

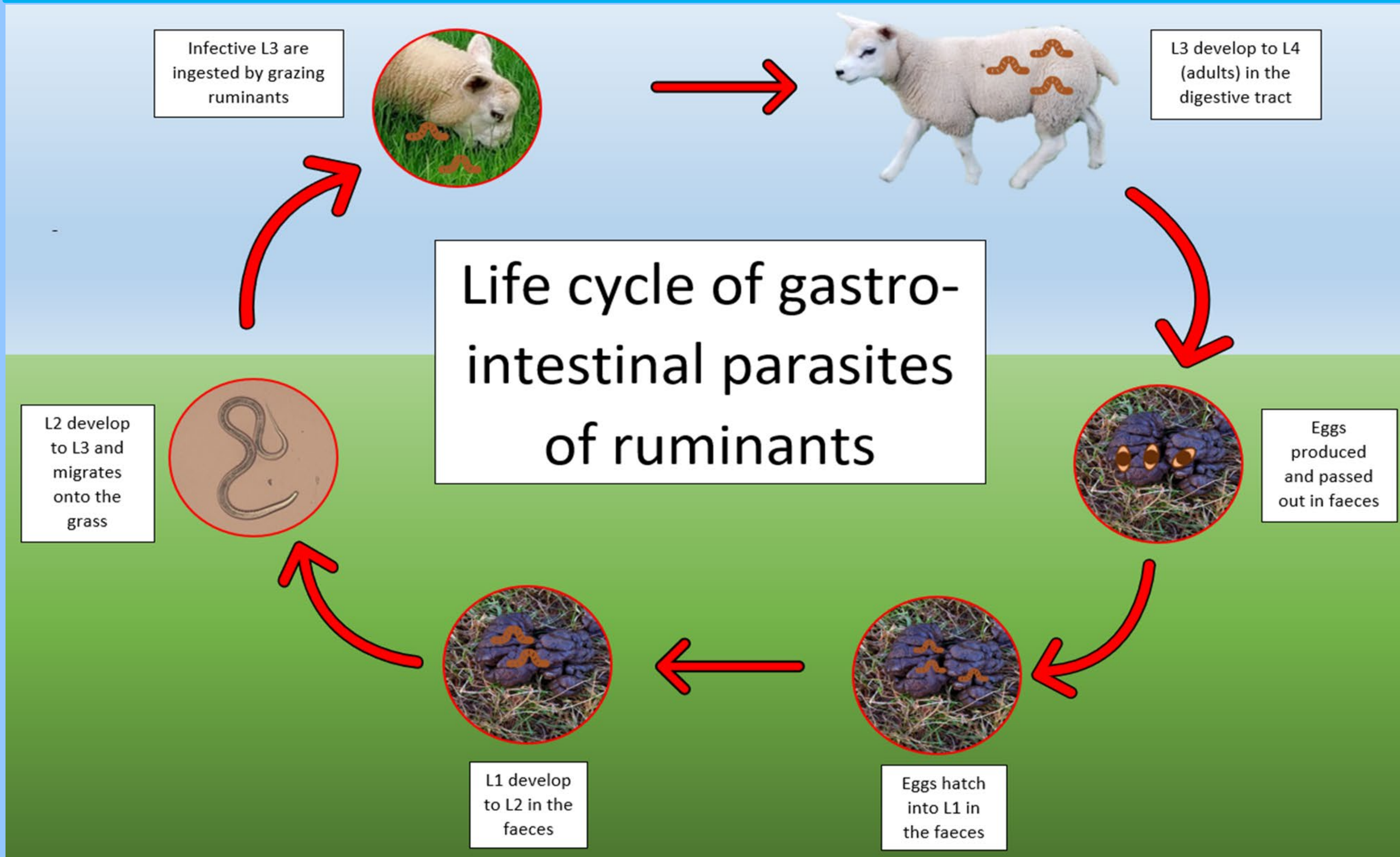
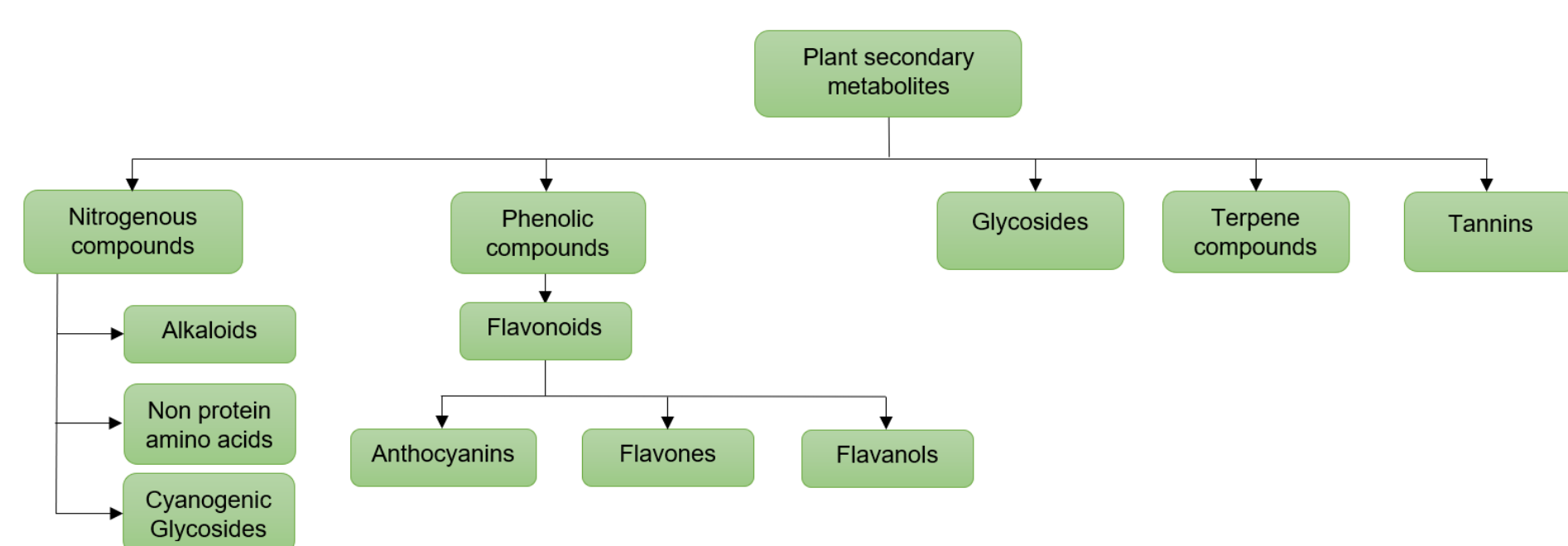
# TARGETED USE OF MULTI-SPECIES SWARDS TO MANAGE PARASITES OF LIVESTOCK

## RESEARCH AIM

To enhance the effectiveness of multi-species swards (MSS) by combining them with targeted selective treatment (TST) and planned grazing management with the intent to provide improved tools for effective parasite control in grazing livestock in Northern Ireland.

## MULTI-SPECIES SWARDS

- Gastrointestinal nematodes are a common and important cause of disease in grazing livestock.
- Resistance to anthelmintics is currently on the rise in Northern Ireland.
- MSS contain plant secondary metabolites that inhibit parasites which protect weight and body condition.

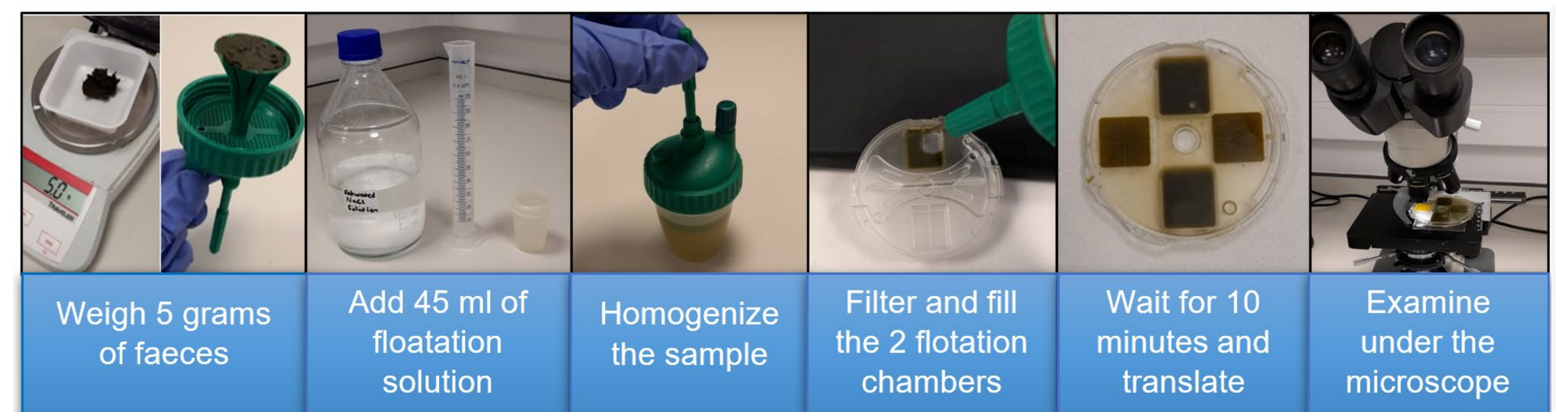


## COMBINED APPROACH – TST AND ROTATIONAL GRAZING ON MSS

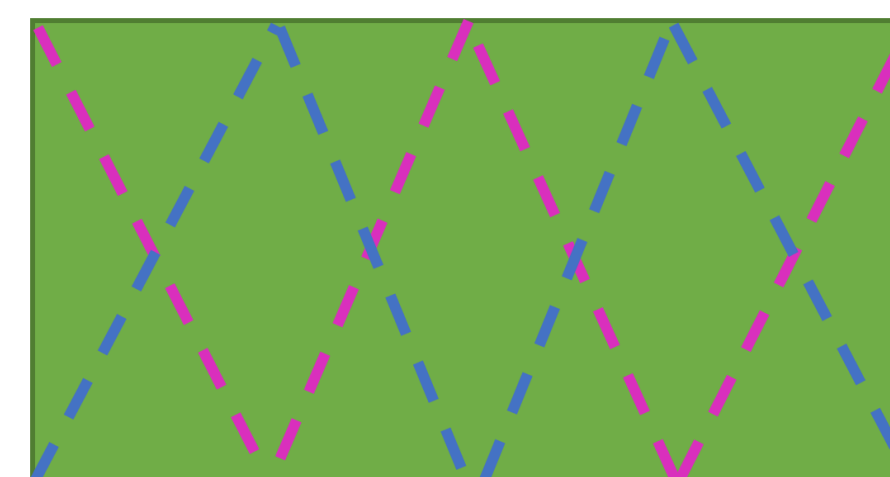
- MSS raise challenges in Northern Ireland as they are difficult to maintain and utilise optimally.
- MSS should be integrated with other strategies such as TST and planned grazing management to enhance their effects.
- TST: A strategy where individual animals in a herd are treated based on treatment indicators such as faecal egg counts, weight gain or body condition score.

## METHODS

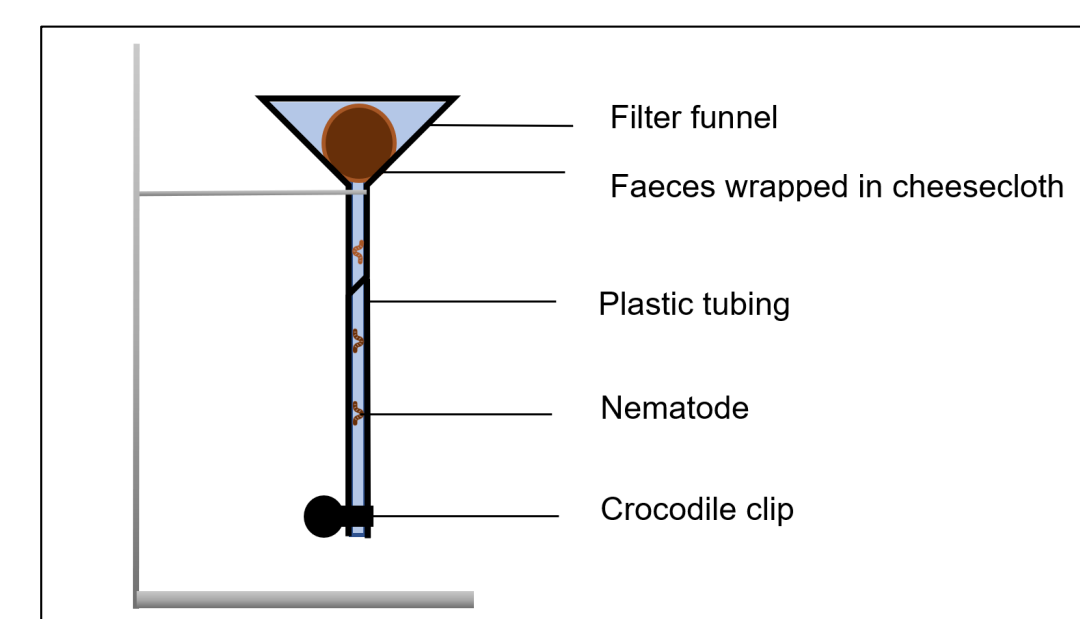
### Faecal egg counts (FECs)



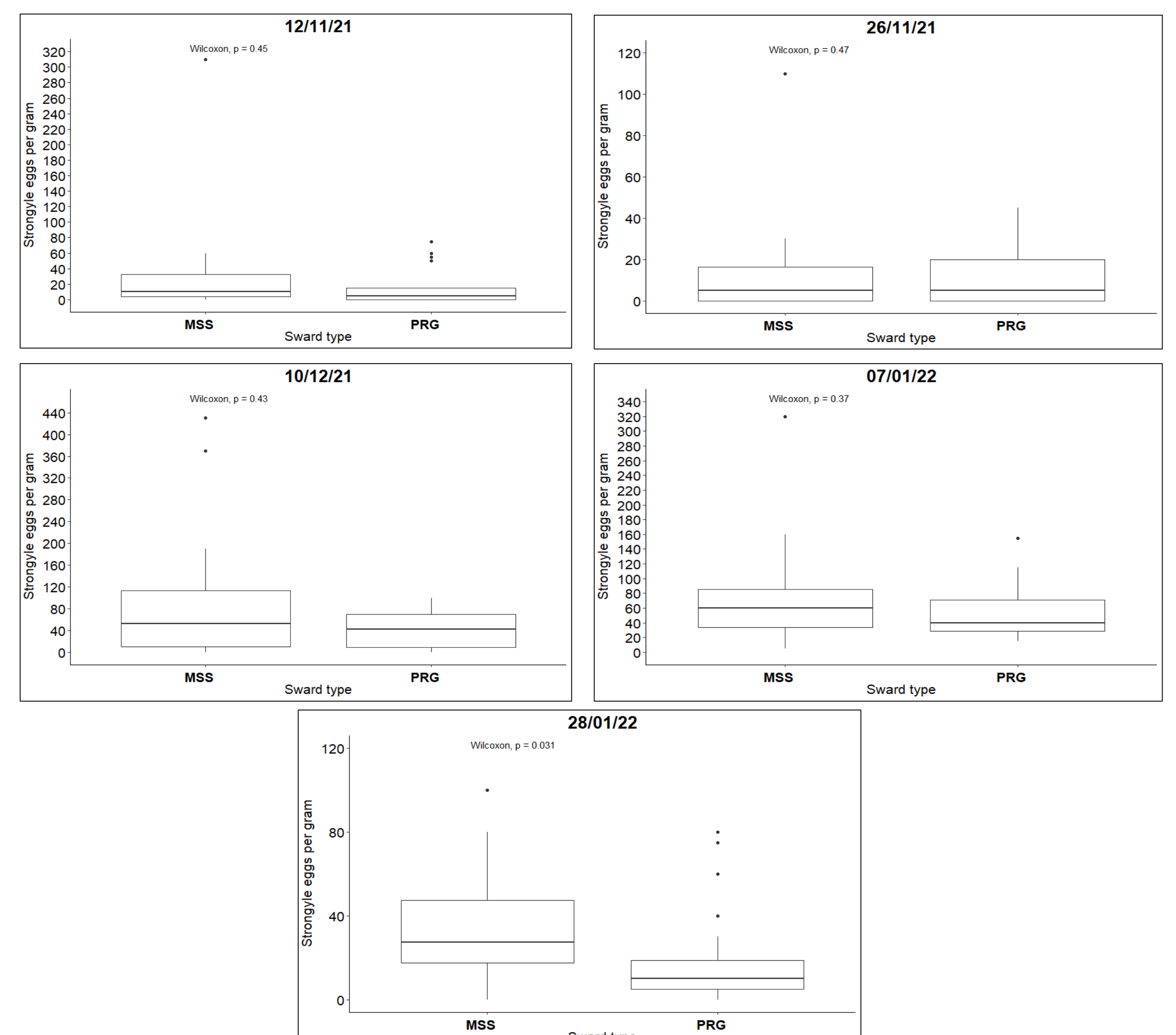
### Pasture larval counts



### Baermann larvae extraction method



## RESULTS - FECs



**Acknowledgements:** Supervisors: Prof. Eric Morgan (QUB), Dr Katerina Theodoridou (QUB), Dr Francis Lively (AFBI). The Morgan lab team. **Contact details:** Nicole Henry, First year PhD student, email: [nhenry10@qub.ac.uk](mailto:nhenry10@qub.ac.uk)