

DESIGN AND ACCESS STATEMENT

Location and setting

The location is the Weybourne Atmospheric Observatory which is situated on the cliffs at Weybourne overlooking the sea (52°57'01.612N, 01°07'19.122E). The observatory is reached by an access track from the Muckleburgh Collection site.

The Proposal

The observatory building is an ideal site for installation of a MOTUS receiver station to track migratory species moving along the East Anglian coast and across the North Sea. The building will provide a high mounting point for the antennae and is located close to the sea and in an open landscape with no obstructions. Norwich Bat Group is currently working with Dutch collaborators on a European research project on bat migration, specifically Nathusius' pipistrelle, and the potential impacts of offshore windfarms. There is also huge potential for tracking migratory birds in Norfolk. Several local organisations are supportive in expanding the MOTUS network on the coast and have helped to fund a receiver at Weybourne.

Materials and design

The receiver station comprises 4 aluminium Yagi antenna which are orientated approximately north, south, east and west. These will be mounted on different elevations of the building: antenna 1 on the north wall, antennas 2 and 3 on the east wall and antenna 4 on the south wall. None of the antenna will extend higher than 1m above the top of the existing

The photo montages below show the installations.

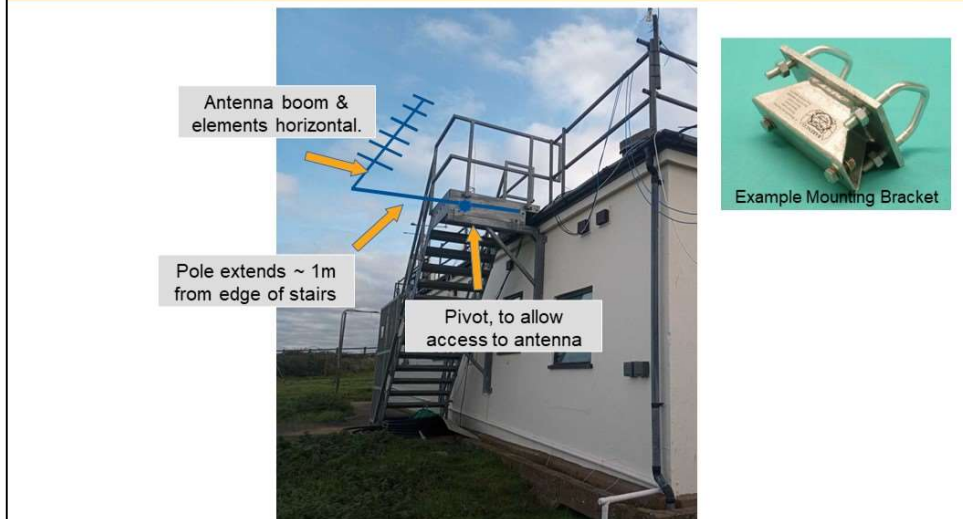


Antennas 2, 3 & 4: Montage



The fixings for the antenna will be steel scaffold poles and mounting brackets. Antenna 1 will be fixed to the metal stairs as shown below extending 1m horizontally from the stairs and a further 2m (the length of the antenna) parallel to the wall.

Antenna 1: Montage



Antennas 2 and 3 will be mounted on a single pole fixed to the wall with stand-off brackets and extend 2m (the length of the antenna) from the edge of the building.

Antennas 2 & 3: Exterior view



Antenna 4 will be located at the east end of the south wall, on an existing pole and brackets.

Antenna 4: Existing situation



The cables from the antenna will be routed to the receiver cabinet mounted on the roof next to an existing power source. A single GSM (phone) antenna or WiFi antenna will also be mounted on the roof.

Access

No additional access is required for the installation. Existing access and hardstanding will be used.

Timing

The receiver station would be installed as soon as planning consent is obtained. The installation is expected to take 1 to 2 days.