

MEDIA RELEASE

Our Ref: T15:0032

22 June 2012

Attention: News Editor

Taking weed control to new heights

Agricultural scientist John Moore wants to get right on top of the Great Southern's looming Sydney golden wattle problem and he now has a working prototype of a remote control quadcopter to do just that.

Mr Moore, a weed control expert with the Department of Agriculture and Food, developed the quadcopter, named the HerbiCopter, to deliver herbicide spray to eradicate weeds in inaccessible places.

The HerbiCopter prototype is an ingenious combination of rotors, car parts, electronic sensors and controls, tank, spray head and an over-the-counter camera mounted on an aluminium and wire frame, and is operated by a remote control unit.

Development of the prototype was supported by a \$10,000 grant Mr Moore gained as the winner of last year's Great Southern Development Commission (GSDC) Medal for Excellence in NRM.

Mr Moore devoted half of the grant to the HerbiCopter project and will use the balance to study weed control issues in South Africa as they relate to Western Australia.

He said Sydney golden wattle was native to Australia's eastern states but was a major weed threat in the Great Southern.

"The first Sydney golden wattle was recorded in Albany in 1986 and now, in an aerial survey of the same area, one tree in 23 is Sydney golden wattle," Mr Moore said.

"If we don't do more to control it, we estimate that 18 per cent of the bushland in this area will turn to Sydney golden wattle by 2020."

Concentrated infestations of the wattle can be treated by ground crews using spray equipment but isolated wattle trees could establish major infestations in inaccessible areas.

Mr Moore's HerbiCopter can use GPS coordinates to fly directly to isolated trees that have been located by aerial observation.



Building partnerships for regional prosperity

Once the HerbiCopter hovers over a Sydney golden wattle, the operator can confirm the identification of the tree by viewing it with an on-board camera before releasing a burst of finely-misted herbicide spray to kill it.

Downdraft from the quadcopter rotors helps to direct the spray onto the tree and reduce overspray.

“We have a window now where we have a problem with a profile and people are willing to act on it,” Mr Moore said.

“If people get concerned now and take prompt action over the next couple of years, we can tackle Sydney golden wattle, otherwise it could become a lost cause.”

GSDC Chairman Peter Rundle said the HerbiCopter project was a fine example of benefits flowing from the GSDC Medal.

“Mr Moore has undertaken a fascinating project with the GSDC Medal grant,” Mr Rundle said.

“Controlling Sydney golden wattle is a key focus of the project but it has obvious applications to other weed problems.

“The work has the potential to improve the management of the Great Southern’s natural resources,” Mr Rundle said.

Media contact: Bruce Manning, ph. 9842 4888