniger Fungizide = mehr Nützlinge?

Less fungicides = more beneficial arthropods?

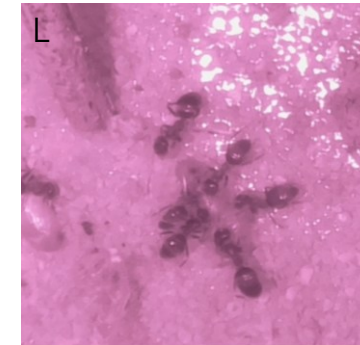
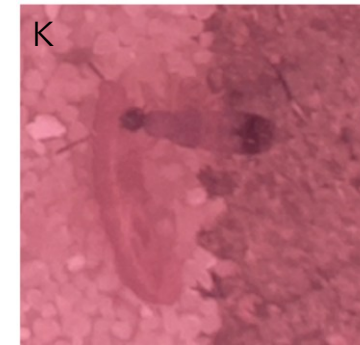
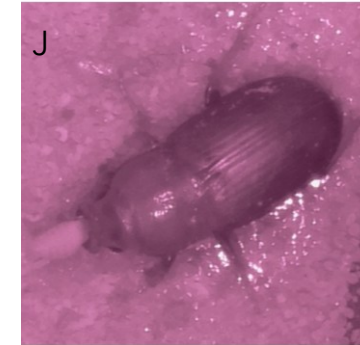
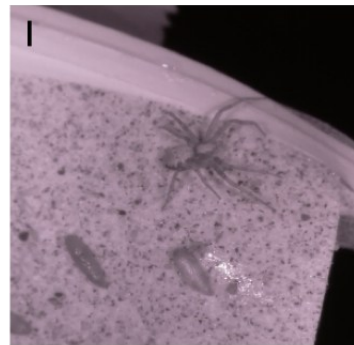
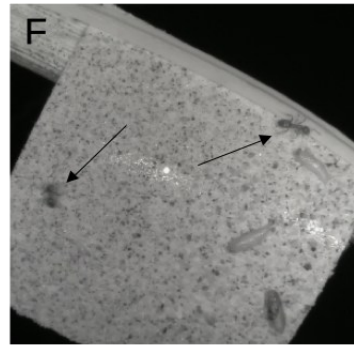
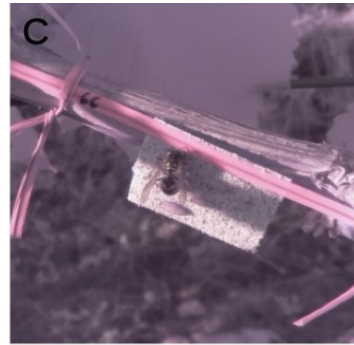
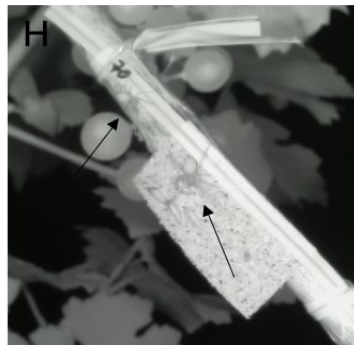
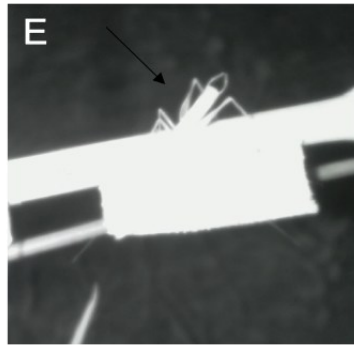
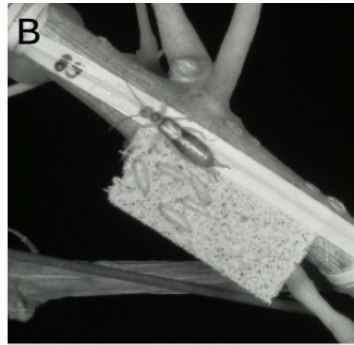
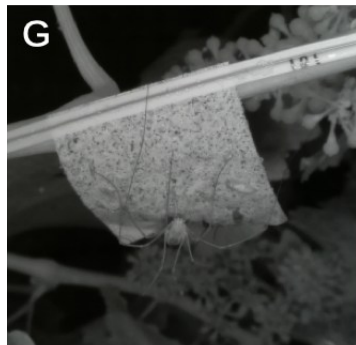
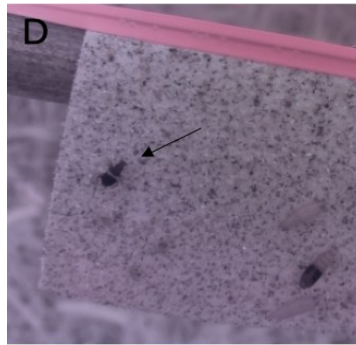
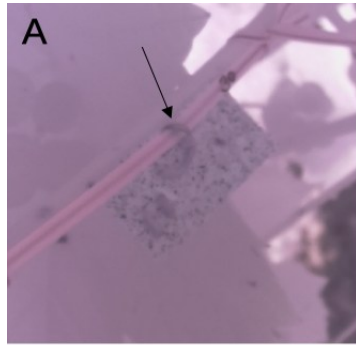
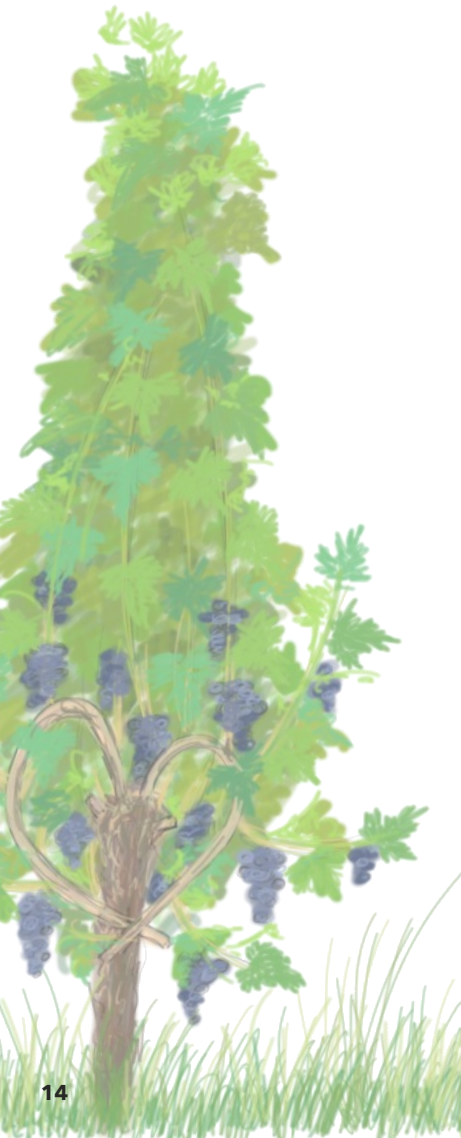
- **Laubwand: deutlich höheres Arthropoden-Vorkommen und starke Effekte auf Artgemeinschaft**
Canopy: significantly higher arthropod abundance and strong effects on community



verdünnter Einfluss
diluted impact

- **Boden: weniger deutliche Effekte auf Artgemeinschaft**
Ground: less pronounced effects on community

Mehr Nützlinge! More predators!



A Chrysopidae
D Blattelidae
G Opiliones

B *Forficula auricularia*
E *Meconema meridionale*
H *Cheiracanthium* sp.

C *Vespula* sp.
F Formicidae
I *Philodromus* sp.

J Carabidae
K Staphilynidae
L Formicidae

Trombidiidae



Vielen Dank!

Thank You!

Caroline Breithaupt, Stella Tabitha Fink,
Julia Gieser, Melanie Gillich, Ken Mauser,
Simon Rudolph, Keerthi Sudarsan,
Konrad Theiss & Rose Weisbrodt
allen mitwirkenden Winzern
all participating winegrowers

jo.reiff@rptu.de