

Examination of the Mid Sussex Local Plan 2021-2039 Matters, Issues and Questions (MIQs)

Matter 4: Transport National Highways' Statement Respondent Ref: 1191183

Statement Introduction

1. National Highways has been appointed by the Secretary of State for Transport as a strategic highway company under the provisions of the Infrastructure Act 2015 and is the highway authority, traffic authority and street authority for the Strategic Road Network (SRN). In respect of the Mid Sussex District Local Plan, the SRN consists of the A23 and M23.
2. National Highways have been involved with the development of the 2021-2039 Local Plan evidence base for some time.
3. National Highways' primary concern is the continued safety of those that use our network. Congestion is also a concern, but we recognise that on its own this results in inconvenience to the road user and as set out in NPPF, unless the residual cumulative effects of development are severe, congestion would not be a reason to prevent development on highways grounds.
4. It should be borne in mind that the Local Plan is required only to address the impacts on road safety and congestion which are caused by the plan. The plan is not required to also address pre-existing issues.
5. We have been in extended on-going dialogue with Mid Sussex District Council (MSDC) and their transport advisors Systra for a significant period of time. Over

the last few months, we have advised MSDC specifically on the merge and diverge assessment requirements using the outputs from the transport model forecasts. Merges and diverges are sections of highway at grade-separated junctions where traffic joins or exits the mainline carriageway.

6. Merge diverge assessments received in July 2024 indicated the need for improvements to a significant number of junctions on the A23 and M23 to support the planned growth. Further merge and diverge assessment evidence was supplied in August 2024 which was based on lower traffic flow forecasts. However, the outcomes still pointed to the likely requirement for significant mitigation at various merges and diverges along the A23 and M23 to accommodate all development associated with the Plan.
7. At our last meeting with MSDC and their transport consultants on 3rd September 2024 we advised about the need to include the residual impacts of the Covid pandemic on long-term commuting and overall travel patterns that had been omitted from the work to date. National Highways have since received the latest iteration of assessment evidence on 24th September 2024 and is currently reviewing the assessment to determine whether this indicates any change to the mitigation requirements of the plan in so far as the SRN is concerned. The latest evidence (Doc. Ref. T11) is dated 20 September 2024 and consists of 197 pages of text and graphics. The conclusion of the assessment (paragraph 5.2.7 of the report) is that five slip road merges/diverges on the A23 trigger the need for an upgrade due to the traffic impacts of Scenario 6m2.
8. It is our intention to expedite our consideration of the additional data presented and MSDC's interpretation of that data so that this conclusion can either be corroborated or alternative conclusions reached. We will update the Inspector on our position as soon as is practicable.
9. Against this background, we have provided below, brief responses to those questions relating to matter 4 which are directly relevant to NH's position.

Q44. Is the Plan consistent with Circular 01/2022 Strategic Road Network and the Delivery of Sustainable Development and paragraphs 104- 109 of the Framework? How has the Council considered transport issues from the earliest stages of plan making and development proposals particularly given that opportunities to maximise sustainable transport solutions may vary between urban and rural areas?

10. The Local Plan has been prepared generally in accordance with the DfT Circular 01/2022 requirements including consultation and agreement with National Highways in relation to the assessment methodology for the cumulative impacts of the development proposals. Dialogue between (MSDC) and National Highways has been ongoing since 2021. However, the process is currently incomplete as mitigation requirements or alternatives to mitigation have not yet been agreed and costed. Further details are provided below.
11. Paragraph 33 of Circular 01/2022 states the need *“to present a robust transport evidence base in support of its plan or strategy. The company can review measures that would help to avoid or significantly reduce the need for additional infrastructure on the SRN where development can be delivered through identified improvements to the local transport network, to include infrastructure that promotes walking, wheeling, cycling, public transport and shared travel. A robust evidence base will be required, including demand forecasting models, which inform analysis of alternatives by accounting for the effects of possible mitigation scenarios that shift demand into less carbon-intensive forms of travel.”*
12. This has involved agreement on an assessment methodology including assumptions about measures that can be included to reduce travel demand by private cars due to sustainable travel measures, home working and internalisation of trips within mixed developments.
13. Our Regulation 19 representation outlined the potential requirements for physical mitigation to the A23 to safely accommodate the Local Plan development, in the

absence of sufficient alternative means of providing for transport needs. Paragraph 43 of Circular 01/2022 states “*Local planning authorities and development promoters are encouraged to identify any potential impacts on the SRN that may result from development proposals and discuss them with the company at the earliest opportunity*”.

14. Paragraph 34 states “*The company’s engagement with plan-making will help inform the preparation of the local authority infrastructure delivery evidence base. From a transport perspective, this evidence should provide a means of demonstrating to the examining inspector, development industry and local communities that planned growth is deliverable, and that the funding, partners and relevant processes are in place to enable the delivery of infrastructure; or that there is a realistic prospect that longer term investment can be secured within the timescales envisaged.*”
15. Based upon the various transport modelling outcomes between the Regulation 19 submission and August 2024, the additional traffic volumes forecast in the Local Plan scenarios at 2039, caused the A23, from M23 Junction 11 to Pyecombe, to operate with flows in excess of existing design standards at many of the merges and diverges along its length, that is, beyond their design capacity as defined in the Design Manual for Roads and Bridges CD122 – “Geometric design of grade separated junctions”. Varying by location, this would be either due to
 - a) the additional traffic volumes forecast to be generated by the Local Plan development allocations or
 - b) in some cases this would occur in the absence of the Local Plan and the traffic volumes forecast to be generated by the Local Plan development allocations would exacerbate pre-existing issues.
16. CD122 (Paragraph 3.8) states that flows in excess of design standards often result in decreasing levels of service and safety. For example, at substandard

merges safety risks are heightened when the gaps between moving vehicles become smaller with increasing volumes of traffic and this may lead to vehicles forcing their way into smaller gaps, causing sudden braking at high speed on the main carriageway and the increased risk of vehicle shunts. This can lead to flow breakdown on both main carriageway and slip road, stop-start traffic tailing back from the merge and high-speed traffic approaching standing traffic at the rear of the queue. At substandard diverges, with increasing traffic volumes above design standards and smaller gaps between vehicles on the main carriageway, traffic wishing to leave will have increasing difficulty moving into the nearside lane, similarly leading to increased risk of vehicles braking at high speed and resulting in standing or stop-start traffic on the main carriageway with high speed traffic often breaking suddenly on arrival at the back of the queue.

17. The recent merge and diverge assessments presented in the August 2024 report show that at several locations there are forecast to be significant additional Local Plan related traffic sufficient in National Highways' judgement to have the potential to pose new safety risks in some locations or additional safety risk in others. It was however apparent that the assessment methodology potentially overestimated the future traffic forecasts. The latest assessment (doc. Ref. T11) now highlights five locations where Local Plan related traffic results in traffic flows exceeding merge/diverge design capacity. We have not however had sufficient opportunity to consider the latest information and an update will be given prior to the examination.

Q46. Is the transport evidence which supports the submission plan including any assumptions, such as home working rates, robust, justified, and is it consistent with national policy?

18. We are content that the transport evidence within the submission Local Plan has been based upon assumptions that we have accepted as reasonable. The

evidence has been produced using transport models and methodologies consistent in standard with comparable Local Plan evidence bases.

19. In our judgement the evidence produced for the submission Local Plan to date has been consistent with national policy. However, the evidence was incomplete as it pointed towards likely mitigation requirements without additional evidence to demonstrate how additional traffic can be accommodated on the strategic road network or can be further managed down to acceptable levels.
20. As stated previously we are reviewing new evidence and intend to update the Inspector and examination as soon as is practicable.

Q.48 What mechanisms would be required to achieve the proposed improvements set out within the individual allocations and would they be enough to prevent the transport impacts identified? Would the delivery of the sites be viable so as to be able to support the required mitigation requirements over the long term? Is the cost of any mitigation requirements reflected in the VA. Moreover, would these sites become genuinely sustainable, or given their locations, would they remain heavily reliant on the private car? For example, I note that the cycle routes within the identified Sustainable Communities sites would only lead to a reduction in highway traffic of 1-2%?

21. The Submission Local Plan Review contains policies covering individual allocations and their infrastructure requirements. Some of the transport measures, for example walking, cycling and public transport improvements have been taken into consideration as sustainable measures influencing (reducing) the demand for vehicular transport. These have been used to justify reductions in vehicular demand in the strategic transport modelling looking at the cumulative impacts of the Local Plan on the road network.
22. The cost of necessary mitigation for the A23 or M23 has not yet been determined.

Q49. National Highways is clear that Road Investment Strategy (RIS) funding would not be available. What certainty is there that sufficient mitigation would be capable of being achieved either through the reduction of private car journeys or funded highway improvements? How could the ‘monitor and manage’ approach be integrated into the Plan and how would it impact on its deliverability?

23. There is no certainty that sufficient mitigation can be achieved through the reduction of private car journeys, this has not been demonstrated through evidence. The strategic modelling has taken into consideration the measures within the Plan aimed to reduce car journeys based around public transport and sustainable travel measures. Taking these measures into account, forecast 2039 traffic flows from strategic modelling evidence has indicated that many of the merges and diverges on the A23 and M23 will operate with flows in excess of what they are designed to safely accommodate, with the Local Plan scenarios adding significant traffic volumes, increasing safety risks at a number of locations. As previously explained, the scope and cost of necessary mitigation on the A23 and M23 is yet to be agreed.
24. Should it be the case, following our review of the 20th September evidence (T11), that highway improvements to the M23 and/or A23 are still required, a mechanism will need to be identified to ensure that necessary highway interventions are in place ahead of the development that triggers the relevant need.
25. A Monitor and Manage approach could be adopted to refine the mitigation strategy for the Local Plan, in so far as the A23 and M23 are concerned. Such a strategy would react to observed changes of travel behaviour and travel demand. Such an approach may include further modelling assessment at locations where safety risk has been identified, reasonably detailed designs, and sufficient additional evidence to ensure the safety of any proposed modifications to the network.
26. The Monitor and Manage approach would require the cumulative impacts of the

Local Plan to be re-assessed at intervals throughout the plan period, forecasting likely conditions over a shorter timeframe using updated base data from the monitoring process. Such a process would aid delivery of development within the Local Plan subject to the agreement of the details.

27. Monitor and Manage mechanisms have the advantage of identifying the real future mitigation requirements based on actual changes in travel behaviour, rather than relying on forecasts based on the continuation of historic travel demands over lengthy periods. There remain some uncertainties with this approach, but:

- It is recognised that growth will not stop in the absence of the Local Plan.
- An agreed, well-structured monitor and Manage approach gives an opportunity to develop and deliver a transport strategy which is coherent across all modes and which enables growth and transport infrastructure to move forward together in a timely fashion. In the absence of an up-to-date Local Plan, this opportunity would be lost and the delivery of necessary infrastructure will be challenging.

Q50. Taken together, are the policies of the Plan including the site allocations and policies DPT1; Placemaking and Connectivity, DPT2: Rights of Way and Other Recreational Routes; DPT3: Active and Sustainable Travel together with DPI1: Infrastructure Provision; DPI2: Planning Obligation; DPI3: Major Infrastructure Projects and DP18: Viability justified, effective and consistent with national policy in relation to transport so as to avoid an unacceptable impact on highway safety? Would they ensure that the residual cumulative impacts on the road network would not be severe? How would the Infrastructure Delivery Plan be effective in supporting the above policy requirements? 51. Are any main modifications necessary for soundness, if so, why?

28. The policies of the Plan do not include any reference to required mitigation for the A23 and M23 that have been identified from evidence supplied in the submission Local Plan. While the policies may be partially justified, effective and

consistent with national policy in terms of their content they fall short of covering all requirements for the Local Plan as a whole so would not be effective nor consistent with national policy. The evidence shows that a number of improvements to the A23 and M23, specifically at the merges and diverges will be required to ensure that an unacceptable impact on highway safety can be avoided. As mentioned previously, we are reviewing further evidence that has recently been received and we will update the Inspector as soon as is practicable on the extent of mitigation necessary on the SRN.

29. The above listed policies within the Local Plan are useful tools to assess the transport impacts of individual developments when applications come forward. They include provisions to implement sustainable measures and further transport mitigation where appropriate based upon the individual assessment of each development. Local Plan Policy DPT1 requires allocated sites to prepare a transport assessment for their own developments, Policy DPI1 requires developers to implement required infrastructure to accommodate their development in a timely manner. Policy DPI2 covers planning obligations for each development individually for highways and traffic improvements.
30. To ensure there would not be an unacceptable impact on highway safety , the Infrastructure Delivery Plan could be made effective by including mitigation requirements, either network improvements or alternative measures designed to reduce vehicular transport, where severe operational or unacceptable safety impacts are identified. This would need to be updated once the ongoing review of the latest merge and diverge assessment work is completed and could be incorporated into a Monitor and Manage process.
31. The proposed Main Modifications to policy DPT1 and supporting text are necessary for the purpose of ensuring that unacceptable highway safety impacts do not arise.
32. However, we believe that Main Modifications to Policy DPT1 need to go further to state that a Monitor and Manage approach will be developed and agreed with

the highways authorities. This will ensure that the mechanism is suitable to monitor and manage relevant impacts and meet the required needs on the road network.