

Students develop drone to fight rhino poaching

Written by Miriam Mannak

Tuesday, 17 February 2015 09:47 - Last Updated Tuesday, 17 February 2015 10:06



When it comes to rhino poaching, South Africa has a real crisis on her hands. Whilst the authorities are trying to find a way to stop the slaughter, students from South Africa, the US, Germany and Finland are getting their hands dirty.

The students, who call themselves team Aircraft for Rhino and Environmental Defence (AREND), are competing in the Wildlife Conservation UAV Challenge. The group is backed by Wildlife Protection Solutions (WPS), an international organisation with the objective to protect endangered species.

The students' entry comprises the designing and producing of an unmanned aerial system to support anti-poaching operations at Kruger National Park in South Africa. Their drone features communications antennas built into the wings and a camera into the nose. The unmanned aircraft will be able to silently conduct autonomous searches while capturing quality images throughout. The idea is to record poaching incidents, and enable rangers to take action much faster.

This is far from a luxury. Between 1 January and 22 October 2014 South Africa lost 791 rhinos to poachers, of which 503 died in the Kruger National Park. This is a massive increase from seven years ago: in 2007, the number of poached rhinos stood at 13.

The equipment has already been tested at Meadow Lake Airport in Peyton, Colorado, using a SkySentry aerostat. This is a large helium balloon attached to a string. The aim is to find out

Students develop drone to fight rhino poaching

Written by Miriam Mannak

Tuesday, 17 February 2015 09:47 - Last Updated Tuesday, 17 February 2015 10:06

how far the equipment can fly and what requires tweaking. "This will allow us to develop the imaging processing algorithm that we'll ultimately use to identify poachers and rhinos," said American aerospace engineering graduate student Aaron Buysee in a statement.

The students will fly to South Africa next month to integrate their equipment with the aircraft, and do a couple of test runs.