Spreading the word

The National Aeronautical Centre (NAC) is pioneering UK UAV flying. **Ray Mann**, the organisation's architect, tells Beth Stevenson how his brainchild is expanding and teaming with other sites, both domestically and internationally.

The NAC was formed last year during the Farnborough Air Show following developments at West Wales Airport, and was designed to give an identity to the environment in which the facility was operating. Following on from that, in December it was announced that the centre had extended its operations and teamed up with Newquay Cornwall Airport, offering customers the choice of flying at either site.

'As an airfield we were of a particular size, and every airfield has its limitations,' Mann admitted. 'So we eventually got into discussions with Newquay, which also had a mission and aspiration to expand their operations into the UAS arena. It was a good fit – they knew nothing about UAS operations and we knew plenty, and it was an advantage for us to include them into the NAC as an extension to our capability and this is working really well.

'There's quite a lot of interest from companies looking to operate and they are enjoying having the choice of West Wales and the capabilities in that particular area, or Newquay Cornwall Airport.'

Mann explained that it is not the intention for aircraft to be able to fly from one site to another, but this is a possibility for the future if operations and customers require it.

'It's really an opportunity to transfer the West Wales Airport capability to fly UAS to Newquay and help them do the same thing under the same safety and regulatory auspices.'

OKLAHOMA ASSISTANCE

The NAC is also currently assisting Oklahoma State University with its bid to provide one of six dedicated test sites for UAVs as part of US efforts to integrate UAS into non-segregated airspace by 2015.

'Oklahoma State will be part of that development, and we will be supporting that,' Mann said. 'We found that they were a good fit for us. We've already started working on

that and we're hoping to be able to assist in a number of different areas. This will be an exchange of information, and will help us on this side of the Atlantic as well.

'The international effort is important. If you look at aviation in general at the moment, it is absolutely an international system and UAVs have to fit into that. That is fundamental.'

Alongside its efforts in the US, the NAC is also looking at European UAV development.

'It is important to break out of that segregated airspace, and that does not just apply to the UK,' Mann continued. 'In the not too distant future we will hopefully be delivering UAV services from one country to the next and vice versa.'

Mann explained that on a UK level 'we can always do more', and one concern at the moment is that, given the economic potential of the unmanned systems industry, it is surprising that it has taken such a long time to make government understand the contribution that it can bring.

'This is a high-tech growth area,' he added. 'My job is to maintain that communication as much as I can so that more people really understand what we can do today, understand what we need to do for tomorrow, and undertake sensible initiatives. Looking from a UK perspective, we are very well positioned to maximise the economic potential.

'We just talk to ourselves [within industry] and in that way we don't get answers. I think now is the time to start producing answers, which will help industry and government as well, because government aren't quite sure which way to go.'

ENDING SEGREGATION

He called for more communication across the aviation world to develop systems that adhere to international standards.

'We are now more than capable of delivering what is needed to break out of segregated airspace,' Mann asserted. 'I'm not saying that our segregated airspace will not be required in the future – quite the opposite. Development, test/evaluation and training activities will all have to be done in a subsidised, standardised area.'

Meanwhile the British Army's Watchkeeper UAV is based at West Wales while it is undergoing development, and the technology displayed by the platform is 'so worthwhile', according to Mann.

'The technology has to be harnessed into something that can participate in international aviation,' he concluded. 'We know we can fly with all sorts of payloads, and we know we can control them remotely, but we have to get them to a level that the regulator is completely satisfied and confident with.' uv