



FAIRWAY

Introduction

MCPA is a commonly used pesticide in Northern Ireland to control rush growth (*Juncus effusus*) in pasture. Concentrations in excess of the EU Drinking Water Directive limit of 0.1µg/L are regularly seen in surface waters. This study used a short questionnaire to explore the willingness of Northern Irish farmers to use a mobile phone app to guide pesticide usage decisions.



Methods

Suitable questions to explore farmers willingness to adopt mobile apps were developed in consultation with a number of organisations that regularly engage with Northern Irish farmers (e.g Ulster Wildlife, Source to Tap and Cafre) and the Biometrics group at AFBI. The questionnaire is being deployed at specialist interest groups, such as pesticide usage training days as well as livestock marts.

Results

User Uptake

In order for a mobile app to be successful farmers need to be both willing and able to utilise this information source. 77% of respondents reported owning a smart phone. Of these, 68% said that they were prepared to consider using a mobile app in future.

Application Method

Farmers are making use of weed wipers, as well as boom sprayers and knapsacks to apply pesticides (Fig. 1)

Farmer Requirements

Respondents were asked to select from a range of options, what information they would like a mobile app to provide information on. (Fig. 2) In addition they were asked to comment on their confidence in the disposal of used pesticide containers (Table 1).

Conclusion

This study has shown that Northern Irish farmers are willing, and largely equipped, to adopt smart phone apps as part of their pesticide usage decision support toolkit. We have also shown that there is particular interest in gaining tips on pesticide usage that would optimise pesticide performance, whilst there is a need to shore up farmers understanding of best practice. The results from this survey will inform the development of a pesticide management phone app over the coming year. Stage 1 of this development is under way with the design of a user interface, and includes further stakeholder consultation

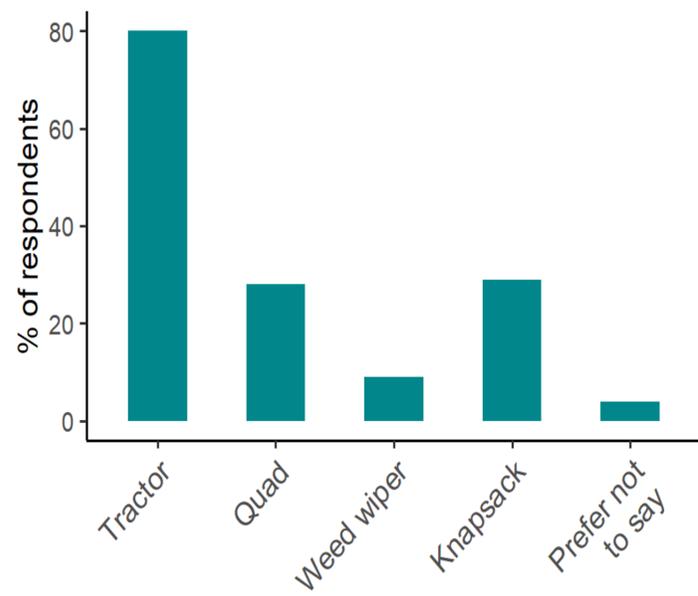


Fig. 1: Techniques used by respondents to apply pesticides. Each respondent was allowed to select more than one technique

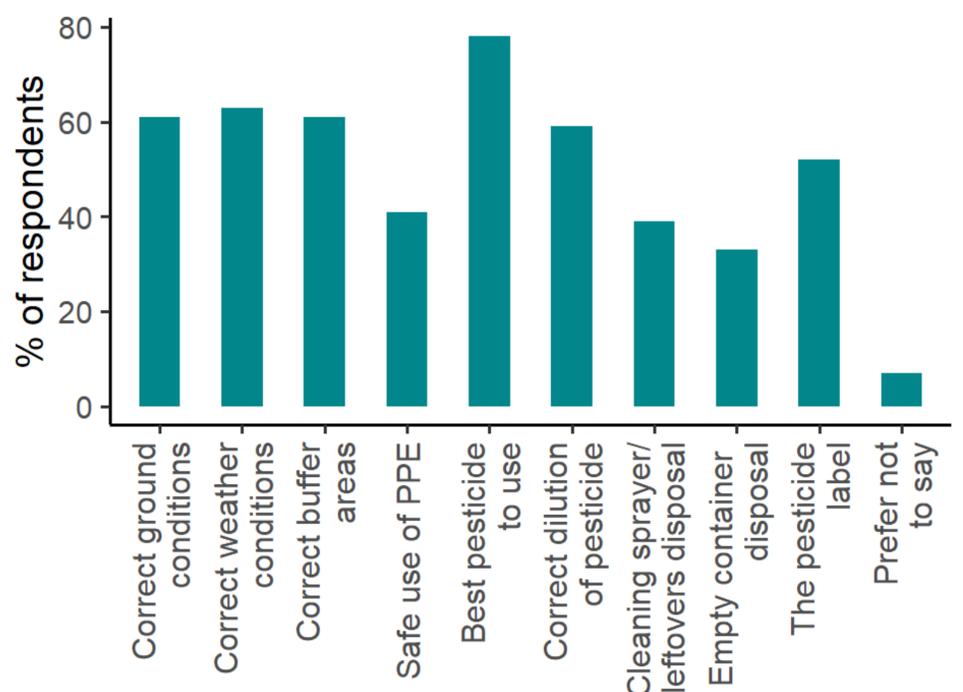


Fig. 2: Areas of pesticide use best practice that respondents expressed an interest in. All respondents were permitted to select more than one answer.

Table 1: Respondents were asked how confident they felt they were around disposal of used pesticide containers.

Confidence around disposal of use pesticide container	% of respondents
Very confident	44
Somewhat confident	38
Not confident/Didn't know or preferred not to comment	18