

Bridging the gap: LPAs working together to protect barbastelle bats at a landscape-scale



NORWICH NORTHERN DISTRIBUTOR ROAD



FUNDED BY
Department for Transport
Norfolk County Council
Broadland
NORWICH City Council
South Norfolk
NEWANGLIA
Balfour Beatty
M&M
Transport for Norwich
A TRANSPORT FOR NORWICH IMPROVEMENT



Dr David White
Natural Environment Team



Two projects:

1. The Norwich Northern Distributor Road





Northern Distributor Road (NDR)

Your NDR questions answered

[Route map](#)

[Why we're building the NDR](#)

[How we're funding the NDR](#)

[More about Your NDR questions answered](#)

Planning and approval process

[Development Consent Order](#)

[Library](#)

[More about Planning and approval process](#)

Construction programme

[Postwick junction](#)

[Plumstead Road to Postwick](#)

[Wroxham Road \(A1151\) to Salhouse Road](#)

[More about Construction programme](#)

Public exhibitions

[Taking place throughout Norfolk during March](#)

[More about Public exhibitions](#)

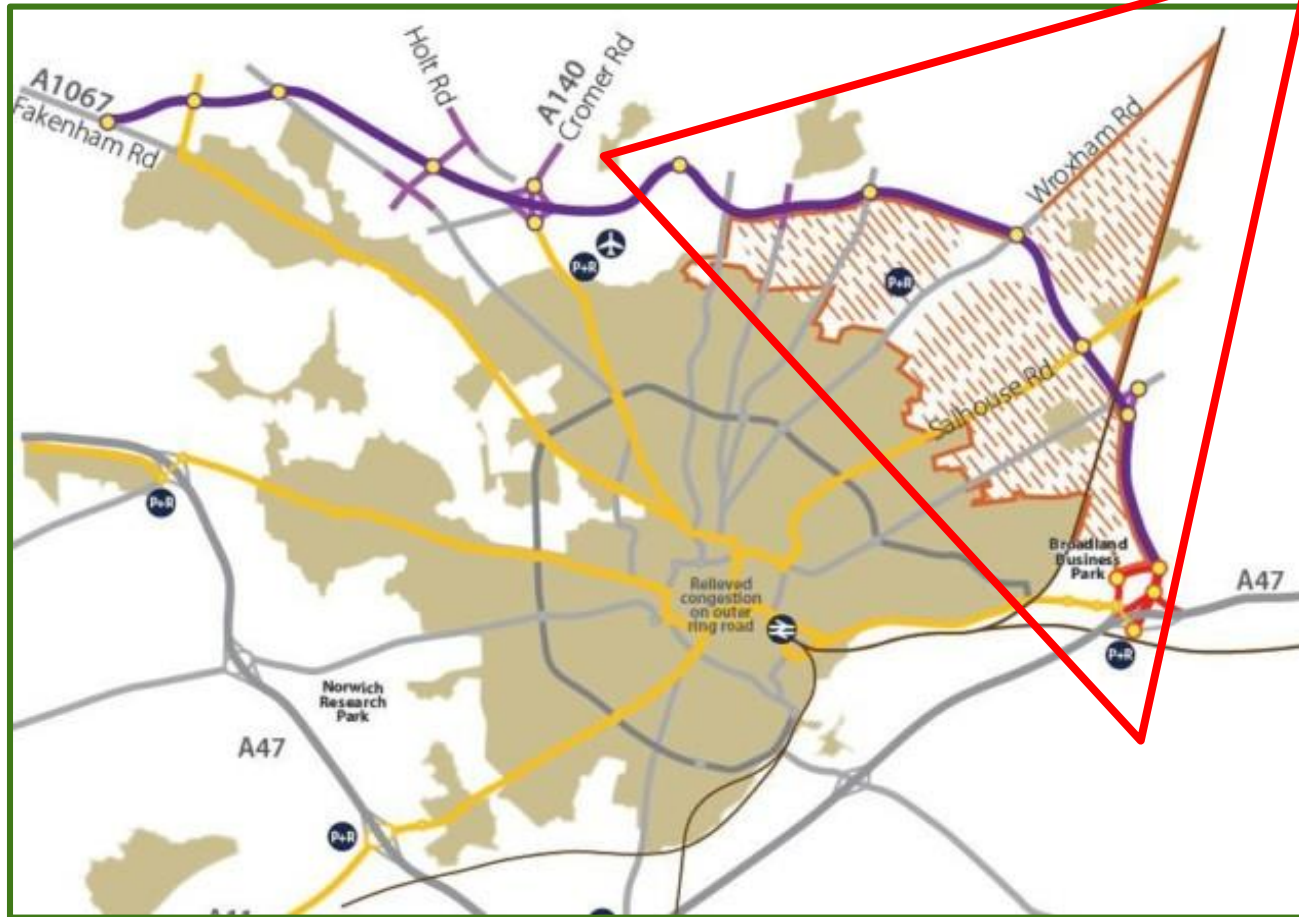
Transport Matters newsletter

[Monthly progress updates and next steps](#)

[More about Transport Matters newsletter](#)



Project 2: The NE Norwich Growth Triangle



The NE Norwich 'Growth Triangle' Area Action Plan:
Guiding development for up to 13,500 new homes

Adopted July 2016

Two different projects, two different planning processes, two different authorities...

NDR

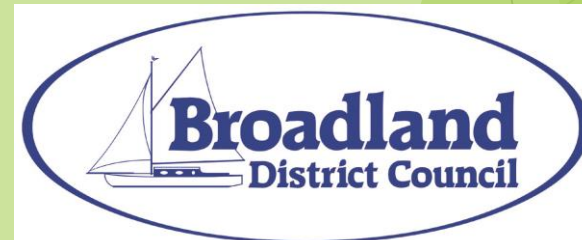
Nationally Significant Infrastructure Project
Development Consent Order



Planning
Inspectorate

Growth Triangle AAP

Local Plan examination
Development Management process



Part 1:

NORWICH NORTHERN DISTRIBUTOR ROAD



FUNDED BY



 Norfolk County Council



INVESTING IN GOOD INFRASTRUCTURE – CREATING REAL JOBS

Balfour Beatty

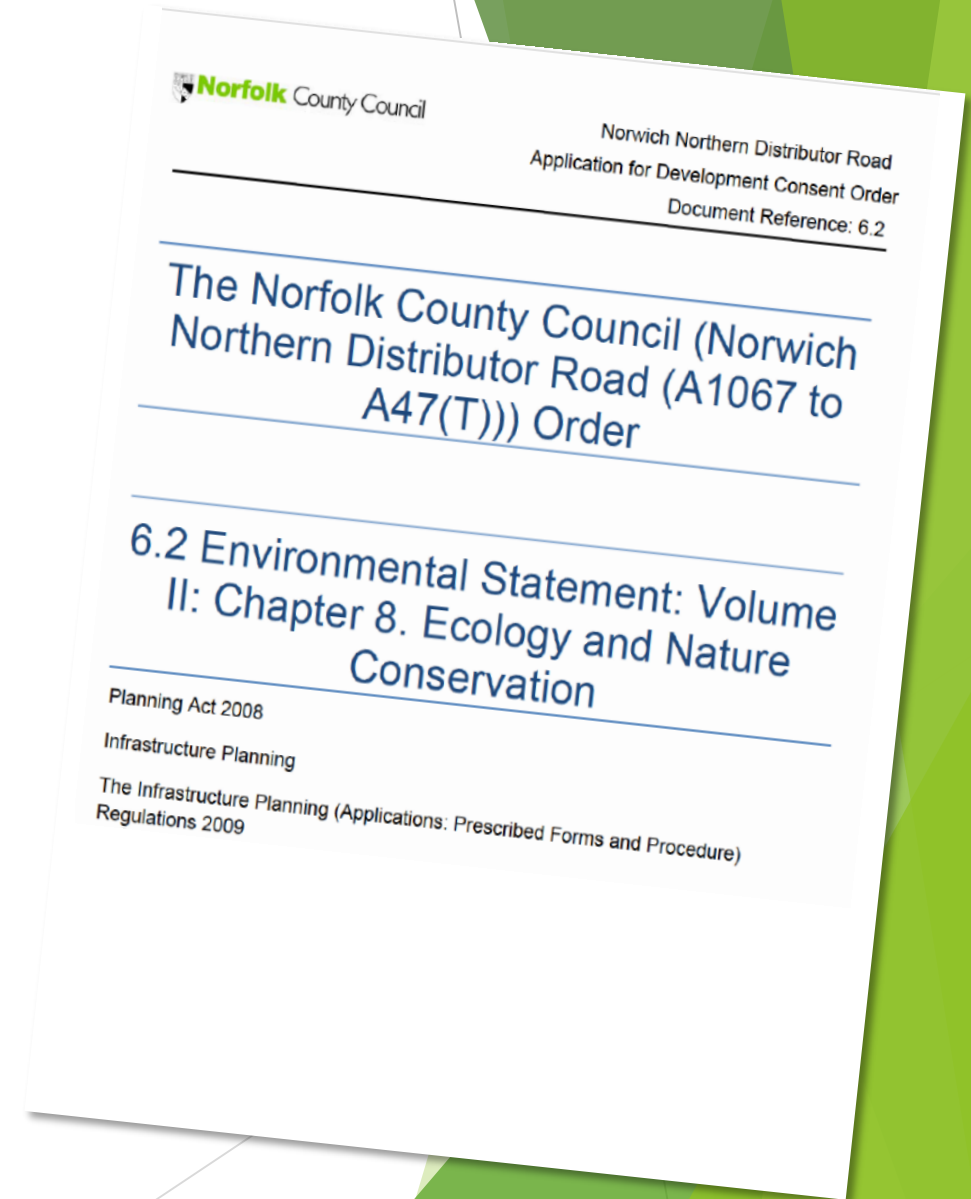


A TRANSPORT FOR NORWICH IMPROVEMENT

Purpose of Bat survey work

As part of the ecological work, bat surveys were undertaken (2006-16) by Mott MacDonald,
To identify

- How bats are using the landscape through which the new road passes,
- Roosts that will be directly impacted by construction,
- Feeding areas directly impacted,
- Most important 'commuting' routes that will be severed by the road.
- Appropriate mitigation



Bat Surveys

Survey methodologies used:

- Hibernation surveys – all structures within 2km of scheme,
- Building assessments – all buildings within 100m,
- Tree climbing inspections of all trees within 25m
- Emergence/re-entry surveys (buildings and trees),
- Transect surveys,
- Unmanned static monitoring,
- Radio tracking surveys (surveys in June 2009, August 2009, August 2012, May 2013, August 2015)



No of roosts located

(specifically as a result of this work)

• Barbastelle	54
• Brown long-eared	29
• Pips Common	7
Soprano	4
Nathusius	1
Un-id Pip	23
• Natterer's	5
• Daubenton's	4
• Noctule	3
• Serotine	2
• <i>Myotis</i> sp.	1



Photo credit: Lotty Packman

Total: 133

Roosts impacted

- 5 tree roosts
 - Common Pip (2)
 - Soprano Pip (1)
 - Brown Long-eared (1)
 - Natterer's (1)
- 2 Building roosts
 - BLE and Common Pip

Compensation

- 56 tree-mounted boxes
- 2 bat 'hotels'



Gazebo Farm
Photo credit: Evelyn Simak under
Creative Common Licence

Barbastelle roosts (1)

54 separate roosts:

- of which at least 14 were maternity roosts
- Most were under flaking/loose bark
- Majority of roosts were 8-10m agl

Of the maternity roosts:

- Roosts were clustered
- Most were in oaks
- Largest maternity roost – min. 59 individuals

Trees were located:

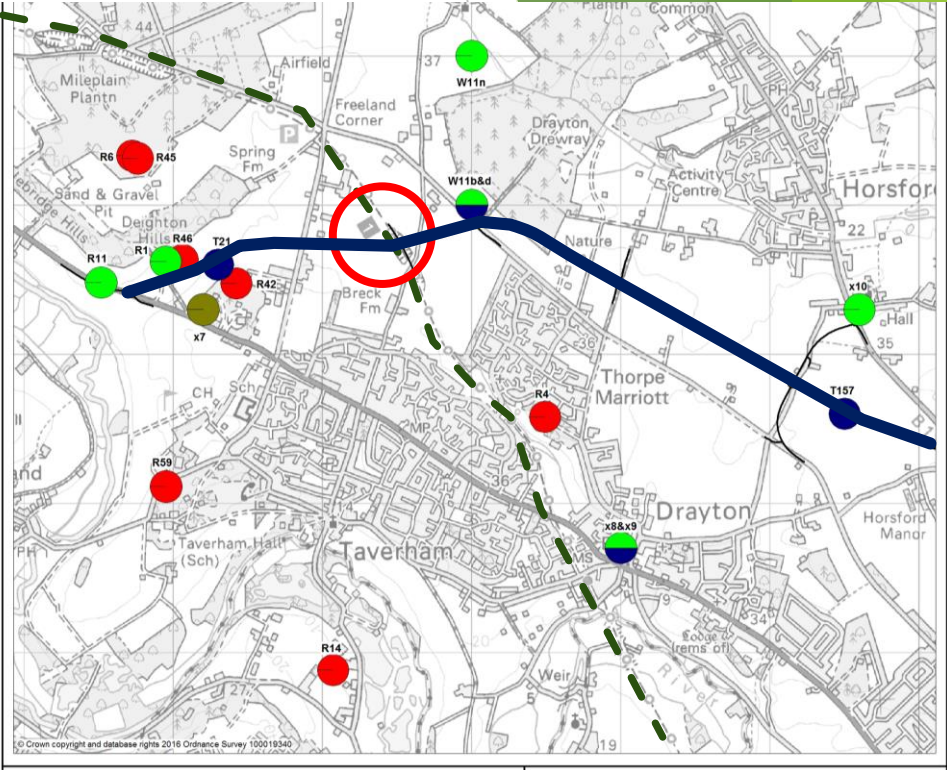
- 1 in an open paddock
- 10 within “parkland” (max c45m into wood)
- 1 in treelines (of veterans)



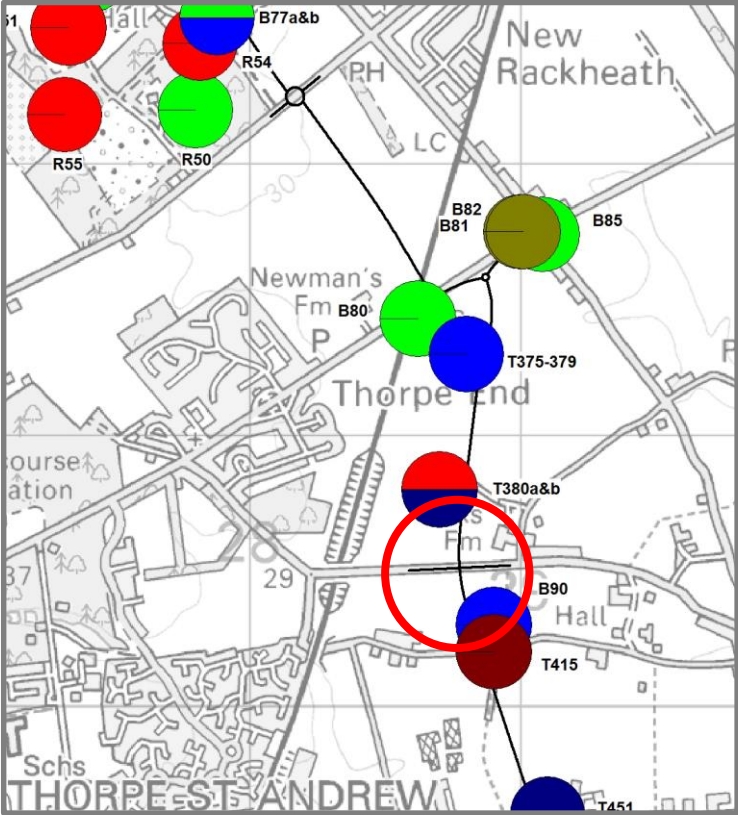
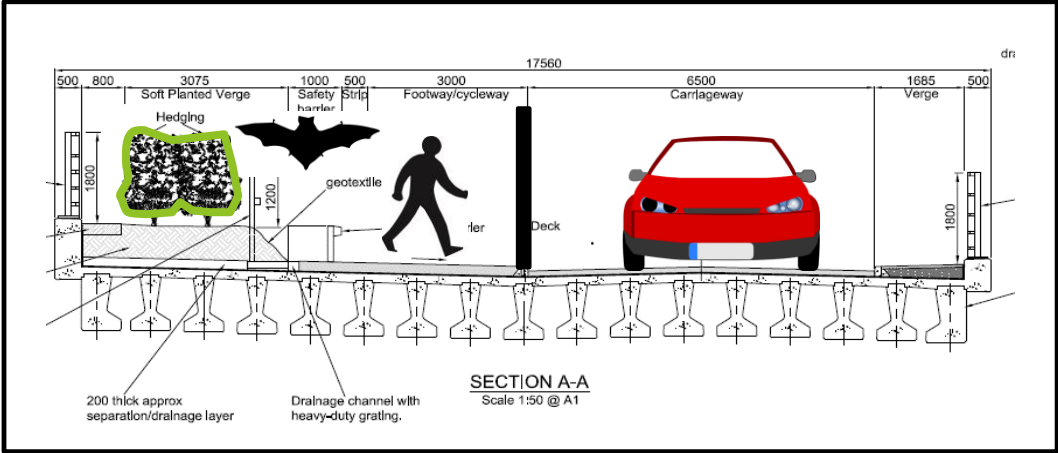
Main “crossing point” No. 1 The Marriott’s Way: Green Bridge



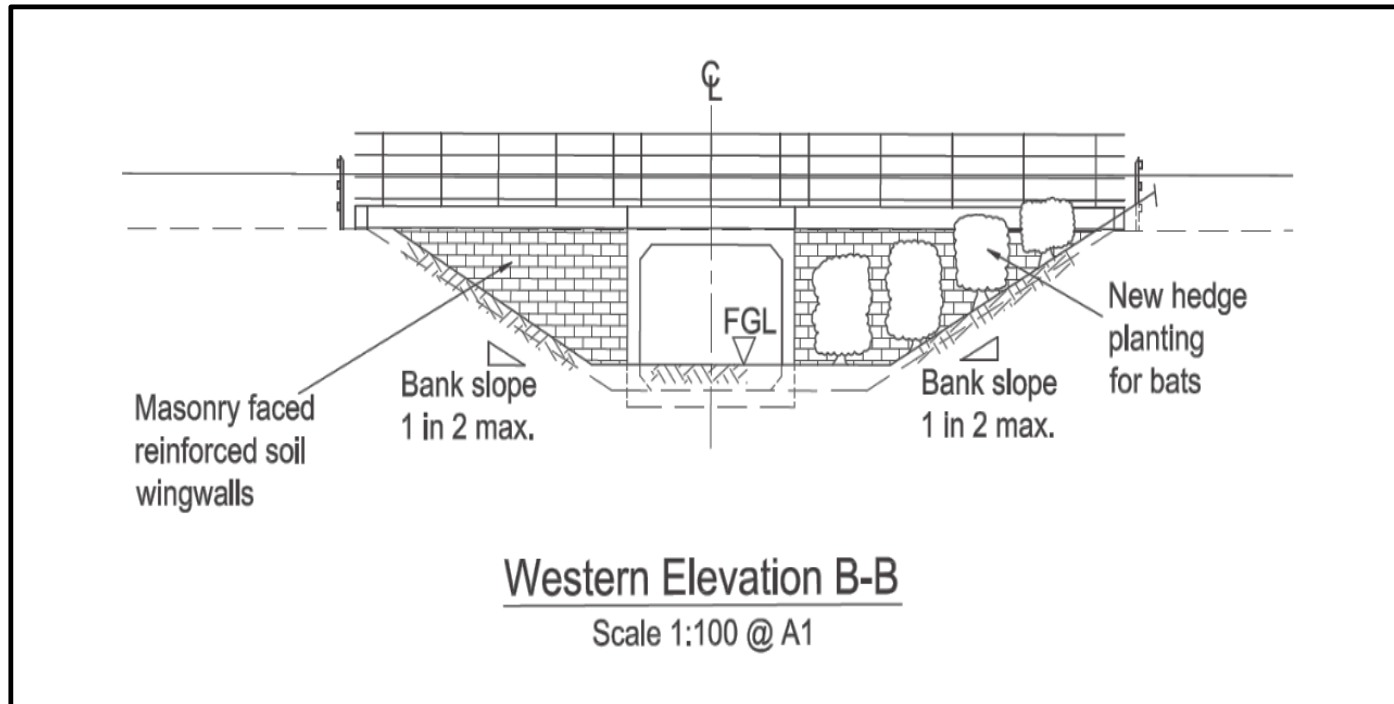
A21 Lamberhurst Bypass
2005 (right) & 2013 (above)



Main “crossing point” No. 2 Middle Road Overbridge: Half-green bridge



Main “crossing point” No. 3 Rackheath culvert



The next 7 most significant crossing points

Bat gantries



Photo credit: ITV Anglia

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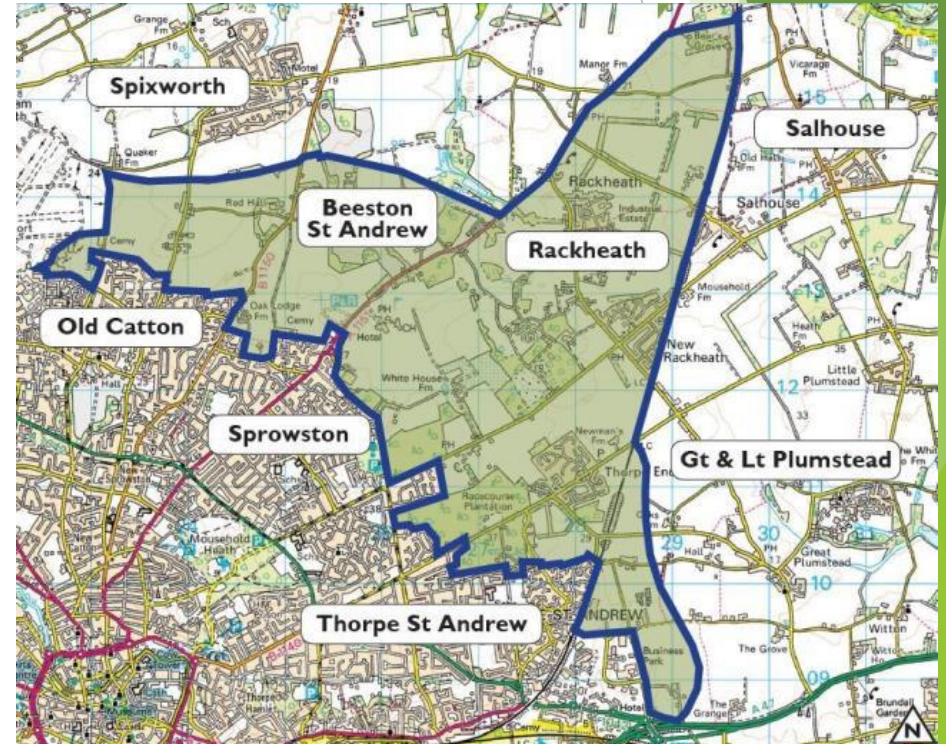
That's just bats: £2million spent on bridges for threatened species - despite proof they almost never use them

New £350,000 bat bridges installed over A11 not working, study reveals

🕒 13:56 23 October 2015 | [Andrew Fitchett](#)

Part 2: The NE Norwich Growth Triangle

Using the bat data generated by the NDR to inform the Area Action Plan for the North-East Norwich Growth Triangle





SPROWSTON PARK

RACKHEATH PARK

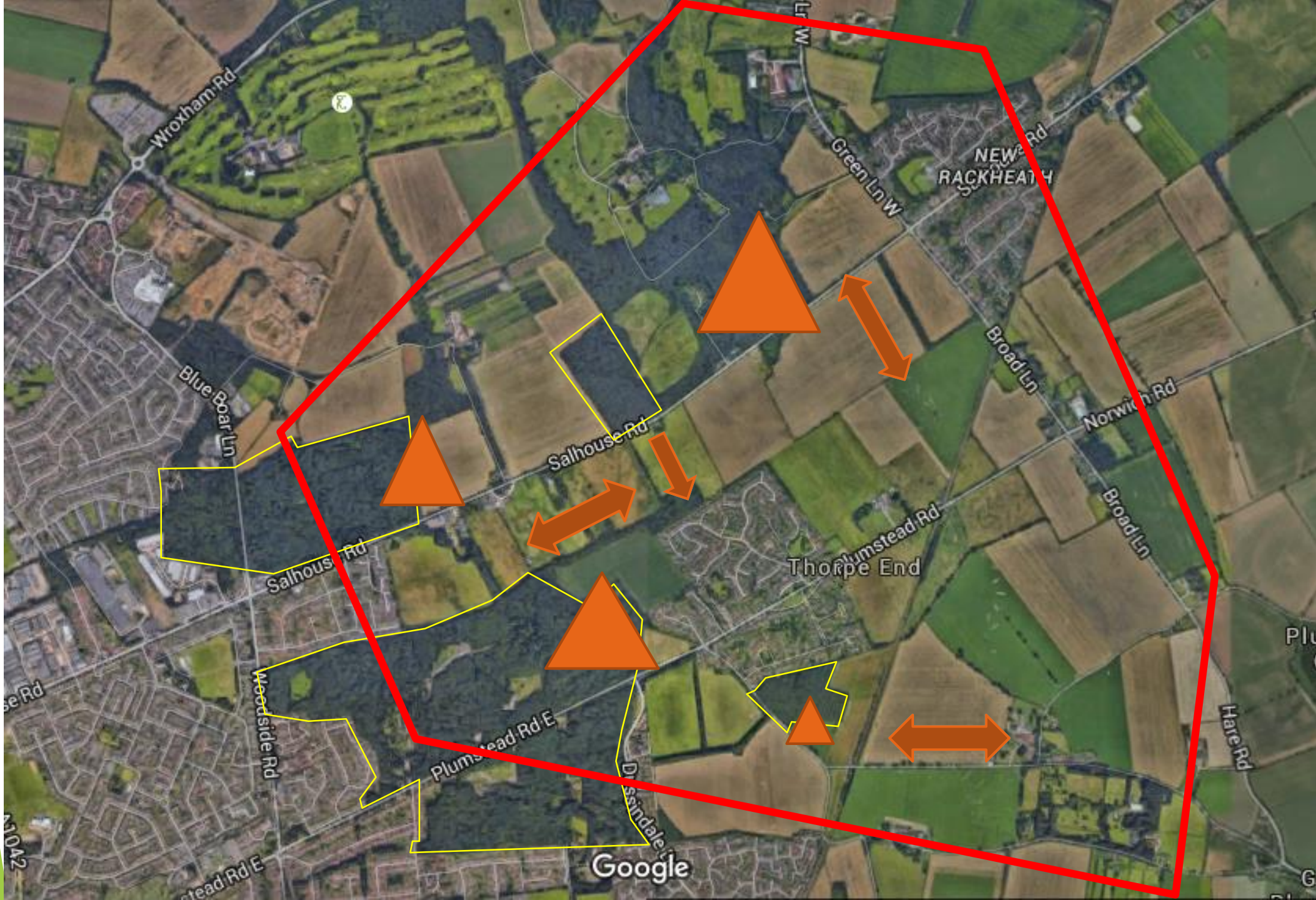
HARRISON'S WOOD

BULMER COPPICE

THORPE WOODS

TRIANGLE WOOD

Google

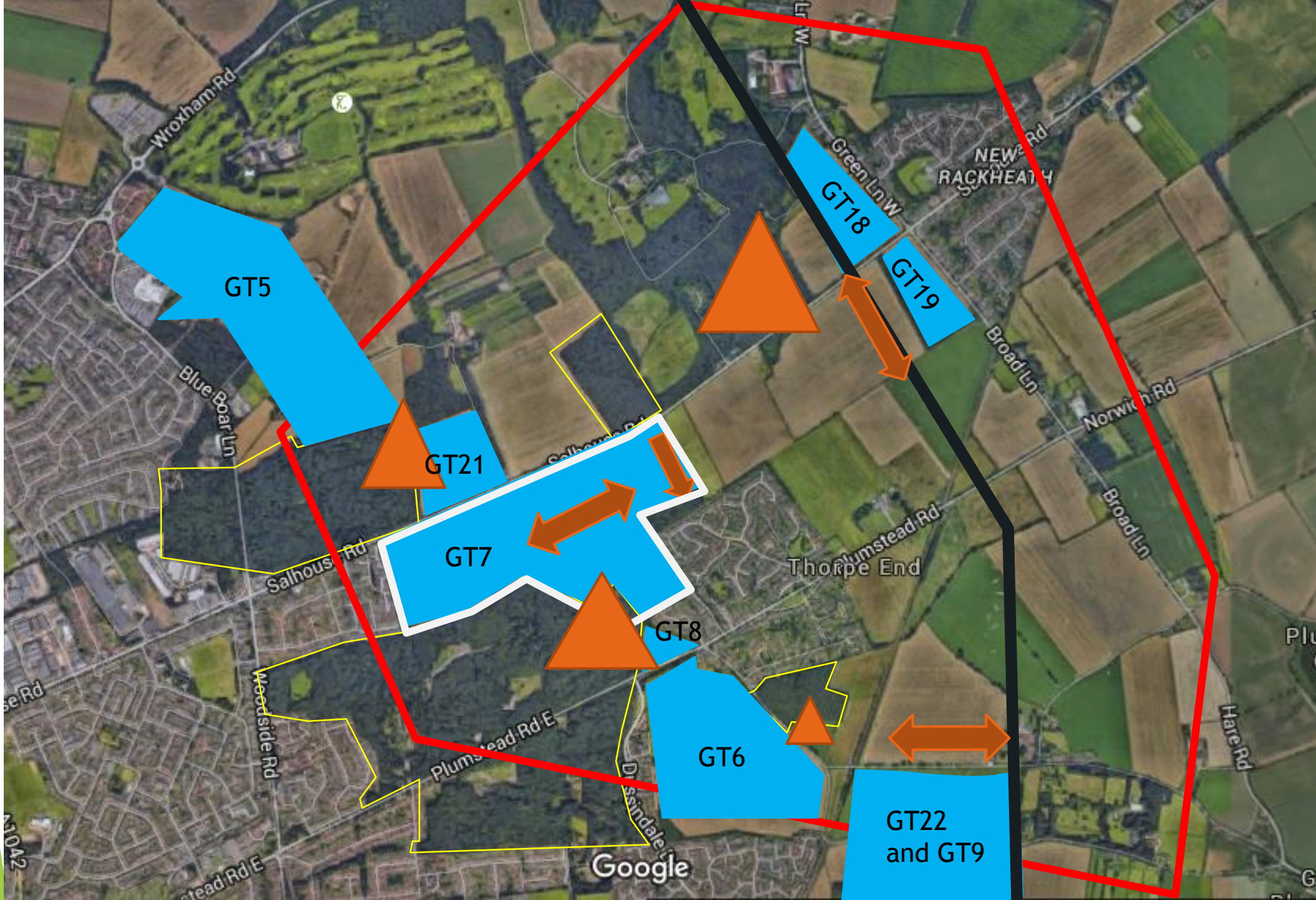


Main feeding areas

Main Commuting routes



Area used by 3 radio tracked Barbastelles



Main feeding areas

Main Commuting routes

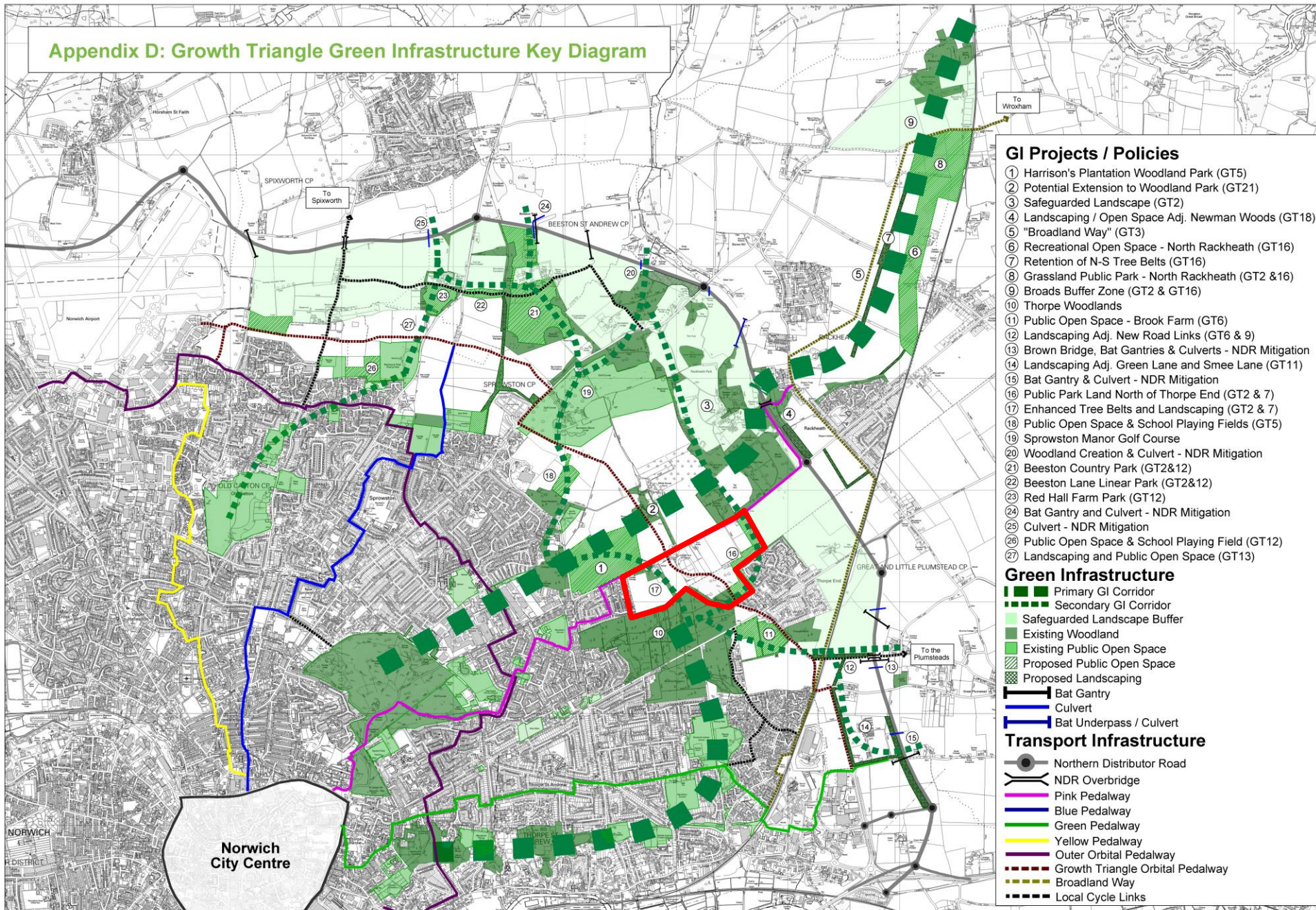


Area used by 3 radio tracked Barbastelles

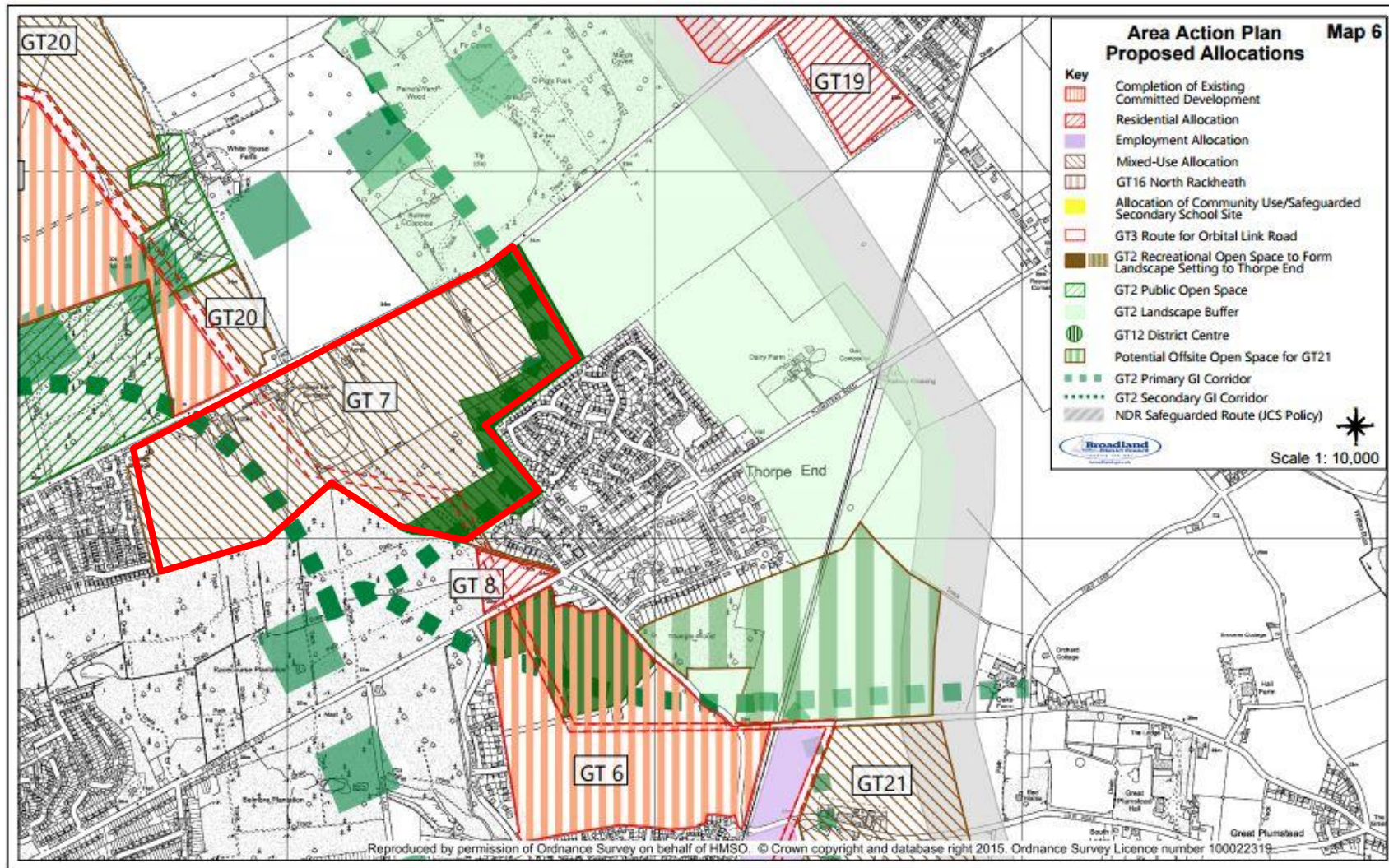
NDR route

WITH SITE ALLOCATIONS FROM AAP

Appendix D: Growth Triangle Green Infrastructure Key Diagram



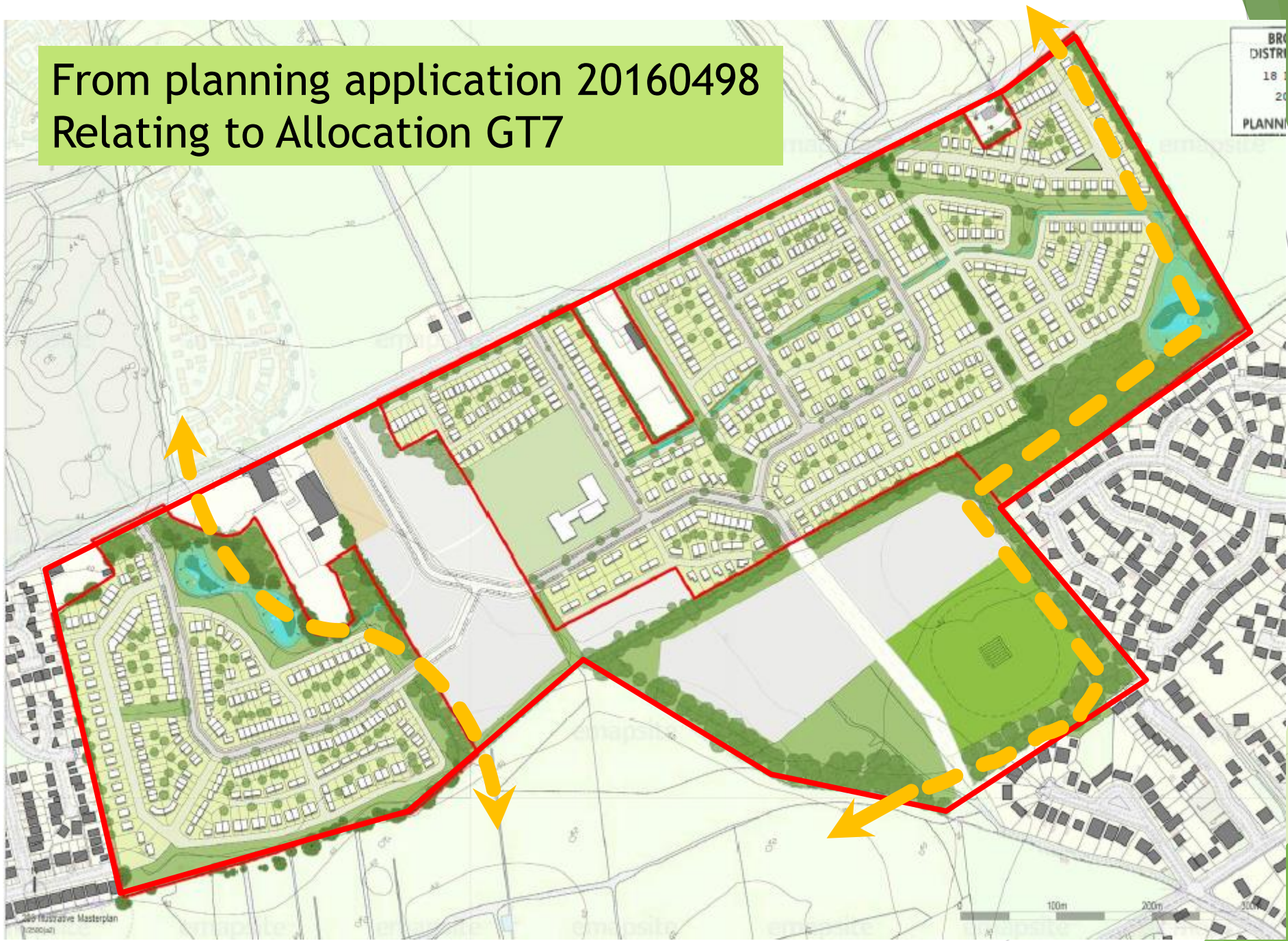
GI STRATEGY
from AAP



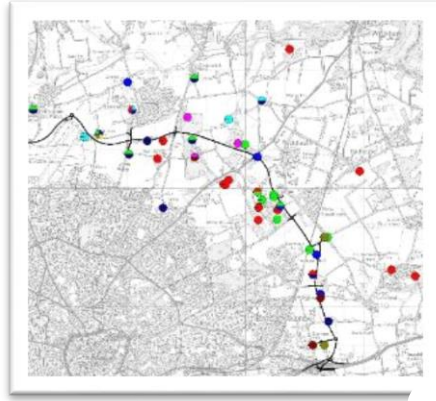
From AAP
Policy GT 7:

> THE DELIVERY OF THE GREEN INFRASTRUCTURE LINKS IN ACCORDANCE WITH POLICY GT2, WHICH SHOULD INCLUDE LINKS BETWEEN THORPE WOODLANDS, HARRISONS PLANTATION AND RACKHEATH PARK.

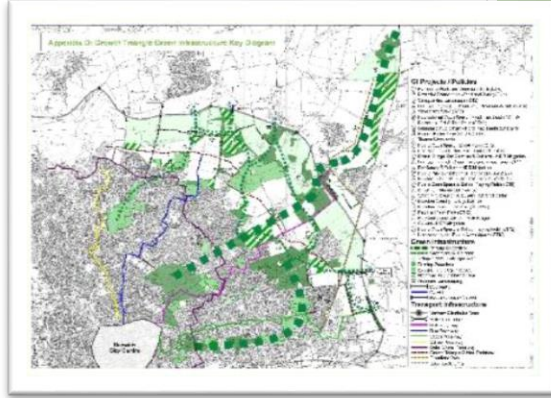
From planning application 20160498
Relating to Allocation GT7



What can we conclude?



Bat Roost & commuting data



Linking NDR mitigation (NCC) with housing (BDC)

Determining Planning application



GI Strategy

Policies for allocations



Growth Triangle Area Action Plan

OUTCOME:
Delivering 13,500 homes and a distributor road....

.... whilst ensuring the viability of population of Barbastelles

