

Crop Health & IPM

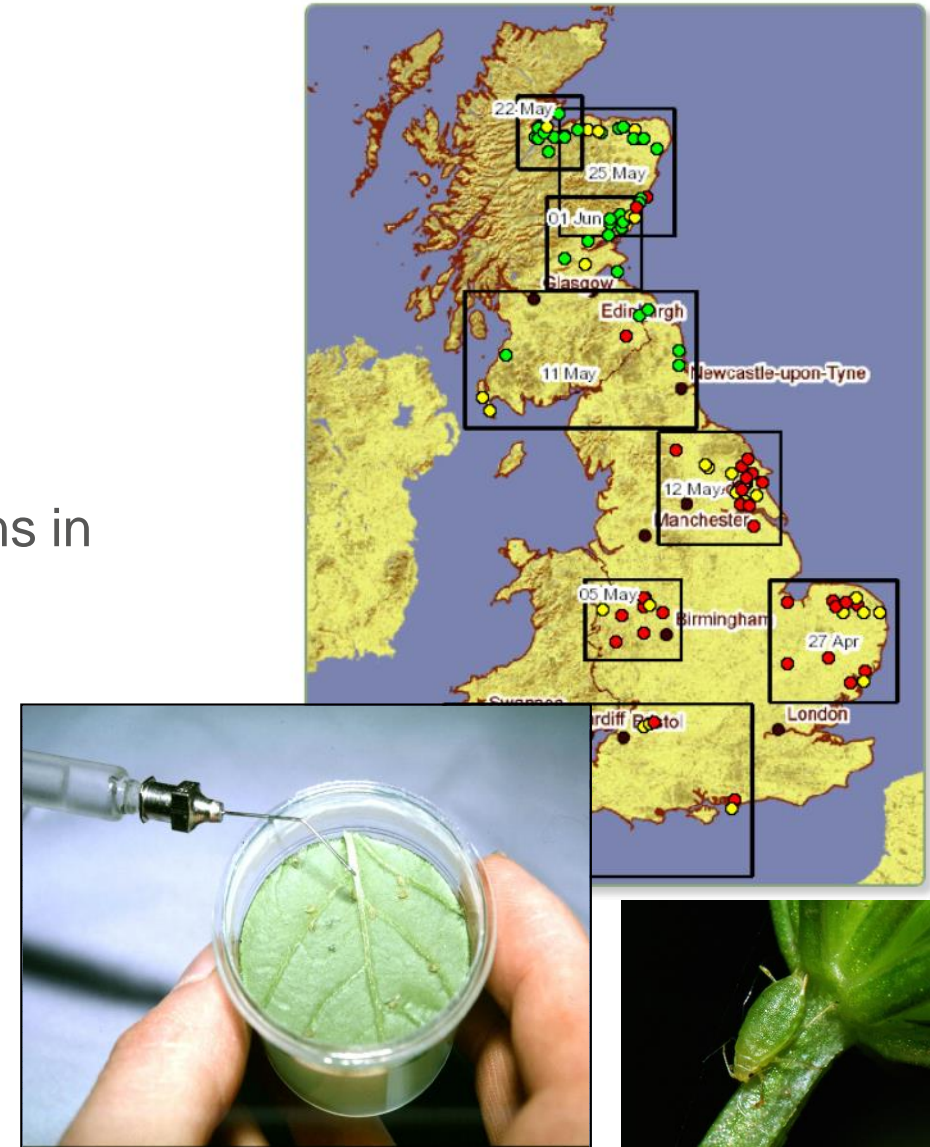
Pests



POTATOES

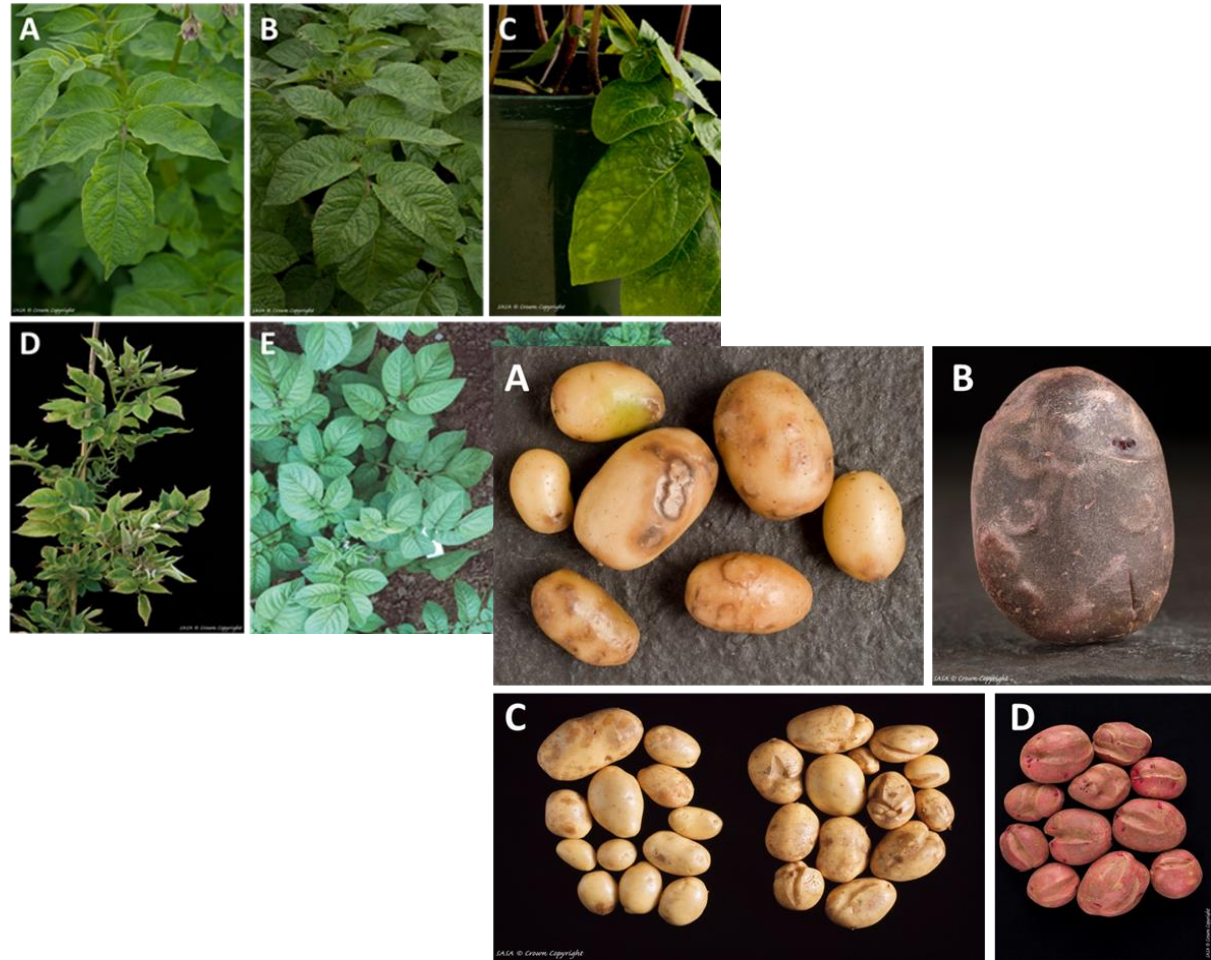
Pests: aphid/virus

- **Yellow water trap network**
- **Insecticide sensitivity status of aphids**
- **Aphids & virus in seed crops**
- Previous AHDB mineral oils work:
 - Effects variable, and in some situations, no reductions in virus incidence observed
- Subsequent published work from overseas:
 - Timing and frequency of mineral oil applications
 - Oils plus straw mulch or vetch [or oat] intercrop
- **For 2021**
 - Best performing treatments across trials from 2020



Pests: virus

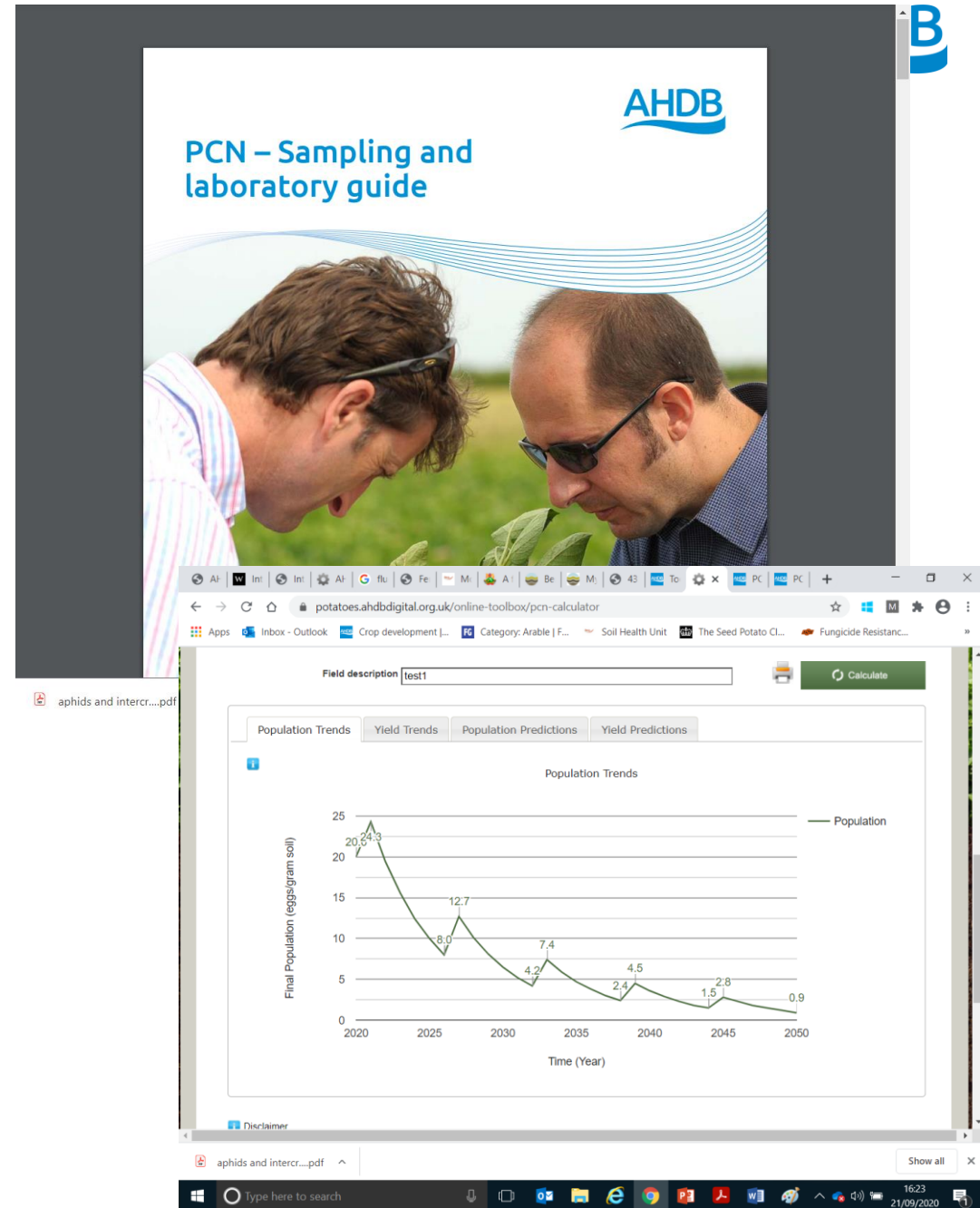
- Virus symptom expression
 - Virus strains, virus incidence, symptom expression
- Link to actions from National Virus Forum
 - Variety risk assessment
- AHDB Online content updated



Pests: Nematodes

- PCN

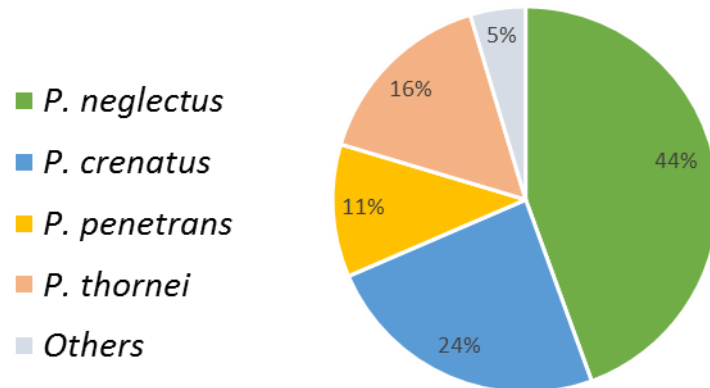
- Soil sampling project
 - Process whole sample: important for low populations
 - Fera now offer 1kg soil sample service
- PCN calculator & Revised PCN model (up to 20 eggs/gm)
 - Need more tolerance info
 - Simple method to measure decline rate (using collected cysts)
- Trap crops
 - 2013-2016 project: seed rates, sowing dates & herbicide screens



Other nematodes

- **Lesion nematodes (*Pratylenchus*)**

- Molecular assays
 - Better idea of what's in the field if lesion nematodes are a concern



- **FLN**

- Cover crops, biofumigants

- Best4Soil website

	Root lesion nematodes					Free-living root nematodes										
	<i>Pratylenchus penetrans</i> Northern root lesion nematode					<i>Trichodorus primitivus</i> Stubby-root nematode						<i>Trichodorus similis</i> Stubby-root nematode				
	1	2	3	4	5	1	2	3	4	5		1	2	3	4	5
Potato	●●●●					●●					●●●●					Potato
Buckwheat	?					?					?					Buckwheat
Crimson clover	?					?					?					Crimson clover
Mustards	?					?					?					Mustards
Phacelia	●●●●					●					?					Phacelia
Vetch	●●●●					●●●●					?					Vetch
White mustard	●●●●					●●●●					●●●●					White mustard
Japanese/Black oat	-					?					?					Japanese/Black oat
Barley	●●					●●					?					Barley
Perennial ryegrass	●●					●●●●					●●●●					Perennial ryegrass
Radish	●●●●					●●●●					●●					Radish
Turnip	?					?					?					Turnip