

8 August 2014 FOIA reference: E0002003

Dear XXXX

I am writing in respect of your recent request of 12 July 2014, for the release of information held by the Civil Aviation Authority (CAA).

Your request:

- 1. "Are there aircraft authorised to operate in the UK airspace as part of Geoengineering and Weather Modification research? Research was promised to be taking place worldwide in various EU summits, research that would involve the practice of aerosol spraying operations at various altitudes.
- 2. In addition, are there currently any aircraft operating in UK airspace that release vapours into the atmosphere that differ from the standard exhaust expected from hydrocarbon fuel combustion i.e. carbon dioxide and water vapour?
- 3. What are your regulations on the following materials being emitted from any/all types of aircraft in UK airspace:

Aluminium, Antimony, Arsenic, Barium, Cadmium, Chromium, Copper, Iron, Lead, Manganese, Nickel, Zinc".

Our response:

Having considered your request in line with the provisions of the Environmental Information Regulations 2004, we are pleased to be able to provide the information below.

While the CAA is aware of discussions related to such research, none of the aircraft operators that fall within the CAA's regulatory oversight has been authorised to operate for such a purpose.

The CAA, as the UK's independent aviation regulator, has a responsibility to ensure that all civil aviation in the UK is carried out in a safe matter and any civil aircraft being used for 'spraying' operations would have to be approved by the CAA as airworthy.

This would involve inspection of the tank construction, sealing means, pipe work, nozzles etc. to ensure that it is able to withstand whatever was being sprayed. Structural fatigue considerations would be made due to the additional weight of any spraying equipment. Modifications would then be approved (or not) for flight by the CAA's Safety & Airspace

Civil Aviation Authority

Aviation House GW Gatwick Airport South Crawley West Sussex England RH6 0YR <u>www.caa.co.uk</u> Telephone 01293 768512 foirequests@caa.co.uk Regulation Group. Other than those light aircraft (mainly helicopters) involved in the aerial application of pesticides in agriculture, horticulture and forestry, we can confirm that no request for such an amendment has been made by any operator who falls within the CAA's regulatory oversight.

The dropping of any 'article' from an aircraft is regulated through Article 129 of the Air Navigation Order 2009, and in the case of the purposes of agriculture, through Article 131, which requires the grant of an aerial applications certificate and is also regulated through Defra, the Department for Health, devolved governments, and the Health and Safety Executive. The ANO can be viewed here: <u>http://www.caa.co.uk/cap393</u>.

Standards for aircraft jet engine exhaust emissions are set by the International Civil Aviation Organisation. These standards cover emissions of oxides of nitrogen (NO and NO₂), carbon monoxide (CO) and unburned hydrocarbons (HC). More information can be viewed here: <u>http://www.icao.int/environmental-protection/Pages/default.aspx</u>

The CAA does not have any regulations prohibiting the emission of any of the metals listed. However, many of these are considered harmful and are thus covered by various UK laws derived from EU Regulations and Directives, and overseen by the Health and Safety Executive.

If you are not satisfied with how we have dealt with your request in the first instance you should approach the CAA in writing at:-

Mark Stevens External Response Manager Civil Aviation Authority Aviation House Gatwick Airport South West Sussex RH6 0YR

mark.stevens@caa.co.uk

The CAA has a formal internal review process for dealing with appeals or complaints in connection with Freedom of Information requests. The key steps in this process are set in the attachment.

Should you remain dissatisfied with the outcome you have a right under Section 50 of the Freedom of Information Act to appeal against the decision by contacting the Information Commissioner at:-

Information Commissioner's Office FOI/EIR Complaints Resolution Wycliffe House Water Lane Wilmslow Cheshire SK9 5AF www.ico.gov.uk/complaints.aspx

Should you wish to make further Freedom of Information requests, please use the e-form at http://www.caa.co.uk/foi.

Yours sincerely

Rick Chatfield Information Rights and Enquiries Officer

CAA INTERNAL REVIEW & COMPLAINTS PROCEDURE

- The original case to which the appeal or complaint relates is identified and the case file is made available;
- The appeal or complaint is allocated to an Appeal Manager, the appeal is acknowledged and the details of the Appeal Manager are provided to the applicant;
- The Appeal Manager reviews the case to understand the nature of the appeal or complaint, reviews the actions and decisions taken in connection with the original case and takes account of any new information that may have been received. This will typically require contact with those persons involved in the original case and consultation with the CAA Legal Department;
- The Appeal Manager concludes the review and, after consultation with those involved with the case, and with the CAA Legal Department, agrees on the course of action to be taken;
- The Appeal Manager prepares the necessary response and collates any information to be provided to the applicant;
- The response and any necessary information is sent to the applicant, together with information about further rights of appeal to the Information Commissioners Office, including full contact details.