### Wicken Rd UTT/17/2868/OP - Traffic Assessment

by

#### **NEWPORT PARISH COUNCIL**

#### Introduction

Newport is about 1000 houses (974 in 2011 census), with very little employment and what there was has recently been reduced by conversion to housing. The are permissions for another 420 houses with negligible additional employment space, plus this application for another 150 with no employment. The largest employers are the schools and the doctors' surgery, which are almost exclusively staffed by non-residents, which further adds to the traffic.

Newport does not have excellent public transport. It has one bus service, not in the evenings, and not on Sundays. It has no public transport at all to the largest employer, Stansted Airport. The train service is slow stopping trains and the times to London are slower than 20 years ago as priority was switched to services into the airport from the south.

The 150 houses would be separated from the village into the next valley. What this would create is a poorly integrated dormitory estate from which the majority (74% on the applicant's assessment) would drive to work elsewhere, straight into traffic jams, also confirmed by the applicant's TA

Newport has one main road, the B1383, last upgraded in the C18th and when the railway bridge was built. It is crowded with traffic (89,127 vehicles per week – Essex highways survey June 2016) and parked vehicles. The east and west joining lanes are narrow and far below modern highway standard. Apart from estate roads and two passing places there has been no significant road improvement for 150 years. The TA offers no remediation work on the network and concedes that this is not feasible (para 7.28 and 7.29). None of the 420 permissions include any other material highway improvements other than access changes at their sites

The key issues include Wicken Road. It should not be assumed that all traffic is cars and light vehicles. There is all year-round traffic of very large grain carriers as well as other HGVs. A photo of one is in Appendix B

#### Sustainability

A key point of the application is claiming Newport has a good public transport system. This is quoted a as a key factor in the TA summary.

Newport has no direct bus or train service to the airport. It has no fast trains at all, they are all stopping trains, it has one bus service, the 301 – the others are school - not operating in the evenings and no bus at all on Sundays.

The airport is the largest employer in Uttlesford to which Newport has no direct connection.

However, the TA incorrectly says (para 4.37) there is a 2 per hour peak and 1 per hour off peak 10 min duration service to Stansted Airport when there is no service at all

## Housing figures omitted

The correspondence shows that Highways were minded to refuse when shown the traffic consequences of 200 houses. It was reduced to 150. Since then 94 houses and a commercial unit have been permitted, UTT/15/1869/FUL (94) plus UTT/16/2024/FUL (+5). These are covered in para 7.18, and this therefore takes the TA assessments to the worst of the scenarios

The list of committed sites is on the (first) table 7.2. Note it does not say that UTT/16/0459/OP includes 81 flats and bungalows.

Some permissions have been omitted, UTT/17/0396/FUL Chadam House Bury Water Lane (5), UTT/14/3655/FUL Reynolds Court (+10), UTT/15/2574-8/FUL Whiteditch Lane (5). Application UTT/17/2611/FUL Frambury Lane (4) is not in the pending sites on (second) table 7.2. The omitted permissions and applications total 24

Further, the Joyce Frankland Academy is at an advanced stage with an application for 26 houses accessing the narrowest part of Bury Water Lane. Also, the school has now added a year group growing annually to 150 more students, all of which adds to general traffic, which is not factored in at all

The total of omitted permissions, applications and pending applications is 51, which brings the new housing which will feed traffic into the immediate lane network back to the number at which Essex appeared to be minded to refuse

#### Traffic Assessment of the Wicken Rd / High St junction.

The TA PICADY computer model claims current peak morning traffic queue eastbound as only a maximum of 1.7 cars. (The word maximum is in Appendix K). As the capacity of the junction was a clear 'fail' the TA then moved to a different method ('Direct Input') to seek to reduce the calculated current queue to only 1.4 car equivalents. (And therefore to reduce the extent of the calculated junction failure) This is a gross understatement of the reality. Residents have done a four day survey of the junction, see Appendix A.

This shows queues typically twice what is shown in the TA and with peaks going up to 10 vehicles and blocking the access to Church Street. (Please also look at the postings by local residents on the UDC website)

Observation at the junction shows why the PICADY model fails to generate a plausible result.

- 1. Wicken Rd has parked cars on the north side and then the south. There is some restriction by the junction but otherwise restriction cannot be applied as residents have no off-street parking and restrictions would just push them further up without solving the problem. This means westbound vehicles block those seeking to reach the High St. Even when the junction is free, vehicles cannot reach it, and so the regular feed is disrupted and capacity reduced
- Again because of the parked vehicles, those from the south turning into Wicken Rd are caught at the junction. This causes greater tailback on the High St. When the blockage clears, the High St tailback reduces the ability to exit Wicken Rd.
- 3. On the High St there is a pedestrian crossing 3 metres from the Wicken Rd junction. From a safety point of view this a dangerous location. There was a serious incident in 2014, recorded in the TA. When it was installed about twenty years ago a pedestrian was killed within days. However, it is very much on the desire line, giving access from the main part of the village to the pharmacy, post office and shop, and is heavily used. This stops all movement on the High St and therefore most movements at the junction. The PICADY 9 software used by the consultant does allow factoring in of a pedestrian crossing but the TA (p36) does not mention this and it must be assumed it was not done. Such an obvious omission calls into question the integrity of the TA.
- 4. 100 metres to the north of the junction is the car park for the pharmacy and shop. Access is narrow and one lane. Northbound vehicles waiting to turn in block the High St, thus also restricting movement at the junction

- 5. The peak time is set as 8am to 9.30 am. This is incorrect. The peak is 07.45 to 08.45 as evidenced by the Essex Highways 24 x 7 survey on Cambridge Rd in June 2016, data file available. This was also confirmed by the TA for UTT/13/1817/OP para1.23 (b).
- 6. The Essex Highways ATC on Wicken Rd surveyed on 31 October to 6 November 2017 showed weekday average of 26 articulated HGVs (East plus West). As the junction is narrow these stop all traffic on the B1383 and Wicken Rd while they negotiate the junction.

These factors mean the junction model does not reflect reality, and which actual queue counts confirm.

The flawed model, although seriously understating the queue, still shows RFC of 0.92 (0.85 is the point above which junctions cannot cope) and queue delay of 93 seconds - table 7.3.

Further, the TA factors rat running to escape Wicken Rd, down Frambury Lane and School Lane (15% each), para 6.2. There is no evidence given to support this figure, which is used to significantly reduce the impact of extra traffic at the High St / Wicken Rd junction.

The School Lane leg of this is completely implausible. No-one would rat run through the highly congested Bury Water Lane during the school drop off time, or indeed any time as the school is split site and vehicles can wait for extended times at the pedestrian crossing. The afternoon delays along Bury Water Lane start at least an hour before school time as school transports park up early and restrict the Lane to one-way traffic. See photos on Appendix C. Rat running will actually be the other way, making Wicken Rd worse, see below

## Material matters that the TA has omitted or glossed over

## Queues southbound along the High St

There are evening queues southbound along the High St, caused mostly by vehicles waiting to turn right into Wicken Rd. These queues often go back to the Elephant Green junction, which causes rat running through the most sensitive and unsuitable part of the Conservation Area. No current or future queue scenario is published in the TA. This should now be required, starting from observed queue lengths

## Rat running out of the Whiteditch Lane and Bury Water Lane area into Wicken Rd

That area is having 304 more residences (list available), and with the 26 expected at the school, 330. Whiteditch and Bury Water Lanes are not through routes and all access is through the village to the B1383

Rat running to Wicken Rd already happens as locals avoid going through the school. Bury Water Lane is often blocked by school transports, which operate a voluntary one way around the block as they cannot turn easily into Bury Water Lane off Cambridge Rd and cannot pass each other on Bury Water Lane.

The TA relies on the TAs from the major permissions quoting UTT/16/0459/OP and UTT/13/1769/OP.

UTT/13/1769/OP for 84 houses, now Cala, relies on unquantified rat running to Wicken Rd. Bancroft Consulting's TA says:

'It should be noted that our Transport Assessment assumes for robustness that 90% of all development traffic would travel via Bury Water Lane. This assumption is robust as it does not take into account the fact that traffic heading south might be more inclined to travel via School Lane and Wicken Road to reach Cambridge Road (both routes take 2 minutes according to Google Maps). If, as

WSP suggest, the observed issues on Bury Water Lane causes delays and frustration for drivers, it is reasonable to assume that a higher proportion of vehicles would use an alternative route, which would result in fewer additional vehicles on Bury Water Lane itself during busy periods. '

Current evidence for this is the sign at the Cala development telling their vehicles not to use Bury water Lane and use Wicken Rd instead

The Countryside TA claims it uses the TA from UTT/16/0459/OP. This is invalid as it has no TA and relies on UTT/13/1817/OP, an earlier application on the same site. However, UTT/13/1817/OP had a much larger care home and 'assisted living units'. It did not have the 81 flats permitted in UTT/16/0459/OP. The TA for UTT/13/1817/OP was criticised by a consultant for the Joyce Frankland academy as nonstandard, and I can't see how any useful data could be taken from it as claimed by Countryside. There is a failure here to demonstrate evidence.

It is not plausible to factor significant escaping traffic moving towards 300 as yet unbuilt houses with already very poor access, but not to consider the change of behaviour that would trigger and which is not factored into the TAs for those houses and upon which this application relies. If significantly more traffic was to block the Bury Water Lane exit then rat running to Wicken Rd would increase.

The BWL/Whiteditch permissions claim rat running to Wicken Rd to get their applications approved and this application claims rat running the other way to get its application approved.

## Rat running through Church Street and Elephant Green

The residents survey, Appendix B showed rat running northwards averaging 12 per hour. This goes around the grade 1 listed church and into very narrow streets where it is often impossible for vehicles to pass each other. It is a 20 mph zone, but to gain advantage drivers go as fast as they can. It is the most sensitive part of the Conservation Area. Adding substantial further traffic to the Wicken Rd junction will increase existing rat running at peak times and throughout the day, which currently is minimal. If however there is disruption on the B1383 then Church Street and Elephant Green are targetted by rat runners from both ends. There is also southwards rat running in the evening. The longer queues southbound on the High Street will make this worse. This should be assessed

## Frambury Lane / London Rd junction

Initially Essex Highways required an assessment but this was dropped when the application was reduced to 150. The Ellis Trust London Rd application is now approved and their TA admitted the estate access will be too close to the Frambury Lane – London Road – Station Rd cross roads:

Land West of London Road, Newport, Essex

Proof of Evidence of Justin Bass in Relation to Highways Matters, Appeal Reference: APP/C1570/W/16/3166101

Para 5.9 ....I acknowledge that the proposed junction spacing falls below the desirable minimum spacing distances given within the EDG for junctions on the same sides of residential estate roads...'

Further, there was a serious RTA on Frambury Lane on 10<sup>th</sup> November 2017 (which needs to be added to the TA accident logs) between two cars, one ended on its roof. This was at the access off Frambury Lane to the primary school at bridleway 41.

Appendix C shows Frambury Lane in the morning peak. This is the time at which most rat running is predicted. The primary school will need a new year group added to it to receive all the pupils from the developments. This, combined with the Bury Water Lane, Whiteditch Lane and Cambridge Rd developments being very distant for young children, will create substantial extra school run traffic. Most of Frambury lane is a 20 mph zone to protect the primary school. It cannot be acceptable to

deliberately plan to push more through commuter traffic onto this narrow estate road at the exact same time as the school run. It is also the location of the doctors surgery.

As circumstances have changed Essex Highways may now wish to revert to their earlier request for a full analysis of Frambury Lane and the B1383 junction, and also the general impact on Frambury Lane.

#### .Evidence failure

### Use of out of date Local Plan study

The TA references an out dated 2013 UDC report and fails to mention the current one which shows Bury Water Lane and Wicken Rd not flowing properly in the morning peak (not free flow 65 and 75% respectively). (Uttlesford Transport Study 7/10/2016 para 3.4.26, on the UDC website for the Local Plan)

It also shows the High Street not flowing well in the evening, as previously noted and which is not seriously considered in the TA.

Note the UDC assessment does not factor this application or the recently approved 95 houses and commercial unit on London Road, so it will underestimate the problem

#### Automatic Traffic Count on B1038 Wicken Rd

The ATC done by the applicant's consultant is Appendix C in the TA. The date given is just 'July 2016'. The location is given as 'Wicken Road'. The Joyce Frankland Academy term ended on Thursday July 21<sup>st</sup> and the Newport primary school an Friday 22<sup>nd</sup> July. Without knowing the exact dates, the validity of the survey is called into question as it is possible it was done out of term time.

Further, there is independent evidence that the counts are materially understated. Essex Highways did an ATC on Wicken Rd, just inside the 30 mph limit, surveyed on 31 October to 6 November 2017. The TA shows weekday average vehicle count west 1,759, but the Essex ATC shows 1,956, which is 11% more. Eastbound the TA shows 1,745 compared with Essex at 1,998, which is 14.5% more. The TA showed 6 articulated vehicles west and Essex 16.2, and 6 east compared with Essex at 9.8.

Concerning speeds, the Essex ATC shows the highest speeds to be at the weekend, which is excluded from the applicant's TA. The average weekday speed from the Essex ATC west is 31.2 mph and east 30.5 mph. The corresponding figure from the TA is west 33.6 mph and east 38 mph.

The Essex ATC was done about 100m inside the 30 zone and the applicant's survey should have been done at the access, which is about 100m outside the 30 limit. It appears not plausible that vehicles accelerating out of the village into open countryside where the national speed limit applies have only increased speed by 2.4 mph over 200 metres, and similarly coming into the village that they have only slowed by 4.4 mph.

With no indication of exactly where the assessment for the TA was done, and independent evidence casting significant doubt on the reported speeds, it should not be accepted as validating the safety of the access, which is on a bend outside of the 30 limit.

#### Air quality

This is the subject of a paper from Newport Parish Council. A new UDC particulates monitor at the Wicken Road/High St junction showed for Sept 2017 a reading of 36 micro gm per cubic metre. EU rules are for particulates of size PM10 a limit of 40 µg/m3 yearly avge and for PM2.5 25 µg/m3. The Increased traffic shown in the TA will take this over legal limit. In particular as so many more

journeys will start in Newport, these engines will be cold and more polluting as engine management systems run a richer fuel mixture until full working temperature is achieved.

## Land to be donated for Early Years provision

This would access off bridleway 41 which has no known owner. For the London Road application Highways objected to a vehicle access to a new car park for this reason. The lack of ownership was considered fatal and the applicant altered the application, so the matter was never tested. Nothing has changed. The Early Years space is the other side of the same bridleway. So the original highways objections are assumed to stand. These were:

## 4. Bridleway 41 (Newport)

4.1. No evidence is contained within the application to show that the applicant enjoys a private right of way for vehicles over the bridleway 41 (Newport) or has control over sufficient land to provide safe access to the car park for vehicular traffic whilst maintaining safe access for existing users, therefore it has not been demonstrated that this aspect of the application can be delivered.

The proposal is therefore contrary to policies DM1, DM6, DM8, DM11 and DM14 contained within the County Highway Authority's Development Management Policies, adopted as County Council Supplementary Guidance in February 2011.

#### Fragility of the local roads

The 'network' is very fragile. The M11 is closed or has major delays about twice a month and the B1383 is the rat run. Any utility works, incidents, even bin lorry not able to pass a bus or HGV causes tail backs. There being no spare width capacity, or viable alternatives for high volumes of traffic, means any disruption has significant impact.

Extract from the Cambridge news website describing what happens when the M11 is closed: 'Christopher Kidman, from Saffron Walden, who witnessed the crash lorry said: "There was a lot of extra traffic using this route to avoid the M11 closure, and it appears he misjudged the height of his vehicle. "It's certainly not the first time I've seen it happen at this bridge. Whenever there is an incident on the M11 this seems to happen."

http://www.cambridge-news.co.uk/news/bridge-destroys-lorries-newport-railway-12151396

The School Lane – Bury Water Lane junction is subject to flooding. It flooded in April 2012, December 2013, February 2014, August 2016 and January 2016.

The B1383 railway bridge floods frequently as well, causing rat running to avoid it. See Appendix C.

The TA makes no consideration of any of this and the model assumes everything is running perfectly. The level of regular disruption along the B1383 and surrounding lanes should be reviewed and factored in to the conclusion.

## Conclusion

The inability of the TA consultant to read the railway timetable or understand the area being reported on - in the road surveys it repeatedly gets the names of the roads wrong, confusing London Road and High Street - calls into question the reliability of the document and its conclusion. In particular the overloading of a key junction is evidenced in the TA (RFC of 0.92 in table7.3), but not justified, or mentioned, in their favourable conclusion for their client.

The TA has factual errors, omission, failures of evidence and fails to explain its favourable conclusion on unfavourable evidence

- The gueue model results do not match physical evidence
- The TA fails to include parking, a pedestrian crossing and narrow exit to a well used shop car park in the PICADY model
- The TA conclusion ignores its own junction failure evidence
- Fails to consider southbound evening queues
- Fails to consider rat running through the Conservation Area
- Claims sustainability from a non-existent train service
- Claims use of other TA data that does not exist
- Seeks to reduce failure at a key junction by claiming substantial rat running north and south
  off Wicken Rd with no evidence. The 'viability', and consequences, of such rat running is not
  established
- Omits a number of planning consents from the calculations
- Fails to consider rat running into Wicken Road from 300 new residences
- Does not publish exactly where and when the ATC site access survey took place.
   Independent professional evidence from Essex Highways shows the volumes quoted to be materially inaccurate and the reported speed understated
- Quotes an out of date UDC Transport Assessment for the Local Plan when a more recent, less favourable one showing problems, is available
- Does not consider the fragility of the B1383 and surrounding lanes

The TA concedes that there is nothing which can be done to improve Wicken Rd or the junction and no highway remediation of any sort is proposed, by this application or any other. Severe disruption would be caused to the local road network.

The application is therefore contrary to NPPF 32, UDC policy GEN1 and Essex policy DM15

#### Policy

UDC Local Plan 2005 Policy GEN1 - Access - states:

Development will only be permitted if it meets all of the following criteria:

- a) Access to the main road network must be capable of carrying the traffic generated by the development safely.
- b) The traffic generated by the development must be capable of being accommodated on the surrounding transport network.
- c) The design of the site must not compromise road safety and must take account of the needs of cyclists, pedestrians, public transport users, horse riders and people whose mobility is impaired.
- d) It must be designed to meet the needs of people with disabilities if it is development to which the general public expect to have access.
- e) The development encourages movement by means other than driving a car.

NPPF para 32 – Sustainable Transport – states:

All developments that generate significant amounts of movement should be supported by a Transport Statement or Transport Assessment. Plans and decisions should take account of whether:

- the opportunities for sustainable transport modes have been taken up depending on the nature and location of the site, to reduce the need for major transport infrastructure;
- safe and suitable access to the site can be achieved for all people; and
- improvements can be undertaken within the transport network that cost effectively limit the significant impacts of the development. Development should only be prevented or refused on transport grounds where the residual cumulative impacts of development are severe.

Essex Development Management Policy DM15 – Congestion – states

The Highway Authority will protect the safety and efficiency of the public highway by: i. requiring the developer to demonstrate that the development proposal has no detrimental impact upon the existing or proposed highway in congestion terms, as measured by assessing existing and proposed link/junction capacity relevant to the development site; or ii. requiring the developer to provide appropriate mitigation measures to ensure that there is no detrimental impact to the existing highway.

**END** 

## **Appendices**

- A Wicken Road queue counts 2<sup>nd</sup> to 7<sup>th</sup> November 2017
- B Wicken Road queue photographs
- C Bury Water Lane photographs
- D Frambury Lane photographs

# Appendix A

Count of waiting stationary vehicles east bound on Wicken Rd

Location: Wicken Rd / High St junction, Newport

Date Thursday 2nd November 2017
Observed by Derrick Giffin and Neil Hargreaves

Church St rat running northbound over 1 hour was 16 cars

Time am	Car equivalents
7.45	8
7.48	4
7.44	7
7.54	3
7.56	4
7.57	4
7.58	7
7.59	6
8.05	6
8.06	3
8.07	3
8.08	4
8.13	5
8.16	3
8.17	5
8.18	5
8.19	3
8.21	2
8.22	2
8.23	4.5
8.24	9.5
8.25	8.5
8.26	10
8.27	5
8.28	5
8.29	6
8.30	5
8.31	4
8.32	3
8.33	5
8.34	4
8.35	3
8.35	4
8.36	5
8.37	5
8.38	2.5
8.40	5
8.41	8
8.42	9
8.43	4
8.44	2
8.45	7

# Count of waiting stationary vehicles east bound on Wicken Rd

Location: Wicken Rd / High St junction, Newport

Date Friday 3rd November 2017

Observed by Derrick Giffin and Joanna Chivers

Church St rat running northbound over 1 hour was 7 cars

Time am	Car equivalents
7.45	. 7
7.48	3
7.49	5
7.52	4
7.55	4
7.59	3
8.00	3
8.05	5
8.08	9
8.09	6
8.10	10
8.13	5
8.16	7
8.20	6
8.22	5
8.23	10
8.24	6
8.25	8
8.26	7
8.27	5
8.28	10
8.29	9
8.30	8
8.31	4
8.33	4
8.38	3
8.39	4
8.43	6

Count of waiting stationary vehicles east bound on Wicken Rd

Location: Wicken Rd / High St junction, Newport

Date Monday 6th November 2017
Observed by Joanna Chivers and Sandra Amos

Church St rat running northbound over 1 hour was 9 cars

Time am	Car equivalents
7.45	3
7.48	4
7.51	3
7.56	3
7.57	3
8	5
8.01	3.5
8.03	3
8.04	5
8.05	3
8.08	3
8.1	5
8.11	5
8.12	6
8.13	8
8.14	4
8.17	4
8.19	3
8.21	4
8.22	4
8.28	4
8.29	7
8.3	4
8.33	4
8.35	6
8.36	8
8.38	9
8.4	8.5

## **Observations**

Perhaps less busy today than Thursday but maybe due to a frosty morning/Monday. There was a snarl up very late in the hour when two large articulated lorries met half way up Wicken road. Caused a few problems – there was an ambulance with lights behind the lorry coming down the road which added to the drama. Pics below. Once the lorries had cleared the traffic moved on quite quickly which is why the traffic goes from 8.5 at 8.40 to not enough to be recorded from them until 8.45.

# Count of waiting stationary vehicles east bound on Wicken Rd

Location: Wicken Rd / High St junction, Newport

Date Tues 7th November 2017

Observed by Lorna Ward and Neil Hargreaves

Church St rat running northbound over 1 hour was 16 cars

Time am	Car equivalents
7.45	. 4
7.46	3
7.47	2.5
7.48	5
7.49	7
7. <del>4</del> 3 7.52	6
7.53	5
7.53 7.54	7
7.54 7.56	2
7.50 7.57	2
	6
8.00	
8.01	2 5
8.03	
8.04	3
8.05	2
8.06	3
8.07	4
8.08	4
8.09	3
8.10	4
8.11	5
8.12	5
8.13	2
8.15	3
8.20	5
8.21	3
8.22	4
8.24	3
8.25	2
8.26	4
8.27	3
8.28	8
8.29	3
8.30	4
8.31	8
8.32	9
8.33	9
8.35	5
8.37	3
8.38	5
8.39	4
8.40	4
8.42	6
8.43	5
8.45	4
0.43	4

Passenger Car 1.0 Light Goods Vehicle (LGV) 1.0 Medium Goods Vehicle (MGV) 1.5 Buses & Coaches 2.0 Heavy Goods Vehicle (HGV) 2.3

Appendix B

Wicken Rd – High St Junction 07.45 – 08.45



Seven car queue plus rat runner entering Church Street 0800 31 Oct







7<sup>th</sup> November 08.39



High St looking south 08.33 7<sup>th</sup> November







08.26 7<sup>th</sup> November



One of the many school transports to JFA which operate a voluntary one way system as they cannot pass each other on Bury Water Lane



 $31^{\rm st}$  October 08.02 showing how westbound vehicles stop vehicles reaching the junction thus reducing its capacity









Grain carrier

## Appendix C - Evening school transports Bury Water Lane

This is shown in the TA as the rat run for 15% of the peak Wicken Rd traffic



Included in the 300 permitted houses to be built which will use this route, are 10 which will access directly on to where these photos are taken plus 26 awaiting application at the Cambridge Rd end of Bury Water Lane





The bus and the car are both parked





Flooding 7<sup>th</sup> February 2014, School Lane/ Bury Water Lane junction





B1383 at railway bridge

Appendix D - Morning Frambury Lane



08.40 near the primary school



Looking east towards London Rd



Looking south towards primary school



The location of the RTA mentioned in the text



There are cars parked all along Frambury Lane at all times. A UDC housing development will remove the only public off street parking. It is one vehicle at a time at all times of the day.



Parents drive past the school to the recreation ground car park and then back out, which doubles the congestion as there is no option to drop off and drive straight on.