

# Environment Overview and Scrutiny Committee



SOUTH  
KESTEVEN  
DISTRICT  
COUNCIL

Tuesday, 10 December 2024 at 10.00 am  
Council Chamber - South Kesteven House, St. Peter's Hill,  
Grantham. NG31 6PZ

**Committee Members:** Councillor Ian Selby, Vice-Chairman of the Council (Chairman)  
Councillor Emma Baker (Vice-Chairman)

Councillor Harrish Bisnauthsing, Councillor Steven Cunnington, Councillor Barry Dobson, Councillor Gloria Johnson, Councillor Paul Martin, Councillor Mark Whittington and Councillor Paul Wood

## Agenda

This meeting can be watched as a live stream, or at a later date, [via the SKDC Public-I Channel](#)

- 1. Public Speaking**  
The Council welcomes engagement from members of the public. To speak at this meeting please register no later than 24 hours prior to the date of the meeting via [democracy@southkesteven.gov.uk](mailto:democracy@southkesteven.gov.uk)
- 2. Apologies for absence**
- 3. Disclosure of Interests**  
Members are asked to disclose any interests in matters for consideration at the meeting.
- 4. Minutes from the meeting held on 7 October 2024** (Pages 3 - 14)
- 5. Updates from the previous meeting** (Page 15)  
To consider actions agreed at the meeting held on 7 October 2024.

6. **Announcements or updates from the Leader of the Council, Cabinet Members or the Head of Paid Service**
7. **Garden and Bulky Waste Collections - Fee Proposal** (Pages 17 - 23)  
To consider the impact of changing the pricing structure for garden and bulky waste collections.
8. **Corporate Plan 2024-27 Key Performance Indicators: 2024/25 Mid-Year (Q2) Report** (Pages 25 - 33)  
This report outlines South Kesteven District Council's performance against the Corporate Plan 2024-27 Key Performance Indicators (KPIs) from July-September 2024.
9. **Green Fleet Strategy Update** (Pages 35 - 69)  
To provide an update on the initial draft of the Green Fleet Strategy.
10. **Waste Policy Update** (Pages 71 - 94)  
To provide an update on the amended Waste Policy document.
11. **Air Quality Annual Update** (Pages 95 - 200)  
To provide Environment Overview and Scrutiny with the annual update on Air Quality within the district.
12. **Tree and Woodland Strategy Work Programme 2025 - 2034** (Pages 201 - 204)  
To seek the support of the Environment Overview and Scrutiny Committee for the South Kesteven District Council Trees and Woodlands Strategy Work Programme 2025 – 2034.
13. **Work Programme 2024-25** (Pages 205 - 207)  
To consider the Committee's Work Programme for 2024-25.
14. **Any other business which the Chairman, by reason of special circumstances, decides is urgent**

## Minutes

### Environment Overview and Scrutiny Committee

Monday, 7 October 2024, 2.00 pm



SOUTH  
KESTEVEN  
DISTRICT  
COUNCIL

Council Chamber – South Kesteven  
House, St. Peter's Hill, Grantham.  
NG31 6PZ

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#### Committee Members present

Councillor Ian Selby (Chairman)  
Councillor Emma Baker (Vice-Chairman)

Councillor Harrish Bisnauthsing  
Councillor Barry Dobson  
Councillor Gloria Johnson  
Councillor Paul Martin  
Councillor Mark Whittington  
Councillor Paul Wood  
Councillor Tim Harrison

#### Cabinet Members present

Councillor Rhys Baker (Cabinet Member for Environment and Waste)  
Councillor Philip Knowles (Cabinet Member for Corporate Governance and Licensing)  
Councillor Rhea Raysia (Cabinet Member for People and Communities)

#### Other Members present

Councillor Matthew Bailey

#### Officers

Graham Watts (Assistant Director for Governance and Public Protection)  
Karen Whitfield (Assistant Director for Leisure, Culture and Place)  
Debbie Roberts ((Head of Corporate Projects, Policy and Performance)  
Kay Boasman (Head of Waste Management and Market Services)  
Serena Brown (Sustainability and Climate Change Manager)  
Andrew Igoea (Tree Project Officer)  
Louise Case (Sustainability Projects Support Officer)  
Amy Pryde (Democratic Services Officer)

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#### 17. Public Speaking

Mr Peter Bell made the following points of information in a statement:

- *Version 4 of the Animal Welfare Licensing Policy was now on the Council's website. Following previous concerns over paragraphs previously raised with the Committee.*

*Officers suggested that Mr Bell engaged with other parties outside of the Council to receive their views.*

- *Mr Bell had joined the Institute for Licensing as an associate member and had taken a day's training on animal welfare licensing enforcement, alongside other Officer's from different Council's. Another attendee at the training sought advice on the interpretation of a 'fit and proper person', as part of the policy.*
- *Mr Bell had also engaged with the All-Party Parliamentary Group on Penal Affairs. A secretary of the Group stated the matter would be referred to a meeting of the group when it reconvened later in the year.*
- *The NGO's, Howard League and a charity called Unlock, supported leavers from prisons into employment. Policies were being reviewed for Council's within the area.*
- *Mr Bell had previously engaged with the Monitoring Officer and provided detailed feedback on whether he felt Public Space Protection Orders were legal. It appeared that current PSPO's backdated to previous criminal offences, which gave the impression they were unenforceable and illegal documents.*
- *Mr Bell confirmed he would bring an update back to the Committee in the future on these matters.*

## **18. Apologies for absence**

An apology for absence was received from Councillor Steven Cunningham.

Councillor Tim Harrison substituted for Councillor Steven Cunningham.

## **19. Disclosure of Interests**

There were none.

## **20. Minutes from the meeting held on 4 June 2024**

The minutes of the meeting held on 4 June 2024 were **AGREED** as a correct record.

## **21. Updates from the previous meeting**

All actions were complete.

One Member queried the start date of construction for the Council's new Depot.

The Depot project fell into the remit of the Finance and Economic Overview and Scrutiny Committee, where they received an update at every meeting.

**22. Announcements or updates from the Leader of the Council, Cabinet Members or the Head of Paid Service**

The Cabinet Member for Environment and Waste notified the Committee of a recent meeting with Lincolnshire Waste Partnership who provided a detailed report. A brief was being worked on to provide to the Committee for review.

A letter in regard to the A1 road had not yet been sent, however, it had been drafted and was due to be sent in the coming days. The letter would be sent out to the Committee for comment.

The Council was due to attend a reception in Westminster to discuss flood response and internal drainage boards.

The liveries on the four new freighters had been discussed, to which three had been confirmed. The last one was out for a public poll to enhance the publicity and exposure that the causes deserve.

**23. Waste Policy, Battery Collection and Disposal of Vapes - Verbal Update**

The Head of Waste Management and Market Services provided a verbal update:

*'The first part of this update covers the household battery collection service, which was introduced on Monday 16<sup>th</sup> September 2024. The first three weeks of the service have been a success with almost 750kgs of batteries being collected in week one. Feedback on social media and through our customer services team has been positive and the number of batteries collected is now starting to level out at around 75kgs per day as was expected.'*

*Moving forward, we hope to enhance the service further by including disposable vapes within the scope of the battery collections. Once the variation to the depot site permit has been approved by the Environment Agency, we will be able to roll this out and appropriate communications will be released at that time.*

*The final part of this update relates to the waste policy, which requires amending due to multiple recent service changes including twin stream and batteries. The updated waste policy was due to be reviewed at the Committee today. However, it has been agreed to delay this until the next committee to allow time for the battery roll out to settle. Now this is complete, and there are no additional operational changes required, it will be possible to bring an updated Waste Policy document to the next committee.'*

One Member highlighted that they had noticed an improvement of the collection service overall for South Kesteven.

It was highlighted that there was not a drop off point for residents to dispose of long-life battery boxes with fluorescent tubes.

The Head of Waste Management and Market Services would research into the option available for disposal of long-life battery boxes. The liquids contained within the boxes were of danger to the environment and restricted in terms of disposal.

**ACTION: For the Head of Waste Management and Market Services to update the Committee via email on exploring options in disposing long-life battery boxes and LED lights,**

A query was raised on whether curbside battery collection took place on certain bin days.

It was clarified that curbside battery collection would take place on every bin collection day, as long as the bag containing batteries was tied to the handles of the bin.

One Member queried whether long life bulbs could be disposed of within the silver bin.

The Cabinet Member for Environment and Waste noted there were a wide variety of LED bulbs available, however, the majority used a form of mercury to generate a fluorescent effect. These were not to be recycled through the mixed dry recycling stream and came under the electrical waste regulations. The most appropriate place to dispose of LED bulbs was at a household waste recycling centre. Officers would review options on providing residents of ways to dispose such items.

#### **24. Progress update on upgrade of District Council Streetlights to LED units**

The Cabinet Member for Environment and Waste introduced the report regarding progress, sustainability and responsible financial management.

The report highlighted significant strides the Council had made in upgrading its streetlight assets to energy efficient LED lighting, following an increased budget allocation of £1m.

The proactive response to rising energy costs and environmental concerns demonstrated responsible financial management. The project demonstrated the Council's desire to reduce carbon and have an infrastructure network that was reliable and long-lasting.

The inclusion of dark sky accreditation emphasised the Council's commitment to reduce light pollution and potential impacts on wildlife and local communities.

South Kesteven District Council were responsible for managing a total of 3,893 streetlights within the district all of which were funded from the Council's General Fund. These lights were predominantly for providing lighting to footways, as opposed to the separate and much more significant stock of streetlights provided for highways in the district, which were managed by Lincolnshire County Council.

The anticipated completion of the project was November 2025, which ensured long-term financial savings and environmental benefits.

One Member queried whether there would be any provision for more streetlights to be installed, where needed.

The report outlined the programme being on-progress. It was questioned whether the project may complete early.

The programme of streetlight upgrades were completed on a location by location basis which ensured that an efficient process was being followed. Upgraded locations to date include:

Aisby	Gelston	Marston
Ancaster	Graby	Morton
Barkston	Hanthorpe	Old Somerby
Carlton Scoop	Heydour	Stubton
Claypole	Honington	Syston
Deeping St James	Horbling	Tallington
Dowsby	Hougham	Uffington
Dry Doddington	Langtoft	Westborough
Dunsby	Lenton	West Deeping
Foston	Long Bennington	
Frogmire	Market Deeping	

Further progress was requested on LED units upgraded in the centres of Grantham, Bourne and Stamford.

**ACTION: For the Sustainability and Climate Change Manager to provide a list of LED units that had been upgraded in the centres of Grantham, Bourne and Stamford.**

It was confirmed that LED units had been updated in Grantham as part of the previous contract of upgrades.

The payback period originally considered in 2023 was just under five years, however, this had reduced to 3.7 years. The impact on the rise of energy prices was discussed.

Members congratulated all Officers involved.

The Chairman requested than a further update be brought back to Committee at the beginning of 2025.

The Cabinet Member for Environment and Waste clarified that heritage lamps were more challenging and may take longer to install. It was unlikely the project would finish prior to the anticipated completion of November 2025.

It was confirmed that a 'mop-up' programme would take place following the project to ensure all works were completed, to a high standard.

**That the Committee:**

**1. Notes the updates regarding the upgrade programme of District Council streetlights to LED.**

**25. Update on Carbon Emissions for 2023/24**

The Cabinet Member for Environment and Waste presented the report which provided an update on the Council's steady progress towards achieving the carbon reduction targets, which was a 30% reduction by 2030.

Since the climate emergency declaration in 2019, the Council had focused on cutting its emissions from operations with 25.27% reduction in emissions in the 2023-24 financial year compared to the 2018-19 baseline.

Officers were thanked for compiling the figures together.

The 25.27% meant a reduction in 1920 tonnes of carbon that had not been released into the atmosphere by the Council for the financial year.

The Council were actively pursuing sustainability across buildings and vehicle operations. The report detailed showcased successes in cutting energy consumption in Council buildings, such as a 45% decrease in emissions related to electricity.

The contribution of carbon from vehicle fleets was highlighted, which was the Council's largest source of emissions. Options were being explored on decarbonising fleet vehicles in terms of utilising cleaner fuels and different vehicles.

A query was raised on whether carbon efficient LED lights had been installed in Welham Street, Grantham car park.

It was confirmed Welham Street, Grantham car park had LED lights installed.

Members discussed the difficulties of reducing carbon emissions on the Council's waste freighters. Electric waste freighters had a short radius before requiring re-charging which would be more challenging for South Kesteven as a rural District.

The use of hydrogen run vehicles was suggested.

The Cabinet Member for Environment and Waste outlined the opportunity to explore hybrid and electric vehicles within the Council's smaller waste related fleets e.g. caged wagons. There was also the potential for tools and equipment such as hedge trimmers and road sweepers to become electric.

It was queried as to how refrigerants had been reduced by 100%.

The Sustainability Project Support Officer clarified that there had been no leaks of refrigerants within the system.

It was suggested that fuel emissions in waste freighters could be reduced by advanced driver training.

One Member queried what was being used as a substitute for CFC's (Chlorofluorocarbons) in refrigerants.

**ACTION: For the Sustainability Project Support Officer to provide an update on the lack of emissions arising from refrigerants this reporting year, and to update on what refrigerant gases were used in SKDC equipment.**

Due to the increasing number of houses being built, the Council were optimising and reviewing routes that waste freighters take. External assistance was being sought for this piece of work.

Members highlighted the impressive work undertaken by the Waste staff.

**That the Committee:**

**1. Notes the reported carbon emissions for the 2023/24 period which cover operations from South Kesteven District Council buildings and vehicles.**

## **26. Bulky Waste Collection Service**

The Cabinet Member for Environment and Waste presented the report that provided responsiveness to community needs and Cabinet were requesting a steer from the Committee on an option to take.

The report highlighted a persistent high demand for the bulky waste collection service, which was available to book through the Council's website at a cost of £21 per item, followed by a reduction in the next items.

At present, there was a long lead time for some collections based on disposal. The Council had 1 vehicle and 2 operatives for bulky waste. The bulky waste service occasionally struggled to keep up with requests, particularly for fridge collections in the south of the District, where there was a current 8-week wait.

The report revolved around the opportunity to expand the bulky waste service into a second vehicle and crew to reduce wait times, particularly for challenging items. The investment would enhance service efficiency, it would increase revenue for the Council whilst addressing a growing public demand.

If an additional bulky waste vehicle was purchased, it would have additional utility outside of bulky waste collections. It could be used for alternative collections, if the demand for bulky waste reduced in the future.

It was noted by a Member that bulky waste items had been found abandoned at the entrance to fields in their area, and so expanding the Bulky Waste Collection Service would likely reduce this issue. The Member also noted that given the nature of the vehicle, it could be used to support the Fly Tipping Team.

In line with the service provided by Boston Borough Council, a Member queried whether additional smaller items could be taken on the day of the bulky item collection for an additional fee. Whilst the fees charged by Boston Borough Council are only relatively small (£3 for a waste bag, £6 for a fence panel) this could be a means of additional income. The Cabinet Member stated that this had been raised during discussions with the Head of Waste and Markets and that this was under review as it would have to be sustainable.

A Member sought confirmation of the accuracy of the fuel calculation and whether the vehicles were being ran as efficiently as possible. The Cabinet Member acknowledged that this information would lie with the Officers and may need to be fed back after the meeting.

A suggestion was made to facilitate a public skip. The Cabinet Member confirmed that dialogue was ongoing with Boston Borough Council to gage the success of their trial period for this scheme.

Clarification was sought as to whether the Cabinet Member for Environment and Waste was in favour of the proposal. The Cabinet Member recognised that whilst the demand would likely be popular, it needed to be considered that the proposals may not be profitable financially. Ultimately the view on whether to include the proposal within the budget setting process, was at the discretion of the Committee.

The Cabinet Member for Environment and Waste noted that there were 141 incidents of fly tipping in September alone and incidents peaked at 144 in July 2024. The result of which was that over the last 12 months, the internal costs of dealing with fly tipping was £88,000. Ultimately individuals were responsible for the disposal of their waste and the Cabinet Member urged the public to not take individuals pledging to clear garages for £15/20 at face value as these unlicensed schemes contribute to the high levels of fly tipping. Members of the public could contact SKDC for clarification whether an individual/firm are licensed.

The previous portfolio holder recognised this to be a long-standing issue which was financially motivated and suggested significantly increasing the fines as a deterrent.

A Member requested greater clarity on the definition of bulky waste items.

The Cabinet Member confirmed that a full list of bulky waste items was on the SKDC webpage under Bulky Waste Collections.

**That the Committee:**

**1. Consider the business case for the additional bulky waste collection vehicle and crew.**

It was proposed, seconded and **AGREED** for the inclusion of an additional vehicle and crew be put into the budget setting process.

**27. Commercial Food Waste Collections**

The report was presented by the Cabinet Member for Environment and Waste with the purpose of providing an overview of the opportunities and associated risks of expanding the current commercial waste collection service to include separate food waste collections.

The proposal came after the Environment Act 2021 mandated that household waste collections must begin by 31 March 2026, or by 31 March 2025 for 'prominent firms' of 11 employees or more.

It was noted that the vast majority of businesses in SKDC were microbusinesses with 10 or fewer employees. The Act mandated that for these microbusinesses the commercial food waste collection needed to begin by 31 March 2027. However, the Act did not mandate that the service needed to be provided by the Local Authority.

The Cabinet Member for Environment and Waste conceded that he was minded to be cautious with the implementation of the scheme and he was keen to learn from the implementation at other Local Authorities to make the development as financially viable as possible.

The Chairman queried how the food waste would subsequently be disposed of following collection.

The Cabinet Member for Environment and Waste confirmed that the waste would be taken to an anaerobic digester in North Hykeham to be converted to fertiliser. Therefore, the financial viability of the site would increase as the food waste collections continue to become mandatory in line with the Environment Act 2021.

In response to this, a Member queried whether the by-product methane could be harvested for generating electricity.

A Member noted the financial risk of the proposal and subsequently supported the recommendation to not pursue implementation of the service at this time.

**That the Committee:**

- 1. Consider the financial implications of this opportunity and support the conclusion that introducing a commercial food waste collection service was not financially viable at this time.**

## **28. Re-wilding Ambitions**

The Rewilding – Ambitions Report was presented by the Cabinet Member for Environment and Waste.

The Council had the opportunity to implement rewilding initiatives across the open public spaces it is responsible for. Actively rewilding areas of land provided the opportunity to restore healthy ecosystems, improve biodiversity and reverse the loss of wildlife. As well as contributing to the Council's carbon efficiency targets this could also reduce the costs associated with maintaining these areas in the longer term.

The introduction of wildflower meadows on selected areas as a trial presented an opportunity to test the appetite of residents and raise awareness of the benefits of rewilding. The learning from the pilot scheme could also be evaluated to form part of the Council's future ambitions.

The Cabinet Member praised the success of the rewilding at Boothby Wildlands and cited this example of the improvement that rewilding can have on the eco-system, particularly the eco-system of insects. However, the Cabinet Member recognised the importance of dialogue with residents as rewilding efforts needed to be done in conjunction with communities.

The Chairman thanked the Assistant Director for Culture and Leisure for the quality of the report. A Member encouraged partnership working with Parish Councils.

The Assistant Director for Culture and Leisure was happy to facilitate a site visit but suggested doing so when the sites were more developed.

### **ACTION: For the Assistant Director for Culture and Leisure to organise site visits on the re-wilding sites, once they were more established.**

A fellow Committee Member praised the report and recommendations made, however, identified the potential future conflict between rewilding efforts and housebuilding efforts.

It was proposed, seconded and **AGREED** that the Committee:

- 1. Endorse the Council's plan to adopt rewilding initiatives on the trial sites which have been identified.**
- 2. Recommend that the learning taken from the trial is captured and used to inform future rewilding plans across the district.**
- 3. Agree to receive a future report on the outcome of the trial and future rewilding plans and initiatives.**

## 29. Communal Recycling scoping

Councillor Matthew Bailey presented the discussion item regarding Communal Recycling scoping.

The purpose of the discussion was to review the success of the twin stream rollout, specifically with communal properties.

Councillor Matthew Bailey identified a lack of consistency across the rollout regarding the amount and colour of bins. There was also an added complication of temporary accommodation properties where there was a high turnover of residents. To try and add greater continuity across the service, the Member suggested using bags for all communal properties.

As part of the review, the Member requested clarity about the following –

- How items are appropriately recycled when they are collected in mixed recycling bags.
- Whether there were any measurements of the recycling rates of communal properties compared to standard properties.
- Were recycling bags being collected from communal properties as part of the purple-bin week service.
- Were a sufficient amount of recycling bags being issued to properties.

In response to the above queries, the Cabinet Member for Environment and Waste noted a review was already underway by the Lincolnshire Waste Partnership who scrutinised how recycling was tested for contamination by SKDC. SKDC had been liaising with Lincolnshire County Council to try and increase the presence of communal bins.

The Cabinet Member for Environment and Waste also clarified the number of bags issued were calculated by the size of the waste that the household generated.

The Cabinet Member noted there was no waterproof bag that would be accepted. Waste was separated and the purple-lidded bin stream was sent to Kings Lynn.

One Member noted they had recently held a substantial walk around their ward with relevant Officers and the Cabinet Member for Environment and Waste. The purpose of this walk was to identify any deficiencies from the rollout and seek a swift resolution.

It was noted by another Member that when recycle bags were not collected due to contamination, this obstructed the already narrow pavements in areas such as Stamford.

One Member also requested the cost implication of printing the purple bin bags.

It was noted that it was fundamental for those in temporary accommodation to be educated on the regulations around bin collections in the district.

The Cabinet Member for Environment and Waste recognised that efforts were being made to raise awareness about the correct items to put in the correct bins, however, it was axiomatic that there would be some individuals who refuse to engage. The Cabinet Member was explicit that SKDC did not have the resource or capacity to provide a mop-up system for bags that were not collected because of the lack of cooperation by individuals who did not bag the items correctly. However, this had to be balanced by the public health concern of waste items being left unattended.

The Cabinet Member noted that at 38%, the contamination rate was initially amongst the highest in the country following the rollout. In the last full month of figures, this rate had dropped significantly to 8%.

**ACTION: For Communal Recycling to be added to the Work Programme for a future meeting.**

**30. Work Programme 2024-25**

The Committee noted the Work Programme 2024-25.

The Cabinet Member for Corporate Governance and Licensing requested than an agenda item on pesticides be included on the Work Programme, for a future meeting. Members wished to prioritise this item for the December meeting.

The Monitoring Officer confirmed that the notice of motion on pesticides had been deferred from a previous Full Council meeting. The motion would be heard at the next meeting of Full Council on 21 November 2024.

The Sustainability and Climate Change Manager requested the following items to be included on the Work Programme:

- Update on the Tree Action Plan
- Update on the Climate Action Plan

**31. Any other business which the Chairman, by reason of special circumstances, decides is urgent**

There were none.

**32. Close of meeting**

The Chairman closed the meeting at 16:25.

# Action Sheet

Environment Overview and Scrutiny Committee – Actions from meeting of 4 June 2024

Min no	Agenda item	Action	Assigned to	Comments/Status	Deadline
9	Corporate Plan KPIs	That the Committee receive information on recycling rates from LCC.	Cllr Rhys Baker/Kay Boasman	Email sent from Democracy on 23 September 2024	Complete
11	Twin Stream Update	An update on how latest round of rejected bins was received.	Kay Boasman	Email sent from Democracy on 23 September 2024	Complete
		Research into the adoption of roads, and whether developers have to hand over land after 10 years for care and maintenance. An update to be provided to the relevant Member	Emam Whittaker	Email sent to the relevant Member on 19 September 2024	Complete

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SOUTH  
KESTEVEN  
DISTRICT  
COUNCIL

## Environment Overview and Scrutiny Committee

Tuesday, 10 December 2024

Report of Councillor Rhys Baker  
Cabinet Member for Environment and  
Waste

### Garden and Bulky Waste Collections - Change in Service Charge Proposal

#### Report Author

Kay Boasman, Head of Waste Management and Market Services

[kayleigh.boasman@southkesteven.gov.uk](mailto:kayleigh.boasman@southkesteven.gov.uk)

#### Purpose of Report

To highlight the financial impact of increasing the charges for garden waste and bulky waste collections, and to ask the Committee to consider whether these increases should be taken forward and included within the budget setting process.

#### Recommendations

##### The Committee is asked to:

1. Recommend to Cabinet an increase of £1 in respect of the garden waste and bulky waste charges for 2025/26.

#### Decision Information

Does the report contain any exempt or confidential information not for publication? No

What are the relevant corporate priorities? Sustainable South Kesteven Effective council

Which wards are impacted? All Wards

## 1. Implications

Taking into consideration implications relating to finance and procurement, legal and governance, risk and mitigation, health and safety, diversity and inclusion, safeguarding, staffing, community safety, mental health and wellbeing and the impact on the Council's declaration of a climate change emergency, the following implications have been identified:

### ***Finance and Procurement***

- 1.1 The cost of delivering the garden waste and bulky waste collection services rises year on year. This is because of inflation which affects the operating costs and includes fuel, materials and salaries. Without regular, incremental increases to the charges there is a risk that large and irregular increases may be required to ensure the income generated covers the operational delivery costs.

*Completed by: Richard Wyles, Deputy Chief Executive and s151 Officer*

### ***Legal and Governance***

- 1.2 There are no significant legal or governance implications arising from this report, which invites the Overview and Scrutiny Committee to consider including increases in fees and charges for garden waste and bulky waste collection services as part of the upcoming budget setting process.

*Completed by: Graham Watts, Monitoring Officer*

### ***Climate Change***

- 1.3 These services offer residents an excellent way to responsibly dispose of their waste, yet offering the service to residents does result in carbon emissions from operating vehicles to collect material. The garden waste collection service plays a vital role in encouraging residents to recycle their garden waste. Any increase in price needs to be considered to ensure it does not act as a barrier to residents who may want to recycle this waste.
- 1.4 Similarly, the bulky waste service offers residents a convenient option to dispose of large household goods and other items. This can help to ensure that items, particularly electrical, comply with Waste Electrical and Electronic Equipment (WEEE) disposal directives. It also enables residents to upgrade to more environmentally friendly appliances without worrying about how to dispose of existing ones.

*Completed by: Serena Brown, Sustainability and Climate Change Manager*

## 2. Background to the Report

2.1. This report highlights the impact of increasing the charge for bulky waste collection and, separately, the impact of increasing the charge for garden waste collection. Both services incur a fee which ensures the cost of running the service is met by those who wish to use it, and not subsidised by residents who do not use the service. To ensure the charges continue to cover the delivery costs, it is important to consider the current financial situation and whether an increase in the service price is required.

### Bulky Waste Collections

2.2. The bulky waste collection service is a statutory service that the council can charge residents to use (Environmental Protection Act, 1990). Currently, the council charges £21 for the first item and £11 for each subsequent item. Fridges and Freezers are charged at £21 per item and cannot be counted as the 'first item' to allow for the discounted additional item price. The service collects around 5,700 items per year.

2.3. The total operating costs for this service are around £88,160 per year and a fully subscribed service has a potential income of around £90,000 per year (2023/24 figures). This means that the charge for the service is only just covering the costs of running the service.

2.4. The operating costs (including fuel, salaries and equipment) increase each year in-line with inflation. If a fee increase isn't considered there is a possibility that the cost of running the service would not be covered by the income generated for the delivery of the service.

2.5. Analysis of the bulky waste collection data suggests that if there was a £1 increase on all bulky waste charges, an additional £6,100 in income could be raised.

2.6. If an additional £1 was placed on the fridge/freezer charge, this would generate an estimated additional £200 (based on collecting around 200 fridges per year). Table 1 outlines the current charges and the proposed charges.

Table 1: Current and Proposed Bulky Waste Collection Charges

	2024/25 (£)	2025/26 (£)
First Item	21	22
Additional Item	11	12
Fridge/Freezer	21	22

2.7. When compared to other Lincolnshire authorities, it is difficult to compare like for like as each authority has a slightly different pricing structure. Table 2 shows the pricing structures for bulky waste collections across the seven Lincolnshire authorities; each authority operates a slightly different charging mechanism, and this makes comparing costs difficult. **However, if a resident only has one item to dispose of, SKDC's price is one of the lowest.**

Table 2: Bulky Waste Collection Charges for Lincolnshire Authorities

Authority	First Item Cost (£)	Additional Items (£)	Comments
West Lindsey	34.30	4.50	Based on a point system, the £34.30 covers 6 points e.g. a three-piece suite is 3 points
NKDC	37.00	74.00	£37 covers up to 3 items and £74 covers up to 6
City of Lincoln	34.30	4.50	West Lindsey provides this service on behalf of City of Lincoln
SKDC	21.00	11.00	Higher price for first item to reflect the resource costs to get to the property
South Holland	15.00	25.00	Priced at £15 for 1 item, £25 for 2 and £30 for 3. Maximum of 3 items.
Boston	21.20	29.70	Priced at £21.20 for up to 2 items, £29.70 for 3 and £37.10 for up to 5. A white item is £31.80
East Lindsey	35.00	n/a	Cost covers up to 4 items

## Garden Waste Collections

2.8. The garden waste collection service costs resubscribing residents £51 per year to empty their first bin and £42 per additional bin. In the first year, new customers pay £79 for the service (an additional £28 for the bin and £12 for delivery).

2.9. Currently, it is not a statutory requirement that councils offer a garden waste collection, and they are able to charge for this service if they provide it. However, under the 'Simpler Recycling' changes (Environment Act 2021), councils will be

mandated to provide this service by 31<sup>st</sup> March 2026, but they will still be able to charge for it.

- 2.10. The service is very popular and currently there are around 36,000 subscriptions. The service generates an income of around £1.8million and this income is used to fund the costs of running the service.
- 2.11. This report explores the financial impact of increasing the charge by £1 for the next three years. Table 3 outlines the cost of the service for the next three years under this proposal and Table 4 shows the estimated increase in income for a £1 year on year increase for 25/26, 26/27 and 27/28.

Table 3: Proposed service costs over the next three years

	2024/25 (£)	2025/26 (£)	2026/27 (£)	2027/28 (£)
<b>First Bin</b>	51	52	53	54
<b>Second Bin</b>	42	43	44	45

Table 4: Estimated income based on £1 year on year increase until 27/28

	2024/25 (current pricing)	2025/26 (£1 increase on 24/25)	2026/27 (£1 increase on 25/26)	2027/28 (£1 increase on 26/27)
<b>Estimated Income (£)</b>	1,842,076	1,880,138	1,918,200	1,956,262

- 2.12. Based on the current customer base, this increase would generate an additional £38,000 per year.
- 2.13. When compared to other Lincolnshire authorities (Table 3), SKDC has the second highest charge for the first bin and the third highest charge for additional bins. This reflects the different challenges and costs incurred by each council providing this service. East Lindsey, Boston, and SKDC are broadly aligned on first bin charges.

Table 3 Garden Waste Collection Charges for Lincolnshire Authorities

Authority	First Bin Cost (£)	Additional Bin Cost (£)	Comments
West Lindsey	44	44	£37 for supply and delivery of bin, increasing by £2 for 2025, operates March - November
NKDC	45	8	£41 charge to purchase the bin, year-round collection

City of Lincoln	39	15	£15 charge for bin delivery, year-round collection
SKDC	51	42	£40 charge for supply and delivery of bin, year-round service
South Holland	57	33	£17.50 for supply and delivery of the bin, year-round collections
Boston	50	30	£42.40 for supply and delivery of bin, collections April - November
East Lindsey	50	50	£27 for supply and delivery of bin, year-round collections

2.14. Home composting remains an option for residents who do not wish to make use of the garden waste collection service or who wish to compost a portion of their green waste. The Council provides further information on its webpages to support the uptake of composting: [Home composting | South Kesteven District Council](#)

### 3. Key Considerations

- 3.1. A price increase may result in a lower uptake, which in turn may result in less income for the council. As a result, the bulky waste collection service, which only just covers its cost, risks the need for financial subsidy to continue running. This is typical for bulky waste collection services nationwide.
- 3.2. Failing to introduce an increase may mean that the income does not rise in-line with inflation and the services fail to cover their costs, creating additional financial strain. It may also mean that a larger increase is required later as the cost of the service catches-up with increasing operating costs over several years.
- 3.3. An additional consideration is the impact this may have on the Council's recycling rate. Garden waste is taken for recycling and if residents do not use the service, this waste stream may not be recycled, and this could impact the Council's ability to meet Lincolnshire County Council's recycling target of 50%.
- 3.4. The garden waste collection service is well received by residents and uptake of the service continues to increase. This indicates a good service which delivers value for money.

## **4. Other Options Considered**

- 4.1. The other option is to do nothing and leave the 2025/26 charges at the same level as they were for 2024/25. There is a risk that this may result in a larger price rise in the future as the service operating costs continue to rise year on year in-line with inflation.

## **5. Reasons for the Recommendations**

- 5.1. This report asks the committee to consider the impact of the suggested price changes for garden waste and bulky waste collections and whether these increases should be taken forward and included within the budget setting process.
- 5.2. If the charges are increased there is a risk that uptake of these services will fall, and the income generated will not be enough to cover the operating costs. This is a notable risk for the bulky waste collection service, as it only just covers its running costs. This was, however, considered in detail by the Environment Overview and Scrutiny Committee in their recommendation to Cabinet.
- 5.3. However, if charges are not increased in-line with inflation there is also a risk that the income generated will not be enough to cover the operating costs. Small incremental increases to charges, as suggested within this report, are a good way to mitigate large and irregular increases.

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SOUTH  
KESTEVEN  
DISTRICT  
COUNCIL

## Environment Overview & Scrutiny Committee

Tuesday, 10 December 2024

Report of Councillor Philip Knowles,  
Cabinet Member for Corporate  
Governance and Licensing

## Corporate Plan 2024-27: Key Performance Indicators Report - Mid-Year (Q2) 2024/25

### Report Author

Charles James, Policy Officer

[Charles.James@southkesteven.gov.uk](mailto:Charles.James@southkesteven.gov.uk)

### Purpose of Report

To present the Council's performance against the Corporate Plan 2024-27 Key Performance Indicators (KPIs) for quarter 2 2024/25.

### Recommendations

#### That the Committee:

1. **Reviews and scrutinises the performance against the Corporate Plan Key Performance Indicators in relation to the delivery of the Corporate Plan 2024-27.**

<b>Decision Information</b>	
Does the report contain any exempt or confidential information not for publication?	No
What are the relevant corporate priorities?	Sustainable South Kesteven
Which wards are impacted?	All

## **1. Implications**

Taking into consideration implications relating to finance and procurement, legal and governance, risk and mitigation, health and safety, diversity and inclusion, safeguarding, staffing, community safety, mental health and wellbeing and the impact on the Council's declaration of a climate change emergency, the following implications have been identified:

### ***Finance and Procurement***

1.1 There are no significant financial implications arising from this report, which is for noting.

Completed by: Paul Sutton Interim Head of Finance (Deputy s151)

### ***Legal and Governance***

1.2 Regular monitoring of service area performance by the relevant Committee of the Council is to be welcomed and represents good governance. This report is for noting and there are no significant legal or governance implications arising from the report.

Completed by: Graham Watts, Assistant Director (Governance & Public Protection) and Monitoring Officer

## **2. Background to the Report**

2.1 The Corporate Plan 2024-2027 was adopted by Council on 25 January 2024. It was proposed actions, key performance indicators (KPIs) and targets would be developed by the relevant overview & scrutiny committees, which would retain oversight of the performance management arrangements at a strategic level.

2.2 The actions within the remit of this Committee with accompanying measures were presented to and agreed by the Committee on 19 March 2024.

### **3. Key Considerations**

- 3.1 This report is the first of the new reporting cycle, and covers the period July to September 2024 (Quarter 2 2024/25).
- 3.2 Appendix A presents the overall performance against the twelve actions being presented in this session. Commentary by the responsible officer is provided for each action. Performance is summarised using a RAG system as follows:
- 3.3 Eight of the actions are rated Green. These are actions which are on or above target as planned.
- 3.4 Two actions are rated Amber. These are actions off target by less than 10% or where milestone achievement is delayed but with resolution in place to be achieved within a reasonable timeframe.
- 3.5 Zero actions are rated as Red. These are actions that are significantly below target.
- 3.6 Two actions are rated as N/A. These are actions for which work has not yet meaningfully commenced e.g. being sequenced on the completion of other items, or where data unavailable.
- 3.7 The KPIs have been developed in close consultation with the relevant Officers for each service. It is expected that the KPI suite will experience a degree of evolution over the next four years. This improvement will be prompted by the needs of decision makers and the Committees, and further consideration of how to best meet those needs by Officers.

### **4. Other Options Considered**

- 4.1 As Council has agreed the Committees will lead monitoring performance, there are no viable alternatives. An absence of performance arrangements would mean the delivery of the Corporate Plan is unmonitored and prevent continuous improvement. A purely internal KPI suite would prevent effective and transparent scrutiny and accountability.

### **5. Reasons for the Recommendations**

- 5.1 This is a regular report where Members are invited to scrutinise and comment on performance.

### **6. Appendices**

- 6.1 Appendix A – Corporate Plan 2024-27 KPI Report: Environment OSC Mid-Year (Q2) 2024/25

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Corporate Plan 2024-27: KPI Summary Report Q2 2024/25 – Environment Overview & Scrutiny Committee							
Index	Priority	Action	Owner	Target/s	Q2 Value	Q2 Status	Manager Commentary
ENVIRO1	Sustainable South Kesteven	Deliver the Climate Change Action Strategy programme.	Sustainability & Climate Change Officer	Development & Approval of Action Plan	Climate Action Plan under development	On Target	Further projects have been identified to utilise the Climate Reserve Fund for this financial year. These include new solar PV for The Picture House, battery powered grounds maintenance equipment and further energy efficiency projects targeting the leisure centres. Bid development for standalone projects has been ongoing. Several projects have been completed in line with the Climate Action Strategy themes. Online climate literacy training has been developed and added to the learning packages of all new officers that join the Council.
				% of total actions on target/complete	N/A	N/A	
ENVIRO2	Sustainable South Kesteven	Continue to reduce operational emissions to achieve the target of a 30% reduction on 2019 by 2030 and develop modelling to set a target of achieving Net Zero operations as soon as viable.	Sustainability & Climate Change Officer	Reduction in SKDC carbon emissions.	A reduction of 25.6% has been reported for the 2023/24 financial year.	On Target	A downward trend in emissions can be observed since the carbon baseline of 2018/19. SKDC is on track to meet the target of reduction of at least 30% by 2030. This is due to a number of carbon savings and initiatives in our leisure centres such as LED light upgrades and the installation of pool covers on all pools. SKDC is currently projected to achieve this emissions target during the 2026/27 financial year. The SALIX funding for Grantham Meres Leisure Centre, which replaces the gas boiler and also increases the number of solar panels on the roof is a key contributing component.
ENVIRO3	Sustainable South Kesteven	Review and implement energy efficiency and renewable energy opportunities across the corporate estate, such as solar panels and EV chargers.	Sustainability & Climate Change Officer	Charging Point Utilisation Percentage (15%)	19.26%	On Target	Usage of chargers is steadily increasing, particularly in Stamford. As part of the new Cattlemarket car park project, the inclusion of new electric vehicle (EV) chargers is being investigated. This will increase the number in Stamford - the Councils most popular area for people with EVs.

Index	Priority	Action	Owner	Target/s	Q2 Value	Q2 Status	Manager Commentary
ENVIRO7	Sustainable South Kesteven	Adopt a Tree and Woodland Strategy and deliver the accompanying action plan.	Sustainability & Climate Change Officer	% delivery of actions included in the Tree and Woodlands Action Plan	Priority actions under review with new Tree Projects Officer.	On Target	The Tree Projects Officer is now in post who will review and deliver the Tree and Woodlands Action Plan. A work programme has been drafted, which will be presented to the Environment Overview and Scrutiny Committee in December. Short term workstreams include reviewing the SKDC [tree management] guidelines, introducing a new tree record management system, obtaining baseline data for tree canopy cover and species diversity, assessing planting opportunities on SKDC land, expanding the planting programme, and establishing an SKDC tree board. A tree planting guide has been developed by the Tree Project Officer, for distribution to all town and parish councils.
ENVIRO8	Sustainable South Kesteven	Ensure that biodiversity net gain is embedded through corporate projects and operations	Sustainability & Climate Change Officer	Develop and deliver a Biodiversity Action Plan.	Biodiversity Action Plan under development	On Target	Several projects to increase wildlife habitat in the district are being progressed. A proposal for rewilding areas maintained by the Council was reviewed by Environment OSC in October. Funding has been allocated from the UK Shared Prosperity Fund (UKSPF) to allow town/parish councils to develop biodiversity improvements which are fully funded. A 'Rewilding Menu' was distributed to all town and parish councils to provide a guide to different biodiversity measures that would be supported by the UKSPF 'Make Space for Nature' fund. To date two applications have been received and approved. Deeping St James Parish Council has been allocated £1,617 to establish new hedging and a rewilding area within a cemetery, and Long Bennington Parish Council has been allocated £3,160 to establish a rewilded area adjacent to a primary school.

Index	Priority	Action	Owner	Target/s	Q2 Value	Q2 Status	Manager Commentary
ENVIRO9	Sustainable South Kesteven	Continue to tackle waste related crimes, including fly tipping with support from the Environmental Crime Partnership	Head of Service (Public Protection)	Number of enforcement actions undertaken when evidence of an offence is available.	N/A	N/A	A new environmental crime process and mechanism for data capture has been developed. Therefore the team will be able to log the information from the 1st October 2024. Data will be available from Q3 and this will be reported at Q4 to the committee.
ENVIRO10	Sustainable South Kesteven	Manage a smooth implementation of twin stream recycling to improve the recycling rate and reduce contamination.	Head of Waste Management & Market Services	% of households with access to the twin stream recycling service. (1% quarterly growth on baseline 88%)	90%	On Target	The twin stream recycling scheme is now fully implemented. The implementation process throughout the summer has yielded success and fewer bins have been rejected. In addition, the proportion of paper and card collected has increased and the quality is high. The scheme has had a clear positive impact on the contamination rate. In Q2, the contamination rate was 10.32%, falling from 13.18% in Q1. For reference the contamination rate in 2022/23 was 16.2%. The Council will continue to monitor this and take action if required using a data driven approach.
				% of households rejected for non-target waste within the recycling stream.	0.40% *Q1 (0.75%)	On Target	
				Proportion of total recycling waste collected which is paper and card. (35%)	41% (Q1 29.62%)	On Target	
ENVIRO11	Sustainable South Kesteven	Develop and implement an effective process for the collection of food waste. (Food waste collection mandatory from 31st March 2026)	Head of Waste Management & Market Services	Work with relevant stakeholders to establish a project group and Action Plan for implementation	N/A	N/A	Mandatory weekly food waste collections are due to start in April 2026. SKDC is currently working with the Lincolnshire Waste partnership to develop a service delivery plan. Indicative funding estimates from government are due in November 2024 and this will enable the Council to understand the potential unfounded costs and progress the plan.
				% of non-target waste within the recycling stream.	N/A	N/A	
				Tonnes of food waste collected	N/A	N/A	

Index	Priority	Action	Owner	Target/s	Q2 Value	Q2 Status	Manager Commentary
ENVIRO12	Sustainable South Kesteven	Deliver a range of schemes to improve the recycling rate.	Head of Waste Management & Market Services	Domestic waste recycled per household (KG)	60KG (Q1 50KG)	On Target	The introduction of twin stream recycling and the contamination reduction campaign have resulted in improved recycling quality across the district. The contamination figures are now in-line with the other Lincolnshire local authorities who have introduced the twin stream system. In Q2, the contamination rate was 10.32%, falling from 13.18% in Q1. In August, SKDC achieved a contamination rate of 7.50%. For reference in 2022/23 as reported by the Office for Local Government (OFLOG), the median for England was 5.8%. The median of SKDC's CIPFA nearest neighbours was 6.8%. The median for districts in Lincolnshire was 8.43%. SKDC's rate in the same period was 16.2%. Therefore clear progress has been observed, with the reduction measures having a positive impact. This will continue to be monitored through data collection and action will be taken in problematic areas as required to ensure the progress continues.
				Increase uptake of the garden waste recycling service. (Target 1% growth)	6.9% growth	On Target	
				% of non-recyclable materials in the recycling stream. (15%)	10.32% (Q1 13.18%)	On Target	
ENVIRO13	Sustainable South Kesteven	Manage the construction and transition to a new depot, that is fit for purpose, and explore options for the old depot	Head of Service (Property and ICT)	Construction commenced (July 2024)	Commenced October 2024	Below Target	Construction commenced in October 2024 following completion of a Value Engineering and stage 4 design period. Contract documents have been finalised with the Lindum Group. Works commenced on site as of 28 <sup>th</sup> October 2024 with the view to completion in November 2025.
				Construction Completion (March 2025)	Completion expected for November 2025	Below Target	
				New depot fully operational (May/June 2025)	N/A	Below Target	
				Options appraisal for future of Alexandra Road (March 2024)	Options Appraisal Commissioned	On Target	The options appraisal for Alexandra Road has been commissioned for the initial viability reporting, and a secondary report is being prepared following discussions with Lincolnshire County Council as to a potential partnership scheme.

<b>Index</b>	<b>Priority</b>	<b>Action</b>	<b>Owner</b>	<b>Target/s</b>	<b>Q2 Value</b>	<b>Q2 Status</b>	<b>Manager Commentary</b>
ENVIRO14	Sustainable South Kesteven	Develop and deliver the Fleet Management strategy and accompanying action plan.	Head of Waste Management & Market Services	Develop and adopt a strategy	In Development	On Target	The Fleet Strategy is currently in development with a draft due by 31st December 2024.
ENVIRO15	Sustainable South Kesteven	Review and implement energy efficiency and renewable energy opportunities within private properties in the district.	Sustainability & Climate Change Officer	Number of properties improved	42	Below Target	As of the end of August, 223 homes had signed up to the Home Upgrade Grant 2 (HUG2) energy efficiency funding scheme. Promotion of the scheme has continued with another letter drop, new referrals across the scheme remains challenging.

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Tuesday, 10 December 2024

Report of Councillor Rhys Baker  
Cabinet Member for Environment and  
Waste

## Draft Green Fleet Strategy

### Report Author

Kay Boasman, Head of Waste Management and Market Services

 [kayleigh.boasman@southkesteven.gov.uk](mailto:kayleigh.boasman@southkesteven.gov.uk)

### Purpose of Report

This report provides an update on the development of the Green Fleet Strategy. Since the declaration of a carbon emergency in 2019, there have been no changes within this area to facilitate a reduction in the greenhouse gases emitted by SKDC's fleet. This strategy document is designed to be an enabling strategy, and it highlights how the fleet will reduce its operational carbon emissions by 2030.

### Recommendations

**The Committee is asked to:**

1. Review the draft Green Fleet Strategy and recommend it to Cabinet for approval.

### Decision Information

Does the report contain any exempt or confidential information not for publication? No

What are the relevant corporate priorities? Sustainable South Kesteven

Which wards are impacted? All wards

## 1. Implications

Taking into consideration implications relating to finance and procurement, legal and governance, risk and mitigation, health and safety, diversity and inclusion, safeguarding, staffing, community safety, mental health and wellbeing and the impact on the Council's declaration of a climate change emergency, the following implications have been identified:

### ***Finance and Procurement***

- 1.1 The carbon reducing measures outlined in Green Fleet Strategy may have financial implications for the Council. Whilst some electric vehicles cost around the same as their diesel counterparts, other vehicles may be more costly. Alternative fuels also cost more than diesel. There will be a requirement to undertake full whole life costing when developing the fleet replacement procurement that ensures value for money whilst meeting the objectives of the Strategy.

*Completed by: Richard Wyles, Deputy Chief Executive and s151 Officer*

### ***Procurement***

- 1.2 If adopted, there will be a requirement to include an environmental aspect within all vehicle procurement moving forward. This may have an impact on the anticipated costs, timescales and availability of options on the market.

*Completed by: Helen Baldwin, Procurement Lead*

### ***Legal and Governance***

- 1.3 There are no significant legal or governance implications arising from this report which are not already set out in the body of the report or Strategy document.

*Completed by: Graham Watts, Monitoring Officer*

### ***Climate Change***

- 1.4 Our vehicle fleet remains a significant contributor to the council's overall greenhouse gas emissions. If adopted this strategy provides a foundation for improving the greenhouse gas emissions produced by the Council's fleet and meeting our carbon reduction target of at least 30% by 2030. It is an enabling strategy that sets out several ways to reduce the environmental impact of the fleet. Pursuing the actions set out within the Green Fleet Strategy will ensure that the fleet is operationally viable, is efficient as possible and decarbonises through use of electric vehicles and alternative fuels.

## 2. Background to the Report

- 2.1. The draft Green Fleet Strategy 2025-28 (Appendix 1) has been designed as an enabling strategy which will transform the way SKDC considers the environmental impact of its fleet of vehicles. It is the first Green Fleet Strategy the authority has considered and, although it is unlikely SKDC will reach net zero by 2028, the strategy has been designed to enable a flexible approach to making important changes to the way vehicles are procured and used.
- 2.2. The current fleet is made up of over 150 vehicles which are used across multiple service areas including Housing, Waste and Street Scene. The vehicles vary in size and type and cover everything from basic cars through to refuse collection vehicles. These vehicles are vital to the delivery of effective and efficient services in a district which is both geographically large and predominantly rural.
- 2.3. In 2022, the Council commissioned a 'Transport Decarbonisation Report'. The report was written by the Energy Saving Trust, and it provided a benchmark for the greenhouse gas emissions and the energy consumption associated with the Council's road transport fleet. Throughout 2021 (the operational year assessed by the report) SKDC's road transport drove 1,473,371 miles and consumed 6,741 megawatt of fossil fuel energy; around 1,988 tonnes of greenhouse gas emissions were produced.
- 2.4. This Strategy envisions that by the end of the 3-year period, the fleet is considerably less dependent upon fossil fuels. This is a facilitating strategy; green technology is still in its infancy and there is much debate over the best way forward within the industry. It is because of this inertia that this three-year Strategy will focus on how the carbon emissions of the current fleet can be reduced without a full switch to one solution.
- 2.5. The Strategy focusses on the following areas:
  - **Adopting cleaner technologies and fuels** – embedding green criteria (for example choosing electric vehicles where feasible) within the Council's procurement process to encourage the exploration of alternative vehicles.
  - **Encouraging efficient vehicle use** – introduce a system for monitoring and analysing vehicle usage across all service areas to explore how to reduce overall fuel use.
  - **Managing demand** – reducing mileage, encouraging efficient journey planning and optimising routes. This will include rationalising the fleet to reduce the number of vehicles required where possible and ascertaining where vehicle life cycles can be extended. Current practices will be examined and improved to ensure demand is managed to maximise resource efficiency.

- **Improving supporting infrastructure** – the new depot project (due to complete in late 2025) offers the opportunity to increase the number of EV charging points. This increase will influence the vehicle replacement schedule moving forward.

2.6. The Strategy has three main areas of focus, which cover:

- **Vision and Key Objectives** – this section sets out the high-level vision of the Council and highlights the agreed key objectives, which will remain the same throughout the period of the strategy. They form the basis of this strategy and are essential for building a solid foundation for a change of culture around fleet management.
- **Action Plans** – this will be a living document. It will be reviewed and updated annually, to reflect any changes in strategic direction, policy or legislation. The action plans will be monitored to identify strengths and weaknesses. These will help guide decisions made at the annual review. The key KPI's will be monitored through the Corporate Plan performance management process.
- **Policy Statements** – these sections set out key changes to the Council's procurement policy and travel policies. These changes, whilst they will take time to implement, are key to the long-term success of the green fleet aspiration.

2.7. To support the document, we have created a Technical Appendices. The Strategy is based on technical environmental data and if it was all included within the strategy document itself, it would be difficult to read. To address this, we have separated out the supporting technical information. This enables the reader to decide what level of technical information they need to understand the reasoning behind the actions contained within the Strategy.

### 3. Key Considerations

- 3.1. The Green Fleet Strategy sets out the Council's aspiration for improving the environmental impact of its fleet. It is an enabling strategy which combines practical improvements (technologies and fuel types) alongside behavioural changes.
- 3.2. Reducing the environmental impact of the fleet may be more expensive than the existing fleet procurement as currently both electric vehicles and alternative fuel sources are more expensive. Some of this investment will be lightened by efficiencies and savings made through route optimisation and lower maintenance burdens of electric vehicles.
- 3.3. Carbon modelling is complex, and it is difficult to estimate the overall reduction until a decision on which vehicles are exchanged for electric vehicles is made. However, Table 1 below shows the emissions from the current fleet. This

information can be used to make informed choices about where electric vehicles will be most impactful as we look to purchase up to 4 over the course of this strategy.

Table 1: Proportion of Greenhouse Gas Emissions and Energy Usage of Current Fleet (%)

Fleet Category	Fleet Size (%)	Annual Mileage (%)	Greenhouse Gas (tonnes) (%)	Energy (MWh) (%)
Refuse Collection Vehicle (RCV)	18.7	27.2	64.5	64.5
Heavy Commercial Vehicle (HCV)	7.0	10.9	10.8	10.8
Light Commercial Vehicle (LCV)	57.3	58.2	22.4	22.4
Car	8.8	3.6	0.7	0.7
Other	8.2	0.1	1.5	1.5
<b>Total</b>	<b>100</b>	<b>100</b>	<b>100</b>	<b>100</b>

- 3.4. Whilst electric vehicles are the most visible choice for reducing emissions, alternative fuels are an excellent option for the hardest to electrify vehicles including Refuse Collection Vehicles. Fuels such as HVO (hydrotreated vegetable oil) can be stored and used like normal diesel; there is no need for a separate tank and discussions with industry experts has highlighted that mixing diesel with HVO does not reduce its effectiveness. On the latest available carbon emission factors published by government, a move to HVO from a typical biofuel blend diesel results in a carbon emissions saving of around 90%. This strategy suggests a 5% year on year increase in the use of alternative fuels, they cost around a third more per litre. If this is agreed, that would result in a 15% reduction in the use of diesel, and this would reduce the emissions from the hardest to electrify vehicles considerably.
- 3.5. The Technical Appendices document (Appendix 2), which supports the Strategy, offers a more in-depth breakdown of the savings and benefits of going electric. It includes a synopsis of the findings from the council commissioned Transport Decarbonisation Report and information on the environmental impact of the current fleet.

## 4. Other Options Considered

- 4.1 The following options were considered when creating this strategy:
  - To omit the ‘green’ element and pursue a strategy without the focus on environmental improvements – this option goes against the Council’s

commitment to improving the environmental impact of its operations and therefore was discounted.

- To only use alternative fuels without the focus on electric vehicles – the Council has a limited number of electric charging points, and the vehicles are expensive to purchase. Electric vehicles provide an excellent, environmentally friendly alternative to diesel fuelled vehicles and therefore they have been included to the level allowed by infrastructure constraints.

## **5. Reasons for the Recommendations**

- 5.1. It is recommended that the Committee review the draft Green Fleet Strategy and recommend it to Cabinet for approval. The Strategy sets out the Council's ambitions for reducing the emissions of the fleet and highlights how we will achieve this. It is an essential document which supports the Council's corporate commitment to improving the environment.

## **6. Appendices**

- 6.1. Appendix 1 – The Green Fleet Strategy
- 6.2 Appendix 2 – Technical Appendices

# Green Fleet Strategy 2025 – 28

## South Kesteven District Council



# Foreword

In 2019, South Kesteven District Council (SKDC) declared a climate emergency. In response, we set a target to reduce council carbon emissions by 30% by 2030. We have made excellent progress toward this target, but to succeed, we must reduce the harmful gases released by our vehicles. Climate change and air pollution are enormous challenges, and to create a more sustainable future, we must act now. This includes improving our vehicle fleet and investing in 21st Century solutions.

SKDC uses a fleet of vehicles every day to provide excellent and efficient services to our residents. A mix of cars, vans, street sweepers, bin lorries, and more. These vehicles help us travel to meet residents, maintain public spaces and parks, collect waste, and enforce planning conditions. While most of these activities must be carried out in person, and vehicles remain the most practical way to cover the 350 square miles of South Kesteven, we know they also contribute to climate change and air pollution.

Everyone deserves clean air to breathe. This Strategy is bold because it aims to improve the health and well-being of every resident of South Kesteven. Cleaner air will benefit everyone, whether cycling to work, walking to school, or sitting at a café with friends. By 2035, our carbon-neutral vehicle fleet will help ensure that everyone who lives, works, and plays in South Kesteven can enjoy a healthier, greener, and cleaner district.

This Green Fleet Strategy describes how SKDC will reduce the environmental impact of our vehicles while maintaining the high standards our residents expect. Our goal is for our vehicles to produce as few harmful gases as possible—and, where possible, produce zero emissions. Achieving this will require innovation, sustainable technology, and rethinking how we operate and deliver services.

To meet these goals, we will:

- Reduce vehicle mileage and optimize waste collection routes,
- Promote green and sustainable technology,
- Support innovation in transport, and
- Make active travel, like walking and cycling, safer and easier.

These changes—and many others outlined in this Strategy—will help us achieve our central goal: ***operating a carbon-neutral vehicle fleet by 2035.***

This Strategy introduces a range of actions—some big, some small—that together will make a significant impact. There is no single solution, but these changes will add up to cleaner air, reduced emissions, and a healthier, greener, and cleaner South Kesteven.

***Councillor Rhys Baker, Cabinet Member for Waste and the Environment***

# Table of Contents

	Page
1	Introduction
2	Vision & Key Outcomes
3	Action Plans
4	Policy Statement 1: Green Fleet
5	Policy Statement 2: Travel Optimisation

DRAFT

# 1 Introduction

## The Need for a Green Fleet Strategy

South Kesteven District Council use a range of vehicles to deliver their statutory and non-statutory services. Activities including maintaining the public realm, undertaking enforcement, delivering housing and other services to residents and collecting and disposing of waste all require the support of a fleet. Whilst the Council has a well-established fleet service, it is evident that there is more to work to do reducing the environmental impact. Fleet emissions now represent the single largest area of carbon emissions for the Council, and emissions have been static or growing since regular carbon reporting commenced in 2018. It will not be possible for the Council to meet overall net zero goals without addressing decarbonisation of the fleet. Therefore, this Green Fleet Strategy has been developed to highlight how the Council will continue to use its fleet to facilitate service delivery whilst also driving down the environmental impact of the service area. The strategy will cover the 3-year period from 2025-28.

## Vehicles and the Environment – the Problem

South Kesteven is a predominantly rural district with a population of 143,400 people, it covers 365 square miles and is strategically located alongside the A1. Most of the population lives within the four historic market towns of Bourne, Grantham, Stamford and The Deepings. The remainder live in the network of villages and rural dwellings. The geographical spread of the population throughout the district means that travel by motor vehicle is the most likely choice for service delivery. In 2021, the Council's services drove 1,473,371 miles and produced 1,988 tonnes of greenhouse gas emissions (Transport Decarbonisation Report, 2022).

To service the district's needs, the current fleet is made up of over 160 vehicles and over 80 pieces of machinery; with the exception of two pool cars, everything else is powered by traditional fossil fuels. Alongside the impacts on the environment, the emissions from fossil fuels are known to affect people's health, impact quality of life and contribute to noise pollution.

The Council's 2023/24 update on its carbon reporting highlighted that the carbon emissions from the operation of the vehicle fleet remains consistently high, showing little change from the 2018/19 baseline. The fleet is now the largest contributor to the Council's carbon emissions, responsible for 34% of emitted carbon during the 2023/24 financial year.

The Council has pledged to reduce carbon emissions for a 2030 target and has committed to create a more sustainable district within their Corporate Plan 2024-27. Furthermore, the government has mandated that from 2035 it will be illegal to sell new petrol and diesel vehicles, and there is a national target to meet the 'net zero' emissions target by 2050.

## The Council's Commitments

This strategy and action plan is supported by several documents, and it is designed to align with the climate goals of the Council as a whole. The fleet plays a large role in reaching the 2035 net zero target and therefore it is essential that this strategy aligns with the following documents:

- The Corporate Plan 2024 – 27: The Corporate Plan is made up of five priorities, one of which is '**Sustainable South Kesteven**'. This mission of this priority is to 'meet the challenge of climate change and ensure a clean, green and healthy natural and built environment for present and future generations'. A key target within this document is to reduce the operational carbon footprint by 30% between 2019 and 2030.

- South Kesteven Climate Action Strategy: this document sets out the Council's vision, aims and high-level ambition to mitigate and adapt to climate change.
- The Transport Decarbonisation Report, 2022: this document was written by the energy saving trust and it is a technical breakdown of the environmental impact of the fleet with recommendations for improvements.

These documents provide the corporate and technical background for this strategy, and together with this document they highlight how the Green Fleet Strategy and Action Plan will contribute to the Council's environmental aims.

To support this document, a **Technical Appendices** has also been created. The Technical Appendices contains an in-depth breakdown of the information used to create to this strategy and action plan and it is anticipated that the documents will be used in tandem. This document will set out the high-level aims and objectives with linked action plans, the Technical Appendices will provide all the additional technical information which has been used to inform the strategy.

## What is the Green Fleet Strategy

The Green Fleet Strategy provides a structure for delivering services in the most energy efficient way, it is based on the following principles:

- Adopting cleaner technologies and fuels – embedding green criteria within the Council's procurement process to encourage the exploration of alternative vehicles.
- Encouraging efficient vehicle use – introduce a system for monitoring and analysing vehicle usage across all service areas to explore how overall fuel usage can be reduced.
- Managing demand – reducing mileage, encouraging efficient journey planning and optimising routes. This will include rationalising the fleet to reduce the number of vehicles required where possible and ascertaining where vehicle life cycles can be extended. Current practices will be examined and improved to ensure demand is managed to maximise resource efficiency.
- Improving supporting infrastructure – the new depot project (due to complete in late 2025) offers the opportunity to increase the number of EV charging points. This increase will influence the vehicle replacement schedule moving forward.

## The Council's Fleet and Grey Fleet

The Council runs a mixed fleet which procures, repairs and maintains vehicles and machinery for a variety of services including Waste, Street Scene, Housing and Markets. The Transport Team look after 243 vehicles/machinery and Table 1 shows a breakdown of the vehicles and machinery. Currently, only two of the vehicles operated by the Council are electric vehicles; these are two Renault Zoes which reside within the pool car stock.

**Table 1: Current Fleet Breakdown (2024/25)**

Vehicle Type	Service Area	Fleet Size
RCV 32 Tonne	Waste	4
RCV 26 Tonne	Waste	21
RCV 22 Tonne	Waste	2
RCV 18 Tonne	Waste	2
HGV – Other	Waste	8
Pool Cars	All	17
Hook lift	Waste	1
Pick Up	Street Cleansing	6
Large Sweeper	Street Cleansing	3

Small Sweeper	Street Cleansing	4
Tractor	Street Cleansing/Markets	1
Van	Street Cleansing/Housing/Waste	87
Machinery	Street Cleansing (Grounds Maintenance)	87
<b>Total</b>		<b>243</b>

In 2022, the Council commissioned a ‘Transport Decarbonisation Report’. The report was written by the Energy Saving Trust, and it provided a benchmark for the greenhouse gas emissions and the energy consumption associated with its road transport fleet. Throughout 2021 (the operational year assessed by the report) SKDC’s road transport drove 1,473,371 miles and consumed 6,741 megawatt of fossil fuel energy; around 1,988 tonnes of greenhouse gas emissions were produced. Table 2 shows the breakdown of greenhouse gas emissions and energy consumption by vehicle type for the Council’s fleet (2021 figures).

A further consideration is the use of the Council’s grey fleet – these are vehicles which are owned by employees but used for travel associated with work. Due to the nature of the grey fleet, the Council has no control over the environmental merits of personal cars. However, the Council operates a pool car system, and this strategy explores how the use of this system can be improved to reduce the environmental impact of the grey fleet.

A full breakdown of the data used to support this strategy document can be found in the Technical Appendices, this includes an in-depth breakdown of the environmental impact of the fleet.

### **The Document’s Structure – How to Use This Strategy**

This document highlights the vision and key objectives of the Council alongside action plans for each key objective. The action plans will be implemented and monitored in partnership with the key stakeholders. The document contains the following sections –

- **Section 2:** Vision and Key Objectives – this section sets out the high-level vision of the Council and highlights the agreed key objectives which will remain the same throughout the period of the strategy, they form the basis of this strategy and are essential for building a solid foundation for a change of culture around fleet management.
- **Section 3:** Action Plans – this section will be ‘live’ and it will be reviewed and updated annually to reflect any changes in strategic direction, policy or legislation. The action plans will also include a monitoring process which will identify areas of strength and weakness and help guide the decisions made at the annual review. The key KPI’s will be monitored through the Corporate Plan performance management process.
- **Section 4 and 5:** Policy Statements – these sections set out key changes to the Council’s procurement policy and travel policies. These changes, whilst they will take time to implement, are key to the long-term success of the green fleet aspiration.

### **Supporting Information / Technical Appendices**

In addition to this document, there is also a Technical Appendices document which contains supporting and in-depth information on the Council’s fleet, the environmental impact of the fleet and the financial implications of ‘greening’ the Council’s fleet.

## 2 Vision and Key Outcomes

The automotive industry is currently experiencing rapid technological change; green technologies and alternative fuel options are emerging indicating a step change in the industry with a renewed focus on reducing emissions and maximising efficiency. This change is driven by the Government's commitment to reach 'net zero' by 2050, alongside the Government's pledge to ban the sale of new petrol and diesel vehicles by 2035. South Kesteven District Council's (the Council's) fleet is predominantly made up of diesel vehicle's, except for two electric cars. This strategy aims to address this imbalance and facilitate a change from the current dependence on fossil fuelled vehicles to a greener approach to vehicle procurement and utilisation.

It is the vision of this strategy that *by the end of the 3-year period, the fleet is considerably less dependent upon fossil fuels and making use of green technologies and behaviours; this includes considering electric vehicles and alternative fuels alongside the smart use of vehicles to reduce avoidable journeys.* This is a facilitating strategy; green technology is still in its infancy and there is much debate over the best way forward within the industry. It is because of this inertia that this three-year strategy will focus on how the carbon emissions of the current fleet can be reduced without a full switch to one solution.

To meet this vision, three key outcomes have been identified to help us to address the key challenges we face over the next three-years. These outcomes are –

- 1. Facilitate the transition to a carbon neutral fleet through the usage of green technology including electric vehicles and alternative fuels,**
- 2. Facilitate the transition to greener driving behaviours and more effective fleet usage by ensuring vehicles are used as efficiently as possible and eliminating unnecessary journeys, and**
- 3. Ensure the fleet is fit for present and future service delivery.**

This strategy will focus on how each of the three key outcomes can be developed to ensure that the Council's fleet not only reduces emissions but is also fit for delivering efficient and effective services in the face of planned and unexpected changes throughout the years ahead. For each key outcome, a series of indicators have been defined to enable the delivery of the outcome.

### **Outcome 1: Facilitate the transition to a carbon neutral fleet through the usage of green technology including electric vehicles and alternative fuels**

This outcome focusses on how the target to reduce carbon emissions by 2030 (Corporate Plan 2024-27) will be achieved. This will be achieved through a dual focus of:

1. A switch to electric vehicles, and
2. Other initiatives which focus on improving efficiency and indirectly reducing emissions, these include:
  - Explore the use of alternative, low-emission fuel alternatives including hydrogenated vegetable oil (HVO), and
  - Exploring innovative options such as trialling home charging for electric vehicles which are stored at home overnight.

To ensure this is achieved, the following key indicators have been developed and will be our focus over the next three years.

<b>Outcome 1: Facilitate the transition to a carbon neutral fleet</b>	
<b>Key indicators</b>	
1.1	Annual reduction in vehicle CO2 emissions through utilisation of alternative fuels and electric/hybrid vehicles where feasible.
1.2	Establish an E-vehicle home charging trial for vehicles which are stored at home overnight.

## **Outcome 2: Facilitate the transition to greener driving behaviours and more effective fleet usage by ensuring vehicles are used as efficiently as possible and eliminating unnecessary journeys**

This outcome focusses on how behaviours can be changed to maximise the efficiency and effectiveness of the fleet. This will be achieved through a focus on:

1. Data collection – establishing a baseline on current vehicle usage which includes the council owned fleet, pool cars and grey fleet,
2. Maximising efficiencies – reviewing vehicle utilisation and routes to assess whether fewer vehicles are required overall, the vehicle types selected are fit for purpose and journeys are carried out in the most effective order, and
3. Improving behaviours – using technology to analyse driver behaviour and educating drivers on the most environmentally friendly ways to utilise vehicles.

<b>Outcome 2: Facilitate the transition to greener driving behaviours and more effective fleet usage by ensuring vehicles are used as efficiently as possible and eliminating unnecessary journeys</b>	
<b>Key indicators</b>	
2.1	Establish baseline data for current fleet usage which covers the usage of council owned vehicles, pool cars and grey fleet.
2.2	Undertake a vehicle utilisation assessment and route review and establish areas for improved efficiency.
2.3	Work with each service area to identify best practice driving behaviours and how these can be rolled out to their team.

## **Outcome 3: Ensure the fleet is fit for present and future service delivery**

This outcome focusses on ensuring that the Council's Transport Team can support service delivery at the present time and into the future. This outcome has two focusses:

1. Compliance – ensuring that the service is compliant with the terms of the Operator's Licence, ensuring all scheduled and reactive repairs and maintenance are completed in-line with legislative requirements and ensuring employees using fleet vehicles are legally compliant (licence, speeding etc.), and
2. Procurement – providing professional advice to service users on vehicle procurement specifications, working in partnership with service users to identify suitable replacement types and ensuring that vehicle procurement is completed as per the relevant financial process.

This will be achieved through the following indicators.

<b>Outcome 3: Ensure the fleet is fit for present and future service delivery</b>	
<b>Key indicators</b>	
2.1	Ensure SKDC's fleet and Operating Centres remain compliant with the conditions of the Operator's Licence.
2.2	Retain 'Green' OCRS (Operator Compliance Risk Score) status.
2.3	Establish a Transport User Group to monitor policy compliance and driver behaviour across all departments using vehicles. The group will establish terms of reference and relevant KPI's in line with policies.
2.4	Health and Safety – ensure Risk Assessments and relevant documents are reviewed annually and after any significant incident.

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### 3 Action Plans

This strategy is based on three key outcomes which will enable us to address the key challenges and achieve the vision of the strategy. The previous section outlined the outcomes and the high-level indicators which will be used to monitor progress against the outcomes; this section outlines the key actions which will also be monitored to facilitate the delivery of the indicators and ultimately the three key outcomes.

#### **Outcome 1: Facilitate the transition to a carbon neutral fleet through the usage of green technology including electric vehicles and alternative fuels**

Key Indicator	Actions		Outcomes
Annual reduction in vehicle CO2 emissions through utilisation of alternative fuels and electric/hybrid vehicles where feasible.	1.1a	Year on year increase in the use of HVO (or another suitable alternative).	<ul style="list-style-type: none"><li>• Year on year increase in the use of alternative, low emission fuels</li></ul>
	1.1b	Replace vehicles with electronic alternatives as replacements become due, in-line with budget, procurement and infrastructure requirements. This will include 4 x EV's within this 3-year period.	<ul style="list-style-type: none"><li>• Ensure 4 electric vehicles are included within the vehicle replacement programme for the next 3 years, in line with infrastructure allowances at the new depot</li></ul>
	1.1c	Introduce a BEV procurement policy that follows a clear process to prioritise BEV purchases (based on highest efficiency and the greatest potential to reduce GHG emissions). The process should consider utilisation, whole life costs and emissions as part of the vehicle procurement.	<ul style="list-style-type: none"><li>• Review all current fleet-related policies and processes with a view to embedding the 'green fleet' principles</li></ul>
	1.2a	Create a business case for the implementation of the trial, if successful, roll out the trial and monitor performance.	<ul style="list-style-type: none"><li>• Collect data throughout the trial period to ascertain the success of the trial and the viability of rolling this out more widely within the council</li></ul>
	1.2b	Once complete, analyse the success of the trial and ascertain if this can be rolled out on a larger scale.	<ul style="list-style-type: none"><li>• Establish a programme for further roll out</li></ul>

**Outcome 2: Facilitate the transition to greener driving behaviours and more effective fleet usage by ensuring vehicles are used as efficiently as possible and eliminating unnecessary journeys**

Key Indicator	Actions		Outcomes
Establish baseline data for current fleet usage which covers the usage of council owned vehicles, pool cars and grey fleet.	2.1a	Create baseline from existing data and identify areas for improvement.	<ul style="list-style-type: none"> <li>Established baseline data set which clearly defines starting position to track progress against within 3 months of strategy adoption</li> </ul>
	2.1b	Where possible, benchmark data against other local authorities and identify where best practice can be shared.	<ul style="list-style-type: none"> <li>Identify suitable network which offers benchmarking against like for like authorities within 3 months of strategy adoption</li> </ul>
Undertake a vehicle utilisation assessment and route review and establish areas for improved efficiency.	2.2a	Undertake vehicle utilisation review and establish vehicles which are under-utilised and explore alternative options.	<ul style="list-style-type: none"> <li>Annual review of vehicle utilisation which aligns with the council's vehicle replacement programme to ensure there isn't a vehicle surplus</li> </ul>
	2.2b	Undertake a route review for each service area and establish areas where route optimisation would be effective.	<ul style="list-style-type: none"> <li>Introduce optimised routes for all service areas alongside a process for regular route optimisation assessments</li> </ul>
	2.2c	Establish mechanism within the Transport User Group (Outcome 3) to monitor and improve vehicle utilisation and route optimisation.	<ul style="list-style-type: none"> <li>The creation of a mechanism which allows high-level monitoring of performance through the user group</li> </ul>
Work with each service area to identify best practice driving behaviours and how these can be rolled out to their team.	2.3a	Establish training plan for all employees who are required to drive council vehicles.	<ul style="list-style-type: none"> <li>Training plan to be rolled out to relevant service areas within one year of strategy adoption</li> </ul>
	2.3b	Create monitoring process which allows poor driving behaviours to be identified and rectified through training and education.	<ul style="list-style-type: none"> <li>The creation of key KPI's which allow high-level monitoring of performance through the user group</li> </ul>

### Outcome 3: Ensure the fleet is fit for present and future service delivery

Key Indicator	Actions		Outcomes
Ensure SKDC's fleet and Operating Centres remain compliant with the conditions of the Operator's Licence.	3.1a	To ensure that all requirements of the operators' licence requirements are met, including vehicle maintenance, inspections, driving hours and behaviour.	<ul style="list-style-type: none"> <li>Services continue to run seamlessly with no disruption to service delivery</li> </ul>
Retain 'Green' OCRS (Operator Compliance Risk Score) status.	3.2a	To ensure that vehicles are always maintained to a high standard and are properly prepared in advance of their annual MOT.	<ul style="list-style-type: none"> <li>Seamless delivery of transport services</li> </ul>
	3.2b	To ensure Mechanics are trained and accredited to ensure they have the necessary skills required.	<ul style="list-style-type: none"> <li>Continuous and safe delivery of service</li> </ul>
Establish a Transport User Group to monitor policy compliance and driver behaviour across all departments using vehicles. The group will establish terms of reference and relevant KPI's in line with policies.	3.3a	Establish the group including: <ul style="list-style-type: none"> <li>Membership,</li> <li>Meeting interval,</li> <li>Terms of reference,</li> <li>KPI's, and</li> <li>Roles and responsibilities.</li> </ul>	<ul style="list-style-type: none"> <li>Establish group within 3-months of strategy adoption</li> <li>Establish KPI's for performance and improvement monitoring at initial meeting of the group</li> </ul>
	3.3b	Monitor and feedback progress through annual corporate performance reporting through the Corporate Plan.	<ul style="list-style-type: none"> <li>Incorporate agreed KPI's into the corporate performance monitoring process within first year of strategy adoption</li> </ul>
Health and Safety – ensure Risk Assessments and relevant documents are reviewed annually and after any significant incident.	3.4a	Undertake annual review of risk assessments and safe systems of work.	<ul style="list-style-type: none"> <li>Completion of annual review of relevant RA's and SSOW</li> </ul>
	3.4b	Undertake additional reviews when relevant in-line with legislation updates, policy changes and health and safety recommendations.	<ul style="list-style-type: none"> <li>Undertake additional reviews when required and as advised by the corporate Health and Safety team</li> </ul>

## 4 Policy Statement 1: Green Fleet

### Green Vehicle Procurement Process

This strategy will only be effective if specific processes are altered to ensure they support the delivery of the key objectives. One area essential to this success is procurement. Therefore, to coincide with the implementation of this strategy the procurement process for vehicles will be amended to reflect the Council's commitment to the green fleet.

The Transport Manager and Procurement Lead will be required to:

- Assess the options and ensure the most environmentally friendly option is chosen when a vehicle is procured,
- Assess the vehicle needs of the year ahead and adjust the budget requirements to reflect the additional costs associated with more environmentally friendly options,
- Propose and encourage the uptake of low/zero emission vehicles with service area leads, and
- Carry out an annual assessment of vehicle utilisation to ensure vehicles are rationalised wherever possible.

## 5 Policy Statement 2: Travel Optimisation

This strategy will only be effective if specific processes are altered to ensure they support the delivery of the key objectives. An additional area essential to this success is a travel optimisation. This is a decision-making process which encourages staff to minimise travel, reduce overall travel time and mileage and minimise emissions. In addition, it aligns with the Council's health and wellbeing priorities by encouraging employees to consider walking or cycling to work destinations as opposed to using a vehicle.

Travel optimisation sets out a decision-making process to minimise travel and its impact, and it includes:

- Does there need to be an 'in person' meeting?
- Will an audio or web conference meet the business need?
- Can a more sustainable mode of travel be used such as walking, cycling or public transport?
- Is there a low emission pool or car club vehicle available?
- Can the journey be shared with a colleague?
- What is the best time for the meeting to minimise journey disruption?

This is a new concept which has been enabled by developing technology over recent years and to ensure it is embedded, it has been included in the action plan for Outcome 1.

# Green Fleet Strategy

## Technical Appendices

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The Green Fleet Strategy is supported by this technical document, which provides the technical information required for the successful delivery of the strategy.

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# Technical Appendices

	Page
<b>Glossary of Terms</b>	3
<b>Appendix 1: Current Fleet Characteristics</b>	4
<b>Appendix 2: National Commitments and Council Priorities</b>	7
<b>Appendix 3: Transport Decarbonisation Report Summary</b>	9
<b>Appendix 4: Encouraging Active Travel</b>	11
<b>Appendix 5: Financial Benefits and Implications</b>	12

## **Glossary of Terms**

BEV Battery Electric Vehicle

GHG Greenhouse Gas emissions (used interchangeably with carbon)

ICE Internal Combustion Engine – Petrol/Diesel/Gas

HVO Hydrogenated Vegetable Oil – also known as biodiesel HVO

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## Appendix 1: Current Fleet Characteristics

### 1.1 The Council's Fleet

This Green Fleet Strategy will focus on vehicles used directly by the Council. The Council's grey fleet and vehicles used by contractors will be included, however, this strategy will be the first time these arms of the extended fleet are brought together. Based on this, the primary focus of this strategy will be the vehicles used by the Council, with a secondary focus on the extended fleet.

The Council runs a mixed fleet which procures, repairs and maintains vehicles and machinery for a variety of services including Waste, Street Scene, Housing and Markets. The current fleet is made up of 254 vehicles/machinery, Table 1 shows a breakdown of the vehicles and machinery.

**Table 1: Current Fleet Breakdown**

Vehicle Type	Service Area	Fleet Size
RCV 32 Tonne	Waste	4
RCV 26 Tonne	Waste	21
RCV 22 Tonne	Waste	2
RCV 18 Tonne	Waste	2
HGV – Other	Waste	8
Pool Cars	All	17
Hook lift	Waste	1
Pick Up	Street Cleansing	6
Large Sweeper	Street Cleansing	3
Small Sweeper	Street Cleansing	4
Tractor	Street Cleansing/Markets	12
Van	Street Cleansing/Housing/Waste	87
Machinery	Street Cleansing (Grounds Maintenance)	87
<b>Total</b>		<b>254</b>

Currently, only two of the vehicles operated by the Council are electric vehicles; these are two Renault Zoes which reside within the pool car stock.

### 1.2 The Carbon Footprint of the Fleet

In 2022, the Council commissioned a 'Transport Decarbonisation Report'. The report was written by the Energy Saving Trust, and it provided a benchmark for the greenhouse gas emissions and the energy consumption associated with its road transport fleet. Throughout 2021 (the operational year assessed by the report) SKDC's road transport drove 1,473,371 miles and consumed 6,741 megawatt of fossil fuel energy; around 1,988 tonnes of greenhouse gas emissions were produced. Table 2 shows the breakdown of greenhouse gas emissions and energy consumption by vehicle type for the Council's fleet (2021 figures).

**Table 2: Greenhouse Gas Emissions and Energy Usage of Current Fleet (values)**

Fleet Category	Fleet Size	Annual Mileage	Greenhouse Gas (tonnes)	Energy (MWh)

Refuse Collection Vehicle (RCV)	32	400,650	1,283	4,348
Heavy Commercial Vehicle (HCV)	12	161,287	216	731
Light Commercial Vehicle (LCV)	98	857,751	445	1,513
Car	15	53,683	15	50
Other	14	1,659	29	99
<b>Total</b>	<b>157*</b>	<b>1,473,371</b>	<b>1,988</b>	<b>6,741</b>

\*This total is different to Table 1 as the data is from 2021 and it does not include the machinery element which the workshop now maintain.

Alongside the figures highlighted in Table 2, the Transport Decarbonisation Report highlighted that the RCV aspect of the fleet was responsible for 27.2% of the overall milage covered by the entire fleet. However, the RCV's were responsible for 64.5% of greenhouse gas emissions and 64.5% of energy usage. In contrast, the LCV's within the fleet account for 58.2% of the milage but only 22.4% of the greenhouse gas emissions and energy usage respectively. A full breakdown of the milage, greenhouse gas emissions, and energy usage by vehicle type can be viewed in Table 3.

**Table 3: Greenhouse Gas Emissions and Energy Usage of Current Fleet (%)**

Fleet Category	Fleet Size	Annual Mileage	Greenhouse Gas (tonnes)	Energy (MWh)
Refuse Collection Vehicle (RCV)	18.7	27.2	64.5	64.5
Heavy Commercial Vehicle (HCV)	7.0	10.9	10.8	10.8
Light Commercial Vehicle (LCV)	57.3	58.2	22.4	22.4
Car	8.8	3.6	0.7	0.7
Other	8.2	0.1	1.5	1.5
<b>Total</b>	<b>100</b>	<b>100</b>	<b>100</b>	<b>100</b>

It is evident from the information in Table 2 and Table 3 that to elicit the biggest greenhouse gas reduction, it is essential that the RCV fleet form part of the solution. Currently, only two vehicles within the fleet are electrically powered, these vehicles are small cars which reside within the pool car category. This category only accounts for 3.6% of the fleets total annual milage and 1.5% of the greenhouse gas emissions.

### 1.3 The Grey Fleet / Contractors Fleet

The 'grey fleet' refers to vehicles privately owned or leased by employees but used for business travel. This aspect of the fleet is hard to manage because the vehicles are not the property of the Council and as a result, the owners of the vehicles are solely responsible for making decisions on the environmental merits of the vehicle.

The Council currently operates 17 pool cars which can be used by employees to undertake work-related travel. Employees are encouraged to use the pool cars rather than using their own vehicle, however, there is no requirement to use a pool car.

Currently, there is no requirement for the vehicles used by contractors commissioned by the Council to have an environmental policy

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## Appendix 2: National Commitments and Council Priorities

### 2.1 National Commitments

The UK Government has pledged to reduce greenhouse gas (GHG) emissions and vehicle usage plays a large part in this commitment. Transport is the single largest contributor to domestic GHG emissions, responsible for 28% in 2022 (latest available data). Despite GHG reductions in other sectors of the economy, notably electricity generation and waste disposal, transport emissions remain stubbornly high. Key deadlines which the Council will be required to adhere to include:

1. To reach 'net zero' by 2050,
2. A ban on the sale of new petrol and diesel vehicles by 2035 (previously 2030).

In 2021 government published a *Decarbonising Transport* report, setting out how addressing carbon emissions fits into national net-zero carbon goals as well as delivering wider benefits. This outlines, amongst other transport-wide initiatives, a priority to decarbonise road vehicles, noting that a fleet of fully zero emissions vehicles will reduce

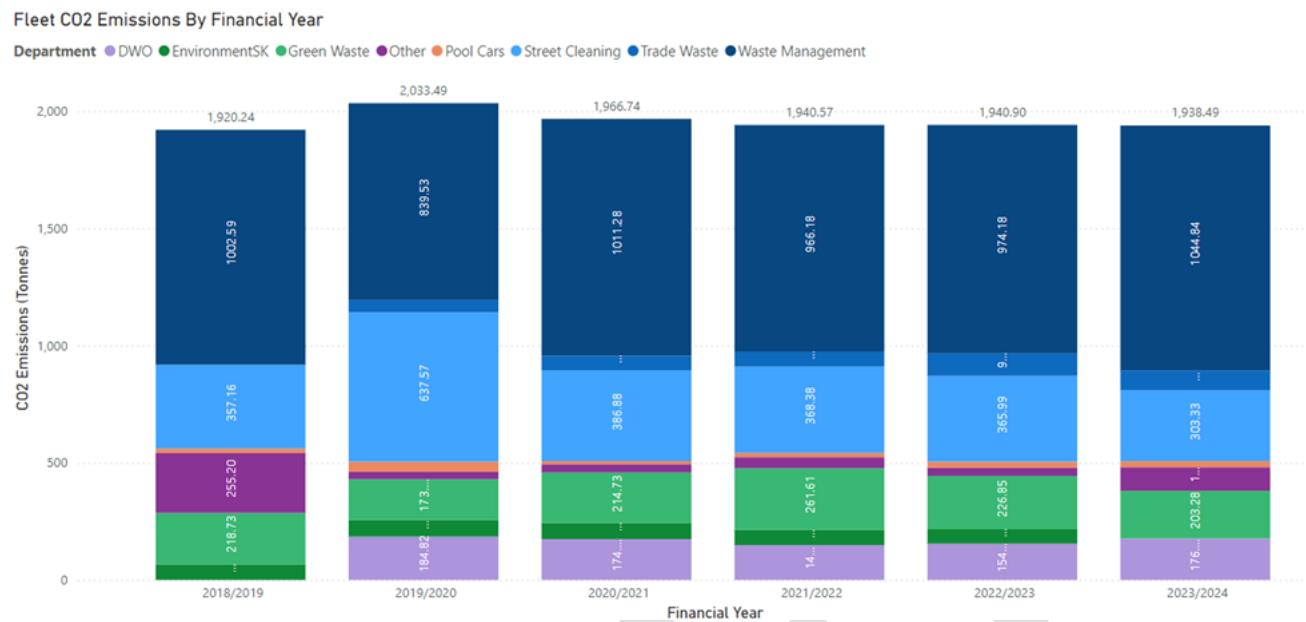
### 2.2 Our Council's Priorities

South Kesteven District Council declared a climate emergency in September 2019 and confirmed the target to reduce carbon emissions from Council operations by at least 30% by 2030 and to net zero as soon as viable before 2050.

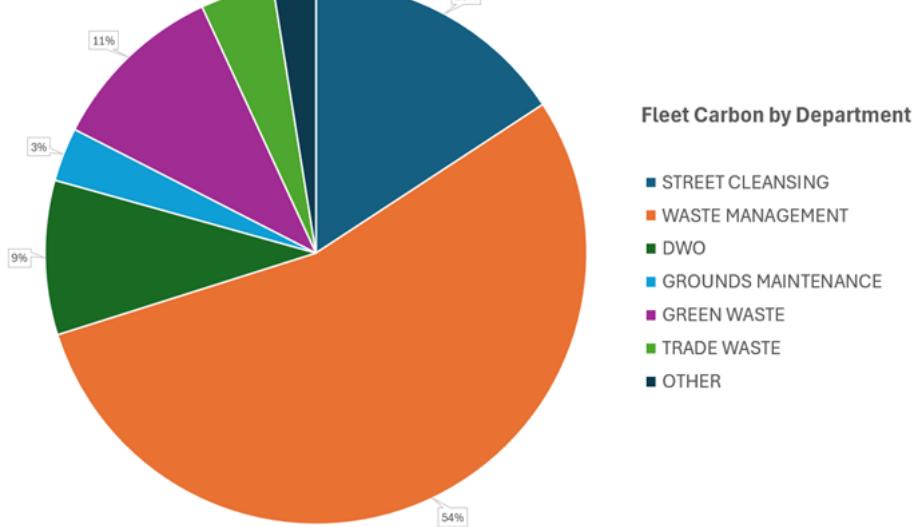
SKDC have published an annual carbon emissions report every year since the baseline year of 2018/19, and in the latest update for the 2023/24 year reported an overall 25.3% reduction on the baseline year. Emissions from the vehicle fleet are now the single largest emissions category, responsible for a third of the Council's total reported carbon emissions. Sustained reductions have been implemented in other areas (including energy used in Council owned buildings and leisure facilities), yet emissions from the vehicle fleet have remained static. Figures 1 and 2 show a breakdown of the fleet carbon emissions by year and department. These figures clearly show that Waste Management and Street Cleansing are key areas of focus.

To work towards national net zero carbon targets, South Kesteven District Council will need to address the decarbonisation of the vehicle fleet to ensure that sustained reductions in carbon emissions are met.

**Figure 1: Fleet Carbon Emissions by Financial Year**



**Figure 2: Fleet Carbon Emissions by Department**



## Appendix 3: Transport Decarbonisation Report Summary

### 3.1 Outline of the Report

South Kesteven District Council (SKDC) sought this report in 2022 to benchmark the greenhouse gas (GHG) emissions and the energy consumption (megawatt hours - MWh) associated with its road transport fleet in 2021 and to establish how its fleet could be decarbonised. The analysis was undertaken by Energy Saving Trust and funded by the Department for Transport (DfT). In 2021, SKDC's road transport drove 1,473,371 miles, producing 1,988 tonnes of GHG emissions. If the whole SKDC-operated road fleet could be transitioned to battery electric vehicles (BEVs) we would expect the energy use to fall by at least 70%, from 6,741 MWh to 2,022 MWh a year.

Costs associated with this fleet energy saving can contribute to funding the higher purchase (or lease) costs of the BEVs, as well as the electric vehicle charging infrastructure (EVCI). It is why the use of a whole life cost (WLC) procurement process is so important. Additional savings arise from the reduced cost of maintaining an electric vehicle drivetrain and chassis.

SKDC has declared a climate emergency and has committed to reducing GHG emissions by at least 30% by 2030 and achieving net zero as soon as is viable before 2050. The UK's new Nationally Determined Contribution, announced in December 2020, commits the UK under the 2015 Paris Agreement to a 68% reduction in GHG emissions from 1990 levels by 2030. Under UK law (Climate Change Act) the country is also committed to a 78% reduction in GHG emissions by 2035.

If entirely powered from the UK Grid in 2030, the fleet will still be associated with a predicted annual 102 t of GHG emissions, which is a 95% reduction from the 2021 baseline, but if powered from private wire renewable generation, the fleet would be net zero, with no requirement to fund off-sets of residual GHG emissions.

SKDC also have opportunities to further enhance the efficiency of their fleet operation and optimise emission reductions through:

- Integration of data sources and CAN bus connectivity with telematics.
- Establish a fleet transition team, to ensure all relevant aspects of electrification are covered.
- Review vehicle utilisation and downsize LCVs where possible. Review how vehicles are held by departments, how this is costed and if pooling could be more efficient in some cases.
- Review how pool car use is costed to internally to departments, with the clear aim to improve utilisation and prevent block booking.
- Introduce a BEV procurement policy that follows a clear process to prioritise BEV purchases (based on highest efficiency and the greatest potential to reduce GHG emissions). The process should consider utilisation, whole life costs and emissions as part of the vehicle procurement.
- Adapt fleet replacement cycles and procurement policies to BEV (in line with battery warranties to allow more cost recovery).

With a clear trajectory to decarbonisation based on the adoption of battery electric vehicles, SKDC should ensure that the depot facilities have sufficient power capacity to charge the fleet. It is likely that AC charging could form the vast majority of the infrastructure, and the

combined fleet would require a capacity of 775kVA across all locations where vehicles are charged. When installing infrastructure, SKDC should plan for the long term, in terms of capacity, wiring, and ducting to ensure costs aren't duplicated and sites do not need to be excavated more than once. If wiring is in place, chargers could be swiftly added at a later date when each subsequent tranche of electric vehicles are added to the fleet.

### **3.2 Recommendations from the Report**

- Review and improve vehicle data integration, telematics capabilities.
- Conduct a review of vehicle utilisation and a right-sizing exercise, across the fleet.
- Replace 15 cars with BEV equivalents as replacements become due.
- Replace 24 small or medium vans with BEV equivalents as replacements become due.
- Replace 35 3.5t panel vans and 15 3.5t chassis with BEV equivalents as replacements become due.
- Replace RCVs with eRCVs where this is operationally viable
- Rearrange vehicle allocation to maximise the potential for BEV and eRCV replacement
- Plan and invest in a future BEV charging infrastructure

## Appendix 4: Encouraging Active Travel

### 4.1 The Impacts of Vehicles and the Benefits of Active Travel

Reliance on vehicle transport can have a significant negative impact on our communities through air pollution, traffic noise and road safety as well as the wider impacts of climate change and associated greenhouse gas (GHG) emissions. Investment is needed in the transport network and across various schemes to support more journeys on foot, by bicycle and by public transport to rebalance movement away from the private car.

As economic growth brings in more people, businesses and opportunities, the demand for travel will increase across South Kesteven and its market towns. It is evident that the existing network does not fully meet the needs of the existing community. In order for the district to continue to flourish, inclusive and sustainable travel choices are a priority. There is a clear need to improve the reliability and resilience of the transport network, provide convenient public bus services, safe cycle routes and promote an attractive people focused town centre. This will support the move towards cleaner, more sustainable transport and reduce the environmental impacts of vehicle driven travel.

Furthermore, active travel is linked to health benefits that are achieved through an increase in physical activity and movement, boosting social connections and proximity to nature. Promoting a higher quality public realm can create more adaptive, resilient communities.

### 4.2 Promoting Active Travel in South Kesteven

In March 2023 South Kesteven District Council agreed to support the Lincolnshire's District Health and Wellbeing Strategy which is structured around 5 lever areas. Two of which focus on activity and wellbeing, and the environment and climate.

The Grantham Transport Strategy largely focuses on these key elements, highlighting the importance of active travel through walking and cycling. The purpose of the strategy is to provide a framework for improving the travel choices and everyday journeys for people living, working, and visiting Grantham in the short, medium, and longer term.

There are a range of challenges that the transport strategy will help the town and the surrounding area to meet, these include:

- The significant environmental challenges resulting from transport and travel and the transition to low carbon travel. This includes town centre air quality, protecting the town's historic nature and green spaces and seeking to tackle climate change by using more sustainable forms of travel and transitioning to low emission vehicles.
- Supporting the recovery and growth of Grantham's key economic sectors by improving the reliability and the resilience of the strategic highway network.
- The need to provide a connected and reliable transport network which serves both the urban centre and more rural areas.
- The need for travel choice and flexibility across different and changing travel demands and patterns, including how people access different activities such as employment, education, healthcare, retail, leisure, and tourism.

## Appendix 5: Financial Benefits and Implications

### 5.1 Savings and Benefits of Going Electric

There are several significant benefits from moving from internal combustion engine (ICE) vehicles to battery electric vehicles (BEV). The main benefits are set to include:

#### Reduction in air pollution via tailpipe emissions

- Every litre of fuel burnt, or mile driven in an ICE vehicle, is associated with emissions of many substances of concern which have adverse impacts on human health. The emissions generated include hydrocarbons (HC), non-methane hydrocarbons (NMHC), carbon monoxide (CO), nitrogen oxides (NOX – nitrogen monoxide NO and nitrogen dioxide NO2) and particulate matter (PM).
- Moving to BEVs will eliminate tailpipe emissions of NOX and PM but will still leave particulate “emissions” associated with the brakes, tyres and recirculation.
- Air quality is an issue in South Kesteven. SKDC has one Air Quality Management Area (AQMA) covering central Grantham and is linked to transport emissions. Therefore, it is of vital importance to minimise contributions to poor air quality from the Council’s vehicle fleet.

#### Reduction in overall energy use

- Many ICE vehicles are only 25% to 30% efficient (i.e. only 25% to 30% of energy in the fuel burnt translates to movement) with the losses, mostly heat and friction, occurring in the engine and transmission.
- Electric vehicles are about 80% efficient, with most of the losses occurring in the conversion of AC to DC from the grid to the battery and then back from DC to AC for the electric motor. As a result, BEVs will typically use one quarter to one third of the ICE vehicle’s energy.

#### Reduction in carbon emissions

- There are extremely significant carbon savings to be made moving from ICE vehicles to BEV. This accounts for both the lower overall energy use as described above, as well as the relatively lower carbon intensity of electricity versus diesel fuel.
- The ongoing decarbonisation of the electricity grid, powered by the increasing proportion of renewable energies, projects that electricity will continue to reduce carbon intensity over the next decade.
- Current expectations of carbon emissions can be seen in more detail across vehicle categories below in Table 2. On average an 88% saving can be achieved from moving from ICE to BEV.

#### Lower expected maintenance costs

- Electric vehicles are mechanically simpler than ICE vehicles, with significantly fewer components in the drive train and without a complex transmission and exhaust system. As a result, maintenance costs on average are a lot lower – this can be up to 40% less. Over extended operational periods of 8 to 10 years this can be even greater, as ICE vehicles can incur significant costs in later years.

## 5.2 Use of a Whole Life Cost (WLC) model

Critical to the comprehensive consideration of selection of vehicles for the fleet is use of a Whole Life Cost (WLC) selection model. A WLC model calculates all of the predicted costs of owning and operating a vehicle over its operational lifetime, including capital, servicing, vehicle excise duty and the fuel or energy cost.

In considering the benefits and drawbacks of both petrol/diesel and electric vehicles, it is necessary to consider the WLC in order to understand the large differences in fuel cost versus electricity consumption. Over an electric vehicle's operational life, the large reduction in energy cost to power the vehicle may completely offset the higher purchase cost and can result in an overall cost savings.

Table 1 below sets out a range of indicative WLCs across vehicle categories. These costs include a provision for: fixed overheads including insurance and fleet management; net capital cost of the vehicle using typical models; energy (either diesel or electricity); and a "shadow" carbon cost that represents the societal cost of GHG emissions. Further details on this are available within the Transport Decarbonisation Report completed by the Energy Saving Trust in 2022 on behalf of SKDC.

As a trend, the higher the vehicle mileage over the operation period, the more significant the financial saving of electric vehicles.

**Table 4: Whole Life Costs across different vehicle categories**

Vehicle category	Indicative mileage	Fuel type	Indicative whole life cost	Indicative £/mile
Small car	6,000	Diesel	£33,000	£0.60
		Electric	£29,000-£30,000	£0.59-0.62
	8,000	Diesel	£35,000	£0.48
		Electric	£30,000-31,500	£0.46-0.48
Mid-sized cars	6,000	Diesel	£33,000-38,000	£0.61-0.72
		Electric	£29,000-£32,500	£0.59-0.67
Small light commercial vehicle	6,000	Diesel	£34,000	£0.63
		Electric	£28,500-£32,000	£0.58-0.66
	8,000	Diesel	£38,000	£0.51
		Electric	£29,500-£33,000	£0.45-0.51
Medium light commercial vehicle	8,000	Diesel	£51,000	£0.68
		Electric	£40,000-45,000	£0.61-0.69
	12,000	Diesel	£63,000	£0.53
		Electric	£44,000-£49,000	£0.44-0.49

Large light commercial vehicle	8,000	Diesel	£61,000	£0.83
		Electric	£49,000-72,000	£1.15-0.73

**Table 5: Expected GHG savings across vehicle categories**

Vehicle category	Fuel type	Whole life average GHG emissions (t)	Whole life GHG saving (%) - electric vs diesel
Small car	Diesel	15.05	87%
	Electric	1.95	
Mid-sized cars	Diesel	13.5	88.5%
	Electric	1.7	
Small light commercial vehicle	Diesel	17.65	88%
	Electric	2.1	
Medium light commercial vehicle	Diesel	45.4	87%
	Electric	6	
Large light commercial vehicle	Diesel	32.9	86%
	Electric	4.7	

### 5.3 Implications of Going Electric

There are appreciable savings to be made in moving from a predominantly ICE vehicle fleet to a predominantly BEV fleet. To facilitate this transition effectively, it is helpful to consider a few critical conditions.

Provision of electric vehicle charging infrastructure is naturally fundamental to the provision of an electric fleet. The costs for installation of new charging infrastructure, as a single capital investment, are not included in the above WLCs. For some types of vehicles that do not currently operate on a return to base model, this will involve investigation of alternative methods of charging. This is reflected in the Fleet Strategy action plan.

Rationalising the overall energy consumption of the current vehicle fleet is also a valuable exercise to ensure an electric fleet is fit for purpose and not oversized. Firstly, opportunities to rationalise routes and reduce miles travelled will provide immediate cost and carbon

savings. Secondly, ensuring that each new vehicle purchased for the fleet is the correct specification and not oversized is crucial in moving from ICE to BEV.

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Tuesday, 10 December 2024

Report of Councillor Rhys Baker  
Cabinet Member for Environment and  
Waste

## Waste Policy Update

### Report Author

Kay Boasman, Head of Waste Management and Market Services

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### Purpose of Report

This report provides an update on the amended Waste Policy. The waste collection service at SKDC has undergone several changes since the Policy was last reviewed and updated. These include the introduction of twin stream recycling and battery collections. These service changes have been incorporated into the updated Waste Policy.

### Recommendations

#### The Committee is recommended to:

- 1. Review and provide comments on the updated version of the Waste Policy and recommend that the Policy is progressed to Cabinet.**

### Decision Information

Does the report contain any exempt or confidential information not for publication? No

What are the relevant corporate priorities? Sustainable South Kesteven

Which wards are impacted? All Wards

## 1. Implications

Taking into consideration implications relating to finance and procurement, legal and governance, risk and mitigation, health and safety, diversity and inclusion, safeguarding, staffing, community safety, mental health and wellbeing and the impact on the Council's declaration of a climate change emergency, the following implications have been identified:

### ***Finance and Procurement***

- 1.1 The updates to the Policy are within existing financial resources and therefore there are no financial implications arising from the report.

*Completed by: Richard Wyles, Deputy Chief Executive and s151 Officer*

### ***Legal and Governance***

- 1.2 There are no significant legal or governance implications arising from the report.

*Completed by: Graham Watts, Monitoring Officer*

### ***Community Safety***

- 1.3 The success of the policy is reliant upon a successful partnership between the Waste Team and the Community Safety Team. These links are referenced within the policy document and will be key to its successful implementation.

*Completed by: Ayeisha Kirkham, Head of Service (Public Protection)*

## **Background to the Report**

- 2.1. The Waste Policy document provides the residents of SKDC with an outline of the services provided and helps to manage their expectations regarding service delivery. Furthermore, it acts as a guide to decision-makers on how to handle issues and ensures that any issues are dealt with fairly and transparently.
- 2.2. The current Waste Policy was last updated in 2023, this was before the introduction of the twin stream recycling service and the kerbside collection of batteries. To ensure the policy is up to date, it has been edited to include SKDC's policy in relation to these waste streams.
- 2.3. A further update within this policy is the strengthening of the links between the Waste Team and the Community Protection Team. This relationship helps to ensure that issues which relate to waste but cause issues within the community, can be effectively addressed. This includes misuse of bins and incorrectly presented waste.

### **3. Key Considerations**

- 3.1. The key areas of change within the document are:
  - **Section 10:** Missed Bin/Sack Collections – this section outlines when the service will return for a missed bin and when they will not. It covers the Council's policy on rejected bins (this includes for contamination).
  - **Section 13:** Battery Collections – this section outlines the Council's approach to collecting batteries at the kerbside.
  - **Section 14:** Clinical sharps – the reference to direct deliver to the depot has been removed and collection of sharps bins is referenced as the only option. This is due to health and safety restrictions at the current and new depot; we will continue to accept direct delivery, and residents will not be turned away with sharps bins, however, we will educate and encourage those delivering to the depot to arrange a collection
- 3.2. These sections cover the Council's policy in relation to recent service changes and outline our response to common issues including missed bins. It is essential that the policy clearly and accurately outlines the Council's position on these issues as this will enable officers to make consistent and fair decisions when issues arise.

### **4. Other Options Considered**

- 4.1. The other option considered was to delay the update until after the introduction of weekly food waste collections in 2026. However, this would risk creating ambiguity around our policies for waste collection and therefore an earlier update was agreed.
- 4.2. The Committee is invited to consider and recommend any further changes to the Waste Policy.

### **5. Reasons for the Recommendations**

- 5.1. Due to the introduction of twin stream recycling and kerbside battery collections, the Waste Policy required updating. The policies outlined within the document are all agreed working practices and therefore the policy document ratifies current practices and does not introduce new ones.
- 5.2. Based on this, it is recommended that the amended Waste Policy is supported by the Overview and Scrutiny Committee and recommended to Cabinet for progression.

### **6. Appendices**

- 6.1. Appendix 1: Waste Policy

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## Refuse and Recycling Operational Policy

**DRAFT**

Version	Reason
1.1	Amendments to policy approved 11 January 2016
2	Draft Changes KB/RP October 2024

	Page
<b>Introduction</b>	<b>3</b>
<b>Part 1 – Waste Collection</b>	
1 <b>Presentation of Kerbside Waste – Residents' Responsibilities</b>	4
2 <b>Presentation of Kerbside Waste – The Council's Responsibilities</b>	5
3 <b>Kerbside Waste Collection Services</b>	6
4 <b>Side Waste</b>	7
5 <b>Flats and Communal Bin Stores</b>	8
6 <b>Sack Collections</b>	8
7 <b>Garden Waste Collection – Green Bin</b>	9
8 <b>New, Additional and Replacement Receptacles</b>	10
9 <b>Assisted Collection</b>	11
10 <b>Missed Bin/Sack Collections</b>	12
11 <b>Additional Capacity for Large families</b>	14
12 <b>Bulky Household Waste Collection</b>	14
13 <b>Battery Collections</b>	15
14 <b>Medical and Clinical Waste</b>	16
15 <b>Commercial / Trade Waste Collection</b>	16
<b>Part 2 – Education and Enforcement</b>	
16 <b>Education</b>	17
17 <b>Enforcement</b>	18
18 <b>Appeals against a notice</b>	19
19 <b>Payment of a fixed penalty</b>	19
20 <b>Continued Non-Compliance</b>	19

## **Introduction**

South Kesteven District Council's Refuse and Recycling Policy aims to ensure that waste and recycling services operate effectively and efficiently.

Under the Environmental Protection Act 1990, South Kesteven District Council is a Waste Collection Authority, and as such, has a statutory duty to collect household waste from all domestic properties within its administrative area. The Council has specific powers to specify:

- Where the receptacle(s) must be placed for the purpose of collection and emptying,
- The materials or items which may or may not be placed within the receptacle(s), and
- The size and type of the collection receptacle(s).

The council acknowledges the environmental and community impact of not following proper waste collection practices. Failing to comply can lower recycling rates and leave waste uncollected, which may attract pests, pose health hazards, and create other nuisances.

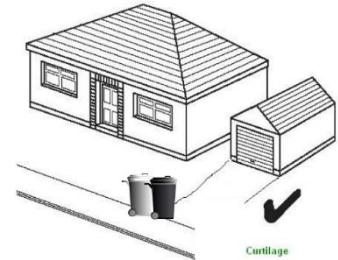
When residents do not comply with the Council's requirements, a proportionate response will be applied in line with the Council's Enforcement Policy. In line with the Section 46 notification, this could involve issuing a fixed penalty notice, taking other legal action, or suspending the collection service which can include removal of waste receptacle.

The council is committed to maintaining a clean, healthy environment and addressing climate change as part of its 'Sustainable South Kesteven' corporate plan. It aligns with the Lincolnshire Waste Partnership's strategic vision: "to pursue the best environmental solutions by providing innovative, customer-focused waste management that delivers value for money for Lincolnshire."

## **Part 1 – Waste Collection**

### **1 Presentation of Kerbside Waste – Residents’ Responsibilities**

- 1.1 Householders are responsible for the contents of their waste receptacles until they are collected by the council.
- 1.2 Residents must present their waste in bins or sacks provided by SKDC on the designated collection day.
- 1.3 Residents must only use household bins or sacks to dispose of waste generated from their own domestic property.
- 1.4 Wheelie bins and sacks should be placed out for collection by 7:30 a.m. on collection day. Householders can present wheelie bins and sacks from 6:00pm the evening before collection day and should take them back within their property boundary by 6:00pm after their collection. Any bins, sacks, or loose waste left on the street outside of collection days will be investigated.
- 1.5 In some cases, such as extreme weather, it may be necessary to collect bins or sacks before 7:30 a.m. When this happens, the council will make every effort to communicate any changes as widely as possible.
- 1.6 Wheeled bins and sacks must be placed at the edge of the householder’s property in a visible location to ensure that collection staff can easily identify them for collection. Please ensure the handles are facing outwards to assist collection staff. Once emptied, bins should be returned to the property boundary as soon as practicable.
- 1.7 For properties located on private roads or shared driveways, bins and sacks must be placed where the private access road or driveway meets the public highway.
- 1.8 Bins should be positioned to prevent obstruction on pavements or walkways, with special consideration for partially sighted pedestrians, wheelchair users, and individuals with pushchairs or prams.
- 1.9 If residents are unable to place wheeled bins or sacks at the edge of the public highway due to access or property location issues, an individual assessment will be conducted to determine an appropriate collection point.



- 1.10 Residents are responsible for the storage, safekeeping, and cleanliness of their waste and recycling receptacles. These receptacles should not be allowed to overflow.

## **2 Presentation of Kerbside Waste – The Council’s Responsibilities**

- 2.1 The council will supply an appropriate number of bins or sacks based on the property type and access requirements. Residents must not present additional bins or use their own.
- 2.2 The council will return bins to their collection point after emptying, unless doing so would cause an obstruction.
- 2.3 If the council causes a spillage, we will clean it up using brushes and shovels. For substances that are difficult to clear, such as paint or oil, a specialist team will be contacted as soon as possible to handle the situation.
- 2.4 Collection days for each residential address will be listed on South Kesteven’s website at [www.southkesteven.gov.uk](http://www.southkesteven.gov.uk). While the council cannot provide a specific time for collection due to factors such as roadworks, vehicle breakdowns, and other uncontrollable circumstances, collections will begin from 7:30 a.m. on the scheduled collection day.
- 2.5 Scheduled collection days can change due to public holidays and the Council will publish these changes on our website, social media channels and emails.
- 2.6 Waste presented for collection may be inspected by an the authorised officer, typically a member of the collection crew. These inspections are conducted to verify that the receptacle contains only the waste allowed for collection on that day.
- 2.7 The council will tag and record bins that fail an inspection and will refuse to collect them. It is the householder’s responsibility to ensure that the receptacle is free from any contamination by the next scheduled collection day.

### 3 Kerbside Waste Collection Services

3.1 The council will supply 240L wheelie bins for the collection of specific waste types. Waste placed in council bins or sacks must correspond to the designated types for each receptacle. Wheelie bins may only be used if there is adequate space within the property boundary to store them. If there is insufficient room for wheelie bins, sacks will be provided (see section 4). The following bins will be provided:

- Black for household/residual waste that cannot be recycled,
- Silver for mixed dry recycling (excluding paper and card),
- Black with purple lid for paper and card, and
- Green for garden waste (subject to subscription).

3.2 The following materials are to be placed in each wheeled bin. The following lists are a guide. A comprehensive list of which items should be put into each receptacle is on our website and is kept up to date and is the definitive list for the purpose of this document [www.southkesteven.gov.uk/whichbin](http://www.southkesteven.gov.uk/whichbin).

3.3 Purple-lidded black bins for paper and card should contain:

All paper and card materials must be clean and dry with no food residue.

- Paper (with no glue or paint),
- Cardboard tubes and boxes,
- Food packaging boxes (with no food),
- Cardboard egg boxes,
- Envelopes with or without plastic windows,
- Junk mail,
- Newspapers and magazines,
- Household packaging, and
- Greeting cards and wrapping paper (with no foil or glitter).

3.4 Silver bins for dry mixed recycling (this should be clean and dry, with no food residue and it excludes paper and card) should contain:

- Glass bottles and jars,
- Metal cans,
- Clean foil,
- Aerosols,

- Waxed cartons, and
- Plastic bottles, pots and tubs.
- ***Soft plastics such as films and crisp packets cannot be recycled in your silver bin.***

3.5 Black bins for all non-recyclable household waste should contain:

- All non-recyclable household waste that is not in the lists above.

3.6 The following items are not accepted in any receptacle and should be disposed of at Household Waste Recycling Centres. Details of locations can be found at [www.lincolnshire.gov.uk](http://www.lincolnshire.gov.uk).

- Electrical items (WEEE),
- Rubble,
- Soil, and
- Hazardous waste.

#### 4 Side Waste

4.1 The presentation of 'side' waste (extra waste placed next to the black wheeled bin) does not align with waste reduction principles. Any waste left beside a wheeled bin or within bin stores will not be collected.

4.2 Paper and card side waste which is not contained within the purple lidded wheeled bin will not be collected. This is because the paper and card must remain clean and dry. Householders must place all wet or dirty paper or card in the residual (black) wheeled bin.

4.3 Exceptions to the side waste requirements may occasionally be made, such as during severe weather conditions that affect the service. Any details regarding these exceptions will be posted on the council's website and social media channels.

4.4 Householders may dispose of excess waste and recycling at Household Waste Recycling Centers, details of locations can be found at [www.Lincolnshire.gov.uk](http://www.Lincolnshire.gov.uk).

4.5 If a wheeled bin is deemed overloaded, whether by weight or volume, it will not be emptied. This decision is at the discretion of the operative, taking into account health and safety considerations and the safe working limits of the collection vehicle's lifting equipment.

## 5 Flats and Communal Bin Stores

- 5.1 There may be occasions where it is not practical to provide 3 x 240 litre wheeled bins for each household. The Council will assess the arrangements for flats/ mixed properties on an individual basis
- 5.2 If a developer, builder, or management agent chooses to provide their complexes with 1100-litre bins, the council will empty these bins by arrangement.
- 5.3 Where agreed, wheeled bins will be collected from and returned to the communal bin store.
- 5.4 If bins in a communal storage area are contaminated, they will be rejected and not emptied. It will be the responsibility of the residents or managing agents to arrange for the removal of the contaminated materials before the bins can be emptied on the next scheduled collection day.
- 5.5 If residents of flats or mixed properties do not effectively segregate their waste for recycling, the council will work with them to promote better recycling practices through education and written instruction. If necessary, the council may exercise its enforcement powers to improve recycling performance in multiple occupancy properties. In cases of recurring issues, recycling bins may be removed.
- 5.6 If excess waste, such as bags, loose items, or furniture, obstructs access to a bin store, the operatives will not clear the area, and the wheeled bins will not be emptied. It is the responsibility of the management company or residents to clear the area and dispose of the excess waste. Wheeled bins will be emptied at the next scheduled collection, provided access is available. Landlords and managing agents must dispose of waste in accordance with current legislation
- 5.7 For properties that are part commercial and part residential—such as a flat above a shop—the council will only provide collection for household waste. If there is uncertainty regarding the origins of the waste (e.g., if commercial waste is evident), the waste will not be collected, or a charge may be applied.

## 6 Sack Collections

- 6.1 In instances where it is not possible to safely store wheeled bins on some properties – usually due to lack of space or poor access – households will be provided with an annual supply of council waste sacks. Sacks will be delivered in October. The number of sacks that are delivered will equal the capacity to a wheeled bin.

6.2 Properties that may be provided with council sacks as an alternative to wheelie bins include:

- Flats with limited/no external storage,
- Properties with no frontage,
- Properties with no rear access,
- Properties with a very long drive where it is not efficient for crews to walk to a wheeled bin, and
- Properties where the council's vehicle fleet cannot access.

6.3 Households that require a sack collection will be provided an annual supply of following sacks for the following waste type:

- SKDC pink sack for non-recyclable waste, and
- SKDC clear sack for dry mixed recycling including paper and card.

6.4 A maximum of 4 sacks will be collected from a household on any collection date.

6.5 Pink and clear sacks will be collected alternate weekly. Clear sacks for dry mixed recycling can be presented when wheelie bin customers are presenting their purple lidded bin for paper and card only, and these will be collected separately.

6.6 When vacating a sack collection property residents should leave the remaining sacks at the property. When moving into a property that requires sacks partway through the annual delivery period (October – September), orders should be ordered on the Council's website and the appropriate number of sacks for the remainder of the year will be delivered.

## 7 Garden Waste Collection – Green Bin

7.1 A chargeable service for the collection of garden waste is available to householders. Information on the service, terms and conditions how to subscribe are available at [www.southkesteven.gov.uk/greenbin](http://www.southkesteven.gov.uk/greenbin).

7.2 Garden waste is not permitted in the residual waste or recycling wheeled bins/sacks. Bins/sacks containing garden waste will be rejected as contaminated and will not be emptied/collected. The householder will be responsible for removing the waste before the next scheduled collection.

7.3 Residents who do not subscribe to the service are encouraged to compost or dispose of garden waste at any of the Lincolnshire Household Waste Recycling Centres <https://www.lincolnshire.gov.uk/recycling-waste/find-recycling-centre>.

7.4 Residents who subscribe to the garden waste collection service can purchase the following container/s for the following types of waste. The following list is a guide, the most up to date record of items than can be placed in the green bin can be found on the council's website [www.southkesteven.gov.uk/whichbin](http://www.southkesteven.gov.uk/whichbin).

- Hedge trimmings/cuttings,
- Grass cuttings,
- Flowers and plants,
- Leaves and bark, and
- Twigs and small branches.

## **8 New, Additional and Replacement Receptacles**

8.1 A set of three 240 litre bins (silver, black and purple lidded) will be issued to new houses as standard, a charge is made for all new wheeled bins. Where the developer has failed to make this provision, the resident will be liable for the purchase of the wheeled bins.

8.2 Any damage to wheeled bins that occurs during the collection process will be replaced at no cost.

8.3 Residents will be charged for replacement wheeled bins if they are damaged due to neglect, intentional harm, or hot ashes. Charges are reviewed annually and can be found in the council's published fees and charges. Payment must be made at the time of ordering.

8.4 Replacement wheeled bins will be delivered to householders as soon as practicable after payment is received, typically within 15 working days.

8.5 The black, silver and purple lidded bins supplied to households remain the property of the council as the council has a statutory duty to collect these wastes. Garden waste bins purchased are the property of the householder.

8.6 When moving address, householders must leave the refuse and recycling wheeled bins and any remaining sacks at the property for the new occupant. If you move to another address in South Kesteven, you can take your green bin(s) with you. However, to ensure that your collections continue, you must contact [www.gardenwaste@southkesteven.gov.uk](mailto:www.gardenwaste@southkesteven.gov.uk) to transfer the service to your new address.

8.7 Householders are responsible for the storage, safe keeping and cleaning of refuse and recycling receptacles.

8.8 Where it is found that additional receptacles have been acquired by householders the Council will take measures to empty and remove additional bins.

8.9 New and replacement wheelie bins and sacks should be ordered online using the council's bin and bag services page [Bin and bag services | South Kesteven District Council](#).

## 9 Assisted Collection

9.1 Residents may request an 'assisted collection' at no additional charge if they are unable to transport their wheeled bins or bags to the kerbside for collection due to infirmity, disability, or other health-related reasons, and there are no other household members aged 16 years or older available to assist. Assisted collections can be provided on either a temporary or long-term basis, subject to the council's assessment that the service is warranted.

9.2 Residents requesting an assisted collection may need to provide a letter of support from a medical practitioner. They will typically receive either a home visit or a telephone consultation to confirm their eligibility for the service and to determine the collection location.

9.3 Wheeled bins/sacks will be collected from the agreed location. Wheeled bins will be returned to the same location.

9.4 Residents are responsible for ensuring that bins or sacks are visible to collection crews at the agreed location and that there are no obstructions. Gates must be unlocked between 7:30 a.m. and 3:00 p.m. on the collection day. If the operative is unable to gain access, no further collection will be attempted until the next scheduled date.

9.5 Residents must notify the council if their circumstances change, and the assisted collection is no longer needed. The register will be reviewed periodically, and users will be contacted to confirm ongoing eligibility. The service will be withdrawn if the household no longer qualifies. Temporary collections will generally have a set end date, after which the service will end automatically. Residents must contact the council to arrange any extension.

9.6 An assisted collection should be requested online at [Request an assisted waste collection | South Kesteven District Council](#).

## **10 Missed Bin/Sack Collections**

10.1 There are occasions when bins and sacks will not be emptied at the scheduled time, the following is a list of the most common occurrences:

- Severe weather,
- Blocked access (parked cars), and
- Roadworks.

### **10.2 Severe Weather**

10.21 In the event of severe weather, such as snow, ice, floods, or other conditions disrupting waste and recycling collection services, the council will strive to continue services where it is safe to do so.

10.22 If collections are missed due to severe weather, residents should leave their bins or sacks out for up to one week, including the weekend, as missed collections may occur on Saturdays. If the collection has not been completed within this timeframe, bins or bags should be taken back into the property boundary and re-presented on the next scheduled collection day for that waste type.

10.23 Missed residual waste collections (black bins/pink sacks) will be prioritized. This may require the temporary suspension of the garden waste service during periods of disruption. Depending on the length of the disruption, additional waste may be accepted alongside containers.

10.24 Residents will receive updates through social media, the council's website, and any other appropriate communication channels.

### **10.3 Blocked Access**

10.31 If bins are blocked by a vehicle, the council will try to collect on the same day.

10.32 If access is blocked by roadworks or parked vehicles, the council will attempt collection within three working days, up to three attempts.

10.33 After three unsuccessful attempts, bins will be left until the next scheduled collection.

#### **10.4 Roadworks:**

10.41 The council coordinates with the Highways Authority to ensure collection crews are aware of planned roadworks and can arrange alternatives.

10.42 Waste collection vehicle drivers will evaluate the safety of accessing areas affected by emergency roadworks and coordinate with the Highways Authority to maintain waste collection services. A smaller collection vehicle may be used, potentially altering the collection day. The council will make every effort to inform residents of these changes in advance of the collection.

#### **10.5 Reporting and Returning for missed collections**

10.51 Residents may report a missed collection on the council's website starting from 3 p.m. on the scheduled collection day. Missed bin and sack reports made more than two working days after the scheduled collection day will not be accepted. Individual cases will be reviewed as needed.

10.52 Operatives will return for a missed bin or sacks within five working days if the resident has complied with the presentation requirements (see Section 3) but the bin or sack was missed. Residents should leave their bin or sack at the kerbside during this period. Operatives will not collect missed bins or sacks from within the property boundary unless the resident is enrolled in the assisted collection service.

10.53 A missed bin should be reported online at [Reporting a missed refuse collection | South Kesteven District Council](#)

#### **10.6 Rejected Bins**

10.61 The Council will reject waste presented for collection for the following reasons:

- Overloaded wheeled bins (by weight and volume)
- Wrong receptacle presented e.g. recycling wheeled bin presented on refuse week
- Wheeled bin is too heavy to lift, due to containing heavy waste e.g. construction, DIY or soil waste
- Contamination of recyclable materials
- Garden waste in residual collection (black wheeled bin or pink sack)
- Hazardous waste types such as WEEE (waste from electrical and electronic equipment) and asbestos

- 10.62 It is the responsibility of the householder to remove the contamination and dispose of it in the correct manner. The council will not return for rejected bins or sacks.
- 10.63 Refuse collection vehicles are equipped with an in-cab system to monitor collections. Any bins or sacks not presented according to policy will be recorded in this system. Operatives have no incentive to skip collections or incorrectly report contamination. If a bin or sack is logged as not out, contaminated, or overweight, operatives will not return to collect it, even if the resident later rectifies the issue. The bin or sack must instead be presented on the next scheduled collection day.
- 10.64 Where a wheeled bin or sack is rejected, a tag or sticker giving the reason for rejection is attached to the wheeled bin or sack. Tagging/stickering will alert the resident to the issue and helps prevent future contamination, ensuring waste is managed efficiently in line with this policy.

## **11 Additional Capacity for Large families**

- 11.1 Households of five or more people can request additional residual and/or recycling wheeled bins to assist with recycling or disposing of their waste. It should be noted that this policy relates to single family units and not houses in multiple occupancy where other arrangements are in force.
- 11.2 Where a need is agreed, additional recycling capacity will take precedent. The ongoing need for additional capacity will be reviewed periodically.
- 11.3 Households who request additional residual and/or recycling bins will need to purchase them from the council. A list of the up-to-date fees and charges can be found on our website [www.southkesteven.gov.uk](http://www.southkesteven.gov.uk).
- 11.4 Additional bins should be purchased online at [Bin and bag services | South Kesteven District Council](http://Bin and bag services | South Kesteven District Council)

## **12 Bulky Household Waste Collection**

- 12.1 The bulky household waste collection service is a chargeable service for the collection of household items such as white goods e.g. fridges, televisions, furniture etc. This does not include the collection of fixtures and fittings such as kitchens, bathrooms, etc. Collections should be booked online at [www.southkesteven.gov.uk/bulky](http://www.southkesteven.gov.uk/bulky). Full terms and conditions of the service are available on the Council's website at [www.southkesteven.gov.uk/bulky](http://www.southkesteven.gov.uk/bulky).

12.2 Only items that can be safely collected and recycled/disposed are available for collection. A full list of items the Council can collect can be found on the website. It is the responsibility of the householder to select the correct item from the bulky collection list. The council will refuse to collect any items that have not been booked.

12.3 Items that are booked for collection should be presented at the edge of the householder's property in a visible location clear from any obstruction. The council will not collect bulky household items from within the property boundary.

12.4 The Council may suspend the bulky household waste collection service during Bank Holiday periods and in cases of severe weather.

12.5 Fridges and freezers must be completely empty when presented for collection. If any items contain other waste at the time of collection, they will not be accepted.

### **13      Battery Collections**

13.1 Some types of used household batteries can be put out for collection on the same day as any of your wheelie bins. They must not go inside the bins.

13.2 Batteries can be put out for collection on any wheelie bin collection day. Batteries should be placed in a separate plastic bag, such as a sandwich bag, and fastened to the handle of the wheelie bin.

13.3 The Council will collect batteries separately from other waste types and take them away for recycling. The following is a list of batteries that will be collected:

- All everyday household batteries,
- Button batteries - e.g. from watches,
- AA Batteries,
- AAA Batteries,
- C Batteries,
- D Batteries,
- 9V Batteries,
- 6LR61 Batteries,
- N LR1 Batteries, and
- AAAA Batteries.

13.4 An up to date list of batteries that can be collected along with FAQs will be published on our website  
[Household Battery Recycling | South Kesteven District Council](https://www.southkesteven.gov.uk/household-battery-recycling)

**14 Medical and Clinical Waste**

14.1 Medical waste includes nappies, stoma bags (must be drained prior to disposal), sanitary products, non-infectious wound dressings and incontinence pads etc. These items should be bagged and placed in the residual black wheeled bin/pink sack for collection.

14.2 Residents with large amounts of medical waste that cannot fit within the regular residual bin may request an additional marked black bin, collected alongside the residual (black) bin. Written confirmation from a qualified individual (e.g., medical practitioner, nurse, GP) is required and should describe the type of waste to be collected. These bins are unsuitable for liquid waste, and any containing liquid will be rejected. Residents should arrange alternative collection of liquid waste with their medical practitioner.

14.3 The council will collect clinical sharps, which must be securely sealed in a designated sharps bin or container. The council does not supply these containers; they can be obtained on prescription from a GP or pharmacist. Residents can request a sharps bin collection online or by calling the Customer Service Centre at 01476 406080 and asking for "waste". The council does not provide removal or disposal services for unused pharmaceuticals; these should be returned to a pharmacy.

**15 Commercial / Trade Waste Collection**

15.1 The Council offers a collection service for commercial/trade waste. Details of the service may be found at  
[www.southkesteven.gov.uk/commercialwaste](https://www.southkesteven.gov.uk/commercialwaste)

## **Part 2 – Education and Enforcement**

### **16 Education**

16.1 Everyone providing feedback relating to waste collection can expect the council to:

- Take the matter seriously,
- Clearly explain what can and cannot be done, and
- Deal with the matter according to this policy.

16.2 The council will approach all feedback without bias or preconception. Investigations may involve the sharing of, or access to, partner information relating to the individuals or the feedback.

16.3 All parties will be kept up to date throughout the course of the investigation and will be notified of action being taken.

16.4 To provide us with Feedback on our service please complete our online process [Complaints, compliments and comments | South Kesteven District Council](#)

16.5 Section 58 of the Deregulation Act 2015 amends section 46 of the 1990 Act, through new sections 46A to 46D to de-criminalise offences relating to incorrectly presented domestic waste. These amendments enable waste collection authorities in England to issue a written warning if a person fails to comply with reasonable requirements regarding the storage of household waste. These include (but not limited to) the following:

- Prohibiting the presentation of loose residual waste ,
- Where and when the receptacle is presented for collection,
- Not to overload the receptacle (e.g. the bin lid is up), and
- What is to be placed within the receptacle.

16.6 This penalty is a civil penalty rather than being a criminal offence, and therefore a Fixed Penalty Notice can be issued.

16.7 The education process takes place in 2 stages; these are:

- **Stage 1 – tag placed on bin or advice letter** - The first step in response to any reports regarding waste collection will be to provide education, guidance and support, whether this be in relation to what items can go in each receptacle, when and where to present the waste or where the waste is being stored. For example, when bin contamination is found the details will be recorded and a tag will be attached to the

bin explaining the reason it has not been emptied and that it will be emptied on the next scheduled date (once the contamination has been removed), or when waste is persistently kept on the public pathway/highway an advice letter will be sent to all properties in the area explaining where waste should be stored.

- **Stage 2 – formal instruction** - If education has not been successful, the council will issue formal written instruction on how to comply. This will be done as soon as possible to encourage early compliance. This intervention will serve as a warning that failure to comply in the future may result in the issuing of a Fixed Penalty Notice. The written warning will be issued in accordance with the 1990 Act, clearly outlining specific requirements and providing details on how and by when the recipient can achieve compliance. Advice and guidance will be available throughout this process. Legally, enforcement action may be taken one year from the date of the written warning.

## 17 Enforcement

17.1 Should the above steps fail to deliver the desired impact, appropriate enforcement powers will be used to bring about a resolution and maintain a clean street scene. In such instances, the Council will seek to use powers contained within the 1990 Act, or part 4 of the Antisocial Behaviour, Crime and Policing Act 2014 as appropriate. Education will continue to be provided at all stages of enforcement. Designated officers are authorised through delegations of the council's constitution, to discharge the legal aspects of this policy.

17.2 Enforcement is only applicable where non-compliance causes a nuisance or is likely to be detrimental to the amenity of the locality and there has been continued or repeated non-compliance.

Examples of non-compliance include but are not limited to:

- Waste receptacles being kept on the public highway/pathway on days that are not the collection day,
- Waste presented for collection not in a council-agreed bin or sack, and
- Presenting the wrong waste, such as waste not from the household or hazardous waste.

17.3 Following education and formal instruction, further non-compliance with waste collection requirements may result in an authorised officer serving the person a 'notice of intent' to serve a Fixed Penalty Notice. A 'notice of intent' will contain information about:

- The grounds for proposing to require payment of a fixed penalty,
- The amount of the penalty that the person would be required to pay, and
- The right to make representations (within 28 days).

17.4 A person on whom a 'notice of intent' is served may make representations to the authorised officer within 28 days as to why payment of a fixed penalty should not be required. If the representations are accepted, no monetary penalty will be imposed.

17.5 If there is still no compliance after this letter a 'final notice' to pay a fixed penalty will be issued as set by our current schedule of fees and charges. If failure to comply continues, further fixed penalties may be issued. A warning will be issued prior to each penalty.

17.6 The Council may refuse to collect waste if notices are not complied with and relevant legal and waste contractual contravention conditions are met. This option will be carefully considered against any potential long-term impacts.

## **18 Appeals against a notice**

18.1 Persons may also appeal to the First-Tier Tribunal against the decision to require payment of a fixed penalty. Payment periods are suspended until the case is determined.

## **19 Payment of a fixed penalty**

19.1 Failure to pay any penalty imposed under this policy will lead to recovery action either summarily, as a civil debt or through a high court or county court order.

## **20 Continued Non-Compliance**

20.1 Should there be continued non-compliance leading to the service of more than one fixed penalty notice within a 12-month period, consideration will be given to further actions other than the use of fixed penalties to include but not limited to:

- Criminal proceedings under the 1990 Act (potentially leading to prosecutions),
- Withdrawal of aspects of the service (for example garden / green waste and / or recycling bins).

20.2 Such measures are as a last resort when all other avenues have expired. Such actions will be decided by the appropriately delegated officer.

20.3 Cases will usually be closed following contact with the complainant or confirmation from officers that the issue no longer exists. We may close cases in circumstances where the complainant refuses to co-operate and/or engage in working with us in providing evidence of the impact of any relevant issues. If an individual remains dissatisfied they can use the Council's complaints procedure.

20.4 Further Guidance is available at:

- Sections 35 to 54 of the Clean Neighbourhoods and Environment Act,
- DEFRA, Fixed Penalty Notices issuing and enforcement by Councils and Guidance on the legal definition of waste and its application <https://www.gov.uk/environment/waste-and-recycling>.



SOUTH  
KESTEVEN  
DISTRICT  
COUNCIL

## Environment Overview and Scrutiny Committee

Tuesday, 10 December 2024

Report of Councillor Rhea Rayside -  
Cabinet Member for People &  
Communities

### Air Quality Annual Update

#### Report Author

Tom Amblin-Lightowler, Environmental Health Manager – Environmental Protection & Private Sector Housing

✉ tom.amblin-lightowler@southkesteven.gov.uk

#### Purpose of Report

To provide the Annual Air Quality Status Report (ASR 2024) and to provide an update on the Air Quality Action Plan (AQAP) as part of the Air Quality Management Area (order No.6) (AQMA).

#### Recommendations

**The Committee is recommended to:**

1. Note the content of Annual Air Quality Report (ASR 2024).
2. Note the update on the status of the Air Quality Action Plan (AQAP).

#### Decision Information

Does the report contain any exempt or confidential information not for publication? No

What are the relevant corporate priorities? Sustainable South Kesteven

Which wards are impacted? All Wards

## 1. Implications

Taking into consideration implications relating to finance and procurement, legal and governance, risk and mitigation, health and safety, diversity and inclusion, safeguarding, staffing, community safety, mental health and wellbeing and the impact on the Council's declaration of a climate change emergency, the following implications have been identified:

### ***Finance and Procurement***

- 1.1 There are no specific financial implications arising from this report.

*Completed by: Richard Wyles, Deputy Chief Executive and s151 Officer*

### ***Legal and Governance***

- 1.2 The Council's legislative requirements and responsibilities are set out in the body of the report. The report is for noting and there are no significant legal or governance implications of the Council.

*Completed by: Graham Watts, Monitoring Officer*

### ***Climate Change***

- 1.3 South Kesteven District Council previously declared an Air Quality Management Area which primarily relates to the exceedance of Nitrogen Dioxide (NO<sub>2</sub>), one of the numerous greenhouse gases contributing to the acceleration of climate change. The principal source of NO<sub>2</sub> derives from high-temperature combustion processes such as road transport and associated traffic emissions. Actions included within the Air Quality Action Plan seek to limit the need to travel and to reduce the overall level of vehicle traffic in Grantham. This will have the simultaneous impact of reducing carbon emissions while improving public health.

*Completed by: Louise Case, Sustainability Project Support Officer*

## 2. Background to the Report

- 2.1 Under the Environment Act 1995 and the associated Local Air Quality Management Framework, local authorities have a duty to review and assess air quality against National Air Quality Standards. When a pollutant fails to comply with an objective and there is relevant public exposure, an Air Quality Management Area (AQMA) must be declared and an Air Quality Action Plan (AQAP) prepared, detailing measures which will be implemented to improve air quality in the designated area.

2.2 Local air quality in South Kesteven is managed via an extensive diffusion tube monitoring network comprising fifty-eight passive Nitrogen Dioxide (NO<sub>2</sub>) diffusion tubes at thirty five separate locations (some have triplicate/duplicate tubes at one location). The diffusion tube network is used to monitor NO<sub>2</sub> concentrations across the District, identify potential new areas of concern and monitor at known hotspot areas. Tubes are located in Stamford and Grantham, in addition to a recent three month set of tubes in Bourne. These tubes are used to monitor the annual mean objective of 40µg/m<sup>3</sup> of NO<sub>2</sub>.

### **Grantham Air Quality Management Area (AQMA) and Air Quality Action Plan (AQAP)**

2.3 South Kesteven District Council declared an AQMA in 2013 encompassing the main roads in the town centre of Grantham (see Appendix 1). The main pollutant of concern is NO<sub>2</sub>, which is largely attributable to road transport emissions, with cars being the dominant source within the AQMA.

2.4 The Air Quality Strategy Objectives for England pertinent to the current AQMA designation are as follows:

- NO<sub>2</sub> annual mean objective of 40µg/m<sup>3</sup>
- NO<sub>2</sub> 1 hour mean objective of 60µg/m<sup>3</sup>

2.5 When an AQMA is in place, an Air Quality Action Plan (AQAP) is required to be produced every five years. The last AQAP (for the AQMA in Grantham) was approved in 2016 and needs updating as part of the legislative requirements. To meet this requirement an updated AQAP has been drafted and was previously considered by the Environment overview and scrutiny Committee in February 2024. The final version of the AQAP is included in Appendix 2. The AQAP is currently out for the statutory consultation period prior to final submission to The Department for Environment, Food and Rural Affairs (DEFRA) and cabinet for Approval.

2.6 Implementation of the actions contained within the existing AQAP are monitored as part of an Annual Air Quality Status Report (ASR) (Appendix 3) which the Council is required to produce.

### **Annual Status Report (ASR 2024) for the District**

2.7 The 2024 ASR contains monitoring data from 2023 and trends relating to data captured (Appendix 3)

2.8 The 2024 ASR has identified that during 2023 there were no exceedances of the 1 hour mean objective when using annual mean as a proxy for hourly mean. This is a positive and supports the overall improvement in air quality.

2.9 The ASR reports that there is compliance with the annual mean objective for nitrogen dioxide NO<sub>2</sub> at all fifty eight passive monitoring tubes across the thirty-five monitoring locations. This is a continuing trend since 2019.

2.10 The highest reported concentration of NO<sub>2</sub> was at diffusion tube monitoring location SK33,34 which is located on A607 Manthorpe Road, Grantham which was within 10% of exceedance . It has shown an overall decline in concentrations between 2022- 2023 at this site in comparison to the previous years data.

2.11 Within the 2024 ASR, Figure A.1 to Figure A.4 presents graphs showing the annual mean NO<sub>2</sub> concentrations between 2019 and 2023. The graphs demonstrate a general trend of reduction of NO<sub>2</sub> over this five year period. The significant decreases in 2020 are likely to be attributed to changes in behaviour due to Covid-19 restrictions impacting on travel.

2.12 Within the ‘conclusions and priorities’ section of the 2024 ASR report it recommends that the Council continue to use the passive monitoring network to monitor air quality levels, and to ensure that compliance is maintained throughout the District. The report recommends two key priorities (in order to comply with the AQS objectives): : -

- Continue passive monitoring within the AQMA to ensure the NO<sub>2</sub> concentration remains below 40 µg/m<sup>3</sup>
- Continue to consider amending AQMA No.6 to remove the pollution declaration of 1- hour NO<sub>2</sub> mean exceedances and potential revocation of the AQMA’.

2.13 The LAQM Policy Guidance 22 identifies that Authorities that wish to reduce or revoke an AQMA must demonstrate that air quality objectives are being met and have confidence that the improvements will be sustained. It advises that long term, rather than short term, compliance should be considered.

2.14 Given that monitoring site SK33,34 is within 10% of exceedance and is demonstrating a decline in levels from the previous years it is still uncertain as to whether the trend will continue in the future due to the delay in the completion of the Southern Relief Road. It is not recommended that the AQMA be revoked in its entirety at present, but consideration should be given to revoking the NO<sub>2</sub> 1-Hour objective.

2.15 In summary the 2024 ASR demonstrates a overall continual improvement in the levels of NO<sub>2</sub> across the district which is a positive but it is recommended that it is still premature to consider revocation of the AQMA in its entirety.

### **3. Key Considerations**

- 3.1 Overall, the general trend shows that concentrations of NO<sub>2</sub> are decreasing, with all sites being below both the hourly and annual objective levels. However, monitoring location SK33, 34 is still within 10% of exceedance of the annual objective.
- 3.2 There are no recorded exceedances of the hourly mean objective for nitrogen dioxide, when using annual mean as a proxy for hourly mean. Exceedances of this objective have not been observed for over 7 years, therefore an amendment for this particular objective within the AQMA may be appropriate.
- 3.3 If the Council was to amend the AQMA Order No. 6 to remove the pollution declaration of the 1-hour NO<sub>2</sub> mean, the annual mean requirement would remain and the diffusion tube monitoring network would continue to be monitored.
- 3.4 An updated AQAP (for the AQMA in Grantham) is in the final stages and will be submitted to DEFRA in December ensuring that the Council is compliant in its requirements.
- 3.5 The NO<sub>2</sub> monitoring data for 2024 will be reported in the ASR for 2025 next year.

### **4. Other Options Considered**

- 4.1 None as the report is for noting only.

### **5. Reasons for the Recommendations**

- 5.1 To provide an overview of the current NO<sub>2</sub> levels within the district against the national air quality objectives.
- 5.2 To provide a progress update regarding the AQAP (which relates to the AQMA in Grantham) to ensure compliance with the legal requirements.

### **6. Background Papers**

- 6.1 The Local Air Quality Management – P22 Guidance:  
[LAQM-Policy-Guidance-2022.pdf](https://www.gov.uk/government/publications/local-air-quality-management-p22-guidance)
- 6.2 [Environment Overview and Scrutiny Report February 2024](https://www.gov.uk/government/publications/environment-overview-and-scrutiny-report-february-2024)  
Draft Air Quality Action Plan

### **7. Appendices**

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# Appendix 2



## Air Quality Management Area Order 2013

### Environment Act 1995 Part IV Section 83(1)

#### **South Kesteven District Council No 6 Grantham, Lincolnshire**

South Kesteven District Council, in exercise of the powers conferred upon it by Section 83(1) of the Environment Act 1995, hereby makes the following Order.

This Order may be cited as the South Kesteven District Council Air Quality Management Area No 6 and shall come into effect on **8 AUGUST 2013**

This Order replaces the previous Air Quality Management Order No 5.

The area shown on the attached map in red marked "South Kesteven District Council No 6 Air Quality Management Area 2013" is hereby declared to be an Air Quality Management Area.

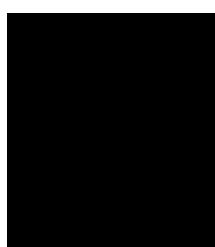
The designated area extends the existing Air Quality Management Area along Manthorpe Road and Wharf Road to include High Street and London Road, Grantham.

One duplicate of the map is deposited at Council offices, St Peters Hill, Grantham, NG31 6PZ and is available for viewing during normal working hours.

This area is designated in relation to a likely breach of Nitrogen Dioxide objections for annual and hourly mean as specified in the Air Quality Regulations 2000.

This area shall remain in force until it is varied or revoked by a subsequent order.

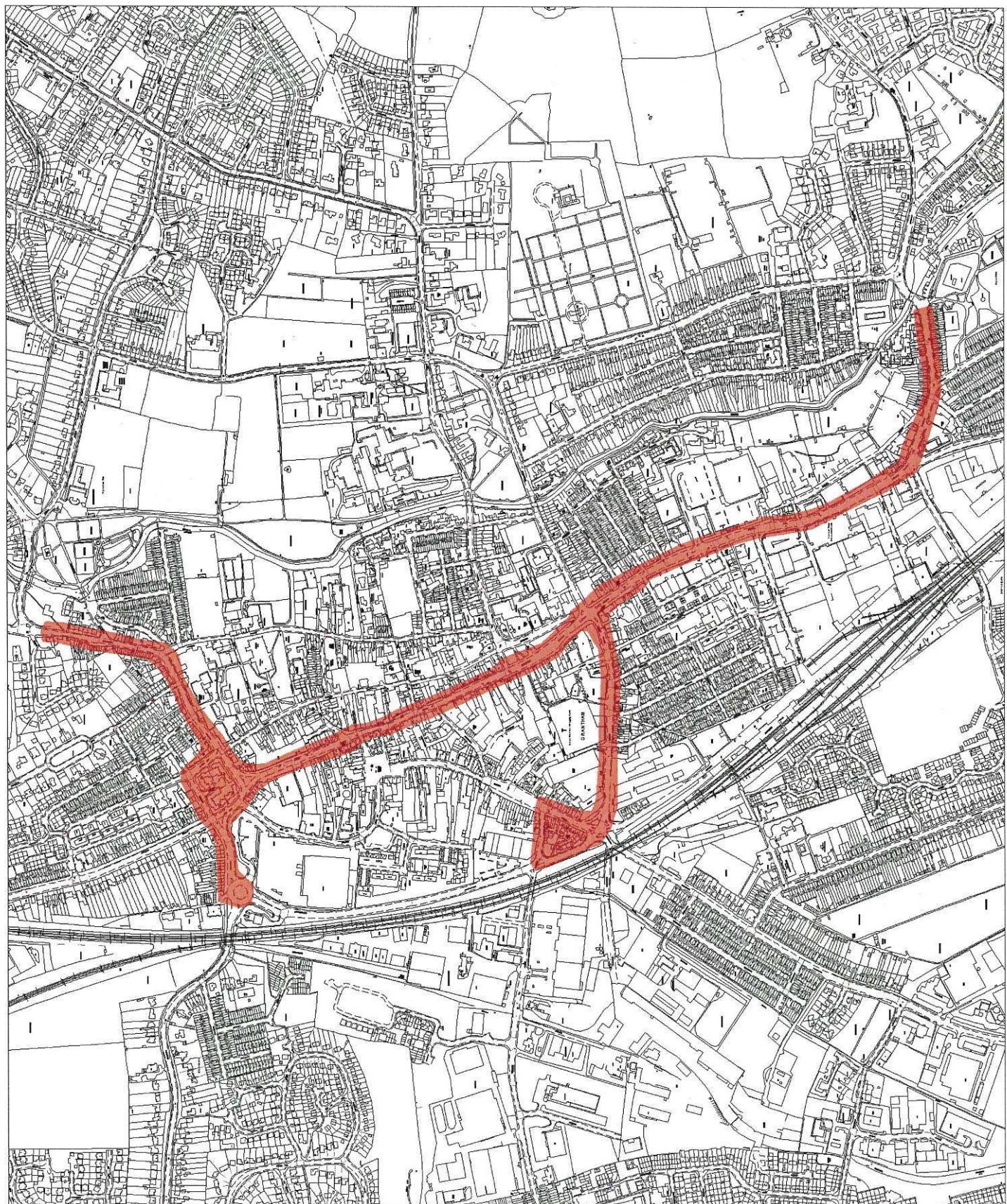
Executed as a deed by affixing  
The common seal of SOUTH  
KESTEVEN DISTRICT COUNCIL  
In the presence of:



Authorised Officer:

Air Quality Management Area Order 2013  
South Kesteven District Council No. 6  
Grantham Consolidated Area

South Kesteven DC Licence Number 100018662





SOUTH  
KESTEVEN  
DISTRICT  
COUNCIL

# South Kesteven District Council

## Air Quality Action Plan

In fulfilment of Part IV of the Environment Act 1995

Local Air Quality Management

October 2024

**South Kesteven District Council**

<b>Information</b>	<b>Details</b>
<b>Local Authority Officer</b>	Tom Amblin-Lightowler
<b>Department</b>	Public Protection – Environmental Protection
<b>Address</b>	South Kesteven District Council Council Offices The Picture House, St Catherine's Road, Grantham NG31 6TT
<b>Telephone</b>	01476 406080
<b>E-mail</b>	ehs@southkesteven.gov.uk
<b>Report Reference Number</b>	2024 AQAP
<b>Date</b>	October 2024

## Executive Summary

This Air Quality Action Plan (AQAP) has been produced as part of our statutory duties required by the Local Air Quality Management framework. It outlines the action we will take to improve air quality in South Kesteven District Council between 2024 - 2029.

This action plan replaces the previous action plan published in 2016. Projects delivered through the past action plan include completion of phase 1 and 2 of the Grantham Southern relief road; ongoing work to promote cycling, walking and public transport; an anti-idling campaign focused in and around the AQMA; and improvements in South Kesteven District Council's own vehicle fleet.

Air pollution is associated with several adverse health impacts. It is recognised as a contributing factor in the onset of heart disease and cancer. Additionally, air pollution particularly affects the most vulnerable in society: children and older people, and those with heart and lung conditions. There is also often a strong correlation with equalities issues because areas with poor air quality are also often the less affluent areas<sup>1,2</sup>.

The annual health cost to society of the impacts of particulate matter alone in the UK is estimated to be around £16 billion<sup>3</sup>. South Kesteven District Council is committed to reducing the exposure of people in South Kesteven to poor air quality to improve health.

We have developed actions that can be considered under 5 broad topics:

- Promoting low emission transport
- Promoting travel alternatives
- Public information
- Traffic management

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<sup>1</sup> Environmental equity, air quality, socioeconomic status, and respiratory health, 2010

<sup>2</sup> Air quality and social deprivation in the UK: an environmental inequalities analysis, 2006

<sup>3</sup> Defra. Abatement cost guidance for valuing changes in air quality, May 2013

- Vehicle fleet efficiency
- Our priorities are to sustain a downward trend in emissions reduction through partnership work. The delivery of the Grantham Southern relief road remains a major focus to divert traffic away from the town centre. Traffic management and infrastructure for walking and cycling are prioritised by the Grantham Transport Strategy published in 2022. The Clean Air Lincolnshire project will continue to raise awareness of issues of air quality and provide additional monitoring data within the AQMA. Vehicle fleet efficiency and electrification opportunities will continue to be implemented by South Kesteven District Council.

In this AQAP we outline how we plan to effectively tackle air quality issues within our control. However, we recognise that there are many air quality policy areas that are outside of our influence (such as vehicle emissions standards agreed in Europe), but for which we may have useful evidence, and so we will continue to work with regional and central government on policies and issues beyond South Kesteven District Council's direct influence.

## **Responsibilities and Commitment**

This AQAP was prepared by the Environmental Health department of South Kesteven District Council with the support and agreement of the following officers and departments:

The Climate Change and Sustainability Manager

The final AQAP will be approved by:

Councillor Rhea Rayside – Cabinet Member for People and Communities.

Graham Watts - Assistant Director (Governance and Public Protection)

Ayeisha Kirkham – Head of Service – Public Protection

The AQAP has been developed in conjunction with Lincolnshire County Council from a highways and sustainability perspective.

This draft AQAP has not been signed off by a Director of Public Health. However, the final AQAP will be reviewed by the Director of Public Health.

## **South Kesteven District Council**

This Air Quality Action Plan (AQAP) has been prepared and developed in partnership with other relevant bodies, particularly the Highways team of Lincolnshire County Council (LCC) and the relevant teams of South Kesteven District Council to incorporate localised engineered measures in the AQMA.

This AQAP will be subject to an annual review, appraisal of progress and South Kesteven District Councils Environment over and scrutiny Committee. Progress each year will be reported in the Annual Status Reports (ASRs) produced by South Kesteven District Council, as part of our statutory Local Air Quality Management duties.

If you have any comments on this AQAP, please send them to Tom Amblin-Lightowler at:

South Kesteven District Council

Council Offices

The Picture House,

St Catherine's Road,

Grantham NG31 6TT

01476 406080

[ehs@southkesteven.gov.uk](mailto:ehs@southkesteven.gov.uk)

## Table of Contents

<b>Executive Summary.....</b>	<b>i</b>
Responsibilities and Commitment .....	ii
<b>1      Introduction .....</b>	<b>1</b>
<b>2      Summary of Current Air Quality in South Kesteven District Council .....</b>	<b>3</b>
<b>3      South Kesteven District Council's Air Quality Priorities .....</b>	<b>5</b>
3.1      Public Health Context.....	5
3.2      Planning and Policy Context.....	5
3.3      Source Apportionment.....	6
3.4      Required Reduction in Emissions.....	8
3.5      Key Priorities .....	8
<b>4      Development and Implementation of South Kesteven District Council AQAP .....</b>	<b>10</b>
4.1      Consultation and Stakeholder Engagement.....	10
4.2      Steering Group .....	11
<b>5      AQAP Measures .....</b>	<b>12</b>
<b>Appendix A: Response to Consultation .....</b>	<b>133</b>
<b>Glossary of Terms .....</b>	<b>176</b>

## List of Tables

Table 4.1 – Consultation Undertaken .....	10
Table A.1 – Summary of Response to Consultation and Engagement.....	12
Table 5.1 – Air Quality Action Plan Measures .....	14

## 1 Introduction

This report outlines the actions that South Kesteven District Council will deliver between 2024 – 2029 to reduce concentrations of air pollutants and exposure to air pollution; thereby positively impacting on the health and quality of life of residents and visitors to the South Kesteven District Council administrative area.

It has been developed in recognition of the legal requirement on the local authority to work towards Air Quality Strategy (AQS) objectives under Part IV of the Environment Act 1995 and relevant regulations made under that part and to meet the requirements of the Local Air Quality Management (LAQM) statutory process.

This Plan will be reviewed every five years at the latest and progress on measures set out within this Plan will be reported on annually within South Kesteven District Council's air quality ASR.

South Kesteven District Council is committed to working to improve the air quality in our district where levels of air pollutants are exceeding air quality objectives.

Air quality in South Kesteven is generally good. However, there are locations where pollutant levels are high, with the highest levels being along narrow, congested street canyons (roads with properties close to the road on either side of the street) in Grantham.

Monitoring has revealed that the annual mean air quality objectives for NO<sub>2</sub> for the previous 3 years have been close to the National Air Quality objective of 40 µg/m<sup>3</sup> but have not exceeded this threshold at any of the monitoring locations in Grantham town centre, some of which are within an Air Quality Management Area (AQMA).

Monitoring data for the last 5 years with the Air Quality Management Area have identified:

- There is an overall decreasing trend in nitrogen dioxide air pollution at monitoring sites.
- There remain three sites which have only been under objective levels for air pollution for the last 2-3 years, which includes 2020 where results are not considered typical due to abnormal traffic levels.

- There were no exceedances of the 1 hour mean target for NO<sub>2</sub> air pollution for the last 5 years.

Department for Food and Rural Affairs (DEFRA) based upon the lack of exceedances of the 1 hour mean target recommend that this be removed from the current AQMA.

There is now an intention to review the existing AQMA to reflect the updated NO<sub>2</sub> monitoring data.

The district of South Kesteven is very diverse, comprising principal towns of Grantham, Stamford, Bourne and The Deepings surrounded by small rural villages and hamlets.

The main source of air pollution in the district is road traffic emissions from major roads, notably the A1, A52, A15 and A607. The district and surrounding areas are illustrated in Figure 1.

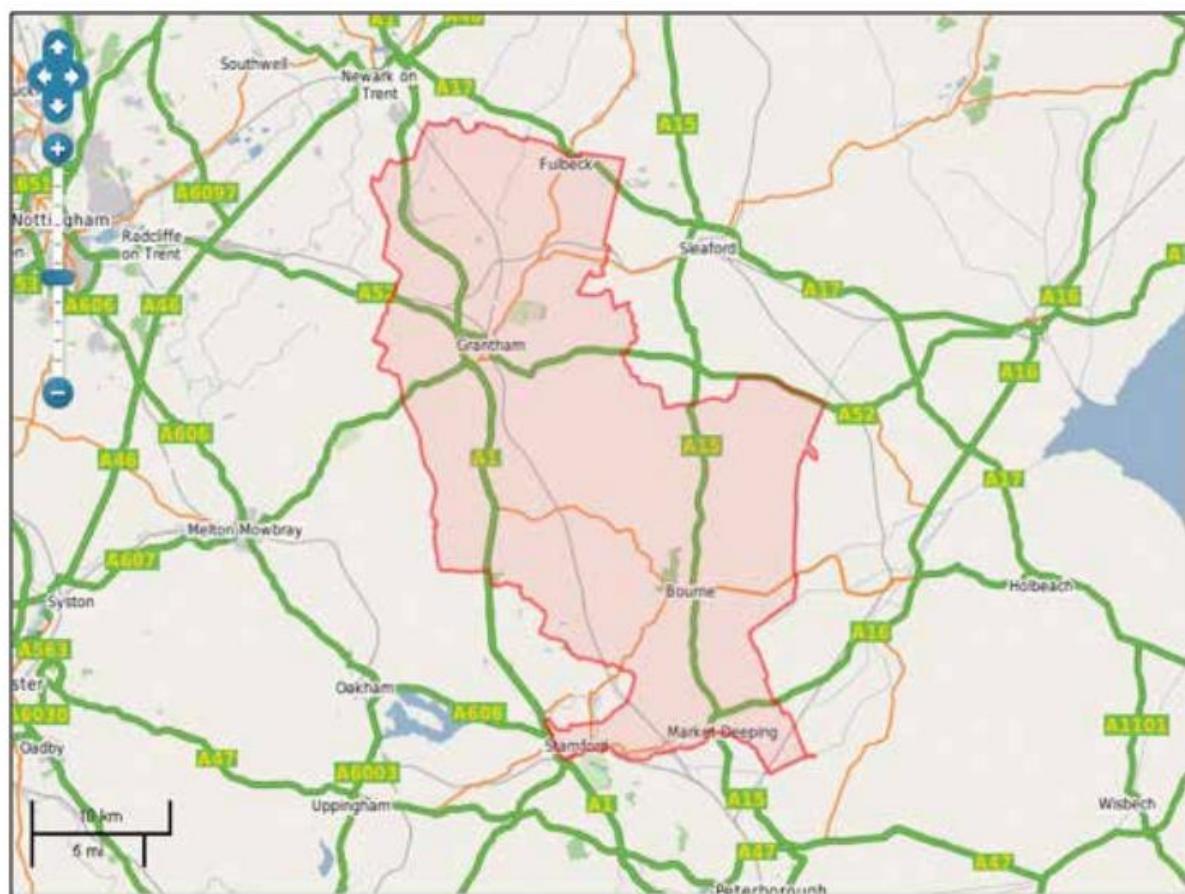


Figure 1 – South Kesteven District Council boundary and Surrounding Area

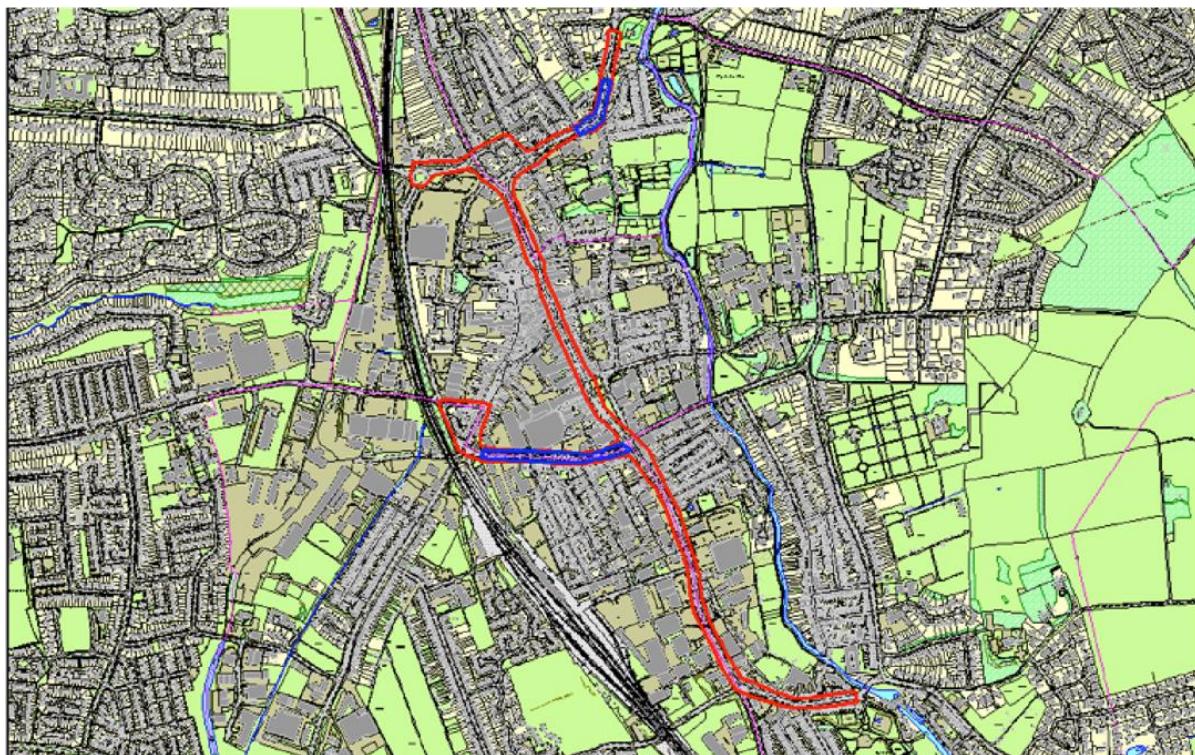
## 2 Summary of Current Air Quality in South Kesteven District Council

Please refer to the latest ASR from South Kesteven District Council.

In 2013, the council declared an AQMA for the area encompassing the main roads in the town centre of Grantham. The AQMA is illustrated in Figure 2. Several roads included within the AQMA are likely to lead to a “street canyon effect” due to the road and building layout, trapping, and preventing the dispersion of air pollutant emissions from road-traffic, therefore explaining the higher levels of pollution in these areas.

The 2011 Detailed / Further Assessment concluded that around 320 homes lie within the Grantham town centre AQMA, equating to an exposed population of around 650. The NO<sub>2</sub> monitoring data for the previous 5 years as stated have not exceed the annual or hourly means and we are confident that the proposed measure included within the AQAP will continue to see a downward trend and remain below the National Air Quality Objectives.

Historical source apportionment indicated that emissions from local moving traffic are the main contributor to overall NO<sub>2</sub> levels, although idling emissions due to queuing vehicles are also particularly important near traffic lights. Given that there have been no substantial changes to the physical environment and that it remains predominantly a residential and retail setting it remains highly likely that that local moving traffic is the main contributor of NO<sub>2</sub>. A recent source apportionment exercise has been completed, which found that diesel cars are responsible for just over half (50.3% of NOx emissions in the measured area, followed by diesel light goods vehicles (28.2%). More detail is available within the Source Apportionment chapter of this document.



**Figure 2 - Grantham Air Quality Management Area**

In red, current AQMA boundary (declared in 2013). In blue, previous AQMA areas.

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The council carries out passive NO<sub>2</sub> monitoring at 37 sites across the district using diffusion tubes. This includes 15 duplicate tube and four triplicate tube locations, which are aimed at improving reliability of the data.

Full details of monitoring data are shown within the ASR:

[South Kesteven District Council ASR 2023 v3.pdf \(southkesteven.gov.uk\)](https://www.southkesteven.gov.uk/air-quality/air-quality-management-area-aqma)

## 3 South Kesteven District Council's Air Quality Priorities

### 3.1 Public Health Context

Air pollution is associated with several adverse health impacts. It is recognised as a contributing factor in the onset of both heart and respiratory diseases and lung cancer<sup>4</sup>. Additionally, air pollution particularly affects the most vulnerable in society: children, the elderly, and those with existing heart and lung conditions. There is also often a strong correlation with equalities issues because areas with poor air quality are also often less affluent areas<sup>56</sup>.

The mortality burden of air pollution within the UK is equivalent to 29,000 to 43,000 deaths at typical ages<sup>7</sup>, with a total estimated healthcare cost to the NHS and social care of £157 million in 2017<sup>8</sup>.

Given that South Kesteven is predominantly a rural setting and that the NO<sub>2</sub> monitoring data from within the district is below the National Air Quality Objectives the healthy implications are deemed to be minimal.

### 3.2 Planning and Policy Context

South Kesteven District's Local Plan 2011-2036 has links to improving air quality with the considerations for contributing to low-carbon travel through the expectations for residential and commercial developments to provide electric vehicle charging points<sup>9</sup>.

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<sup>4</sup> Health Matters: air pollution - GOV.UK ([www.gov.uk](https://www.gov.uk))

<sup>5</sup> Public Health England. Air Quality: A Briefing for Directors of Public Health, 2017

<sup>6</sup> Defra, Air quality and social deprivation in the UK: an environmental inequalities analysis, 2006.

<sup>7</sup> Defra, Air quality appraisal: damage cost guidance, January 2023

<sup>8</sup> Public Health England. Estimation of costs to the NHS and social care due to the health impacts of air pollution: summary report, May 2018

<sup>9</sup> South Kesteven District Council. Local Plan 2011-2036

It is hoped that this will encourage the switch to electric vehicles and reduce the contribution of traffic towards NO<sub>2</sub> levels.

Additionally larger scale developments have development principles specified within the Local Plan to provide footway and cycleway connections to local amenities.

### 3.3 Source Apportionment

Source apportionment has been carried out for the modelled receptors along the road links that are either within the AQMA or lead into the AQMA. Apportionment for both NO<sub>x</sub> and NO<sub>2</sub> concentrations has been completed for the following vehicle classes:

- Petrol and Diesel Cars
- Petrol and Diesel LGV's
- Rigid HGV's
- Artic HGV's
- Buses and Coaches
- Other (including Motorcycle, Hybrid and EV cars)

It is worth noting that NO<sub>x</sub> concentrations are always higher than those for NO<sub>2</sub> since NO<sub>x</sub> is made up of NO and NO<sub>2</sub>. There is no air quality limit for human health for NO<sub>x</sub> but is nevertheless a useful indicator when considering source apportionment. Results are illustrated in Figure 3.1 to Figure 3.6.

Table 3.1 shows the percentage contribution of road and background sources. Across all modelled receptors, 57.07% of the NO<sub>x</sub> contribution is from road sources, and the remaining 42.93% is from background sources. Of the background contribution, 23.65% is from the local background, whilst 19.28% is from regional the regional background.

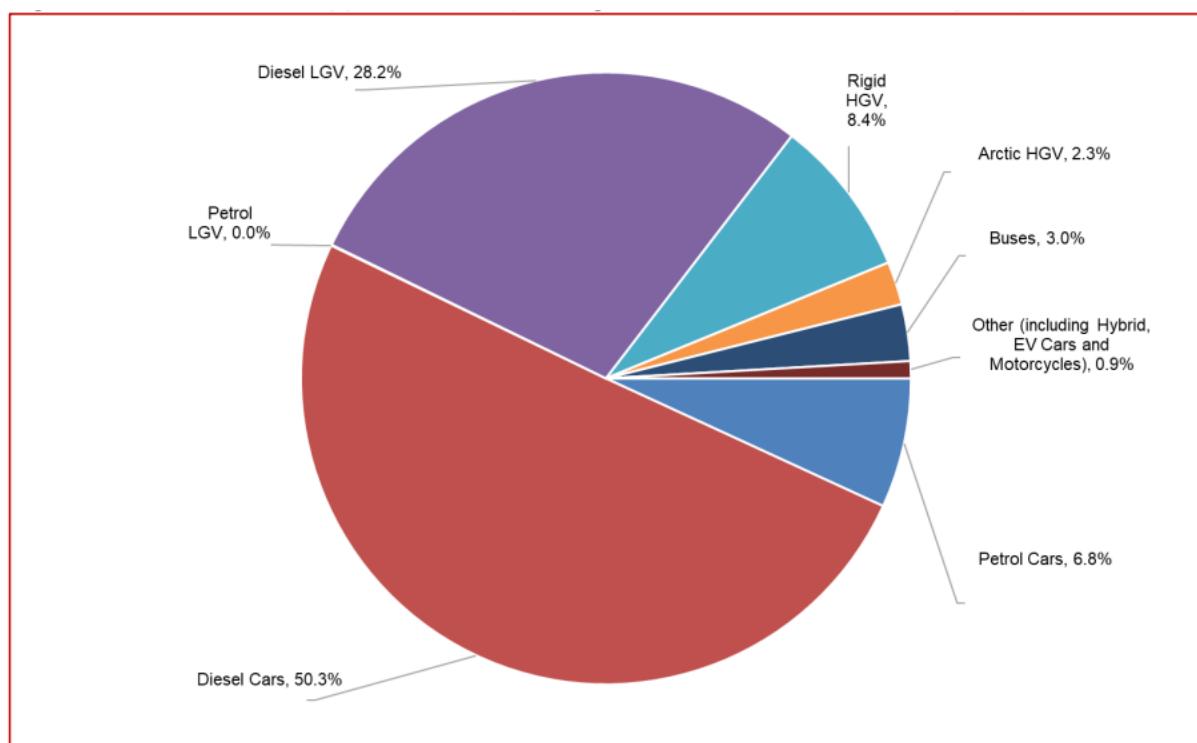
**Table 3.1 – Total NO<sub>x</sub> Source Apportionment Average Across All Receptors**

Results	Local Background NO <sub>x</sub>	Regional Background NO <sub>x</sub>	Local Road NO <sub>x</sub>
NO <sub>x</sub> Concentration (µg/m <sup>3</sup> )	7.85	6.40	18.94
Percentage of total NO <sub>x</sub>	23.65%	19.28%	57.07%

Local background NO<sub>x</sub>, which is considered to be the emissions a local authority has influence over, including building, road and rail emissions etc, accounts for 23.65% of the total NO<sub>x</sub> concentration on average at all receptor location. Regional background NO<sub>x</sub> concentrations account for those emissions that the local authority has no

influence over, with these emissions forming 19.28% of the total NO<sub>x</sub> concentration on average across all modelled receptors. Therefore, a total of 57.07% of NO<sub>x</sub> emissions on average within the AQMA is derived from local road traffic.

The source apportionment results provide the relative contribution (as a percentage) of each vehicle type towards a specific pollutant. Therefore, when considering the average NO<sub>x</sub> concentration across all modelled receptors, road traffic is responsible for 57.07% of emissions. Of the total road NO<sub>x</sub>, diesel cars are the greatest contributor accounting for 50.3% of emissions, followed by diesel light good vehicles (28.2%) and rigid HGVs (8.4%).



**Figure 3.1– NO<sub>x</sub> Source Apportionment (Average Across All Modelled Receptors)**

When considering the modelled receptor location at which the maximum road NO<sub>x</sub> concentration is observed (Receptor 41), road traffic is responsible for 82.2% of total NO<sub>x</sub> emissions. Of the road traffic proportion, 53.7% is from diesel cars, 30.4% from diesel light good vehicles and 6.8% from petrol cars.

These percentages are similar to the average across all modelled receptors, albeit rigid HGVs are more prevalent in the wider context of all modelled receptors comparative to the maximum location (Receptor 41). This is likely due to the large sized AQMA, so the influence of emissions on the maximum receptor is broadly similar to those

experienced across the whole of the AQMA albeit petrol cars may be more influential here due to the close proximity of the service station and local school.

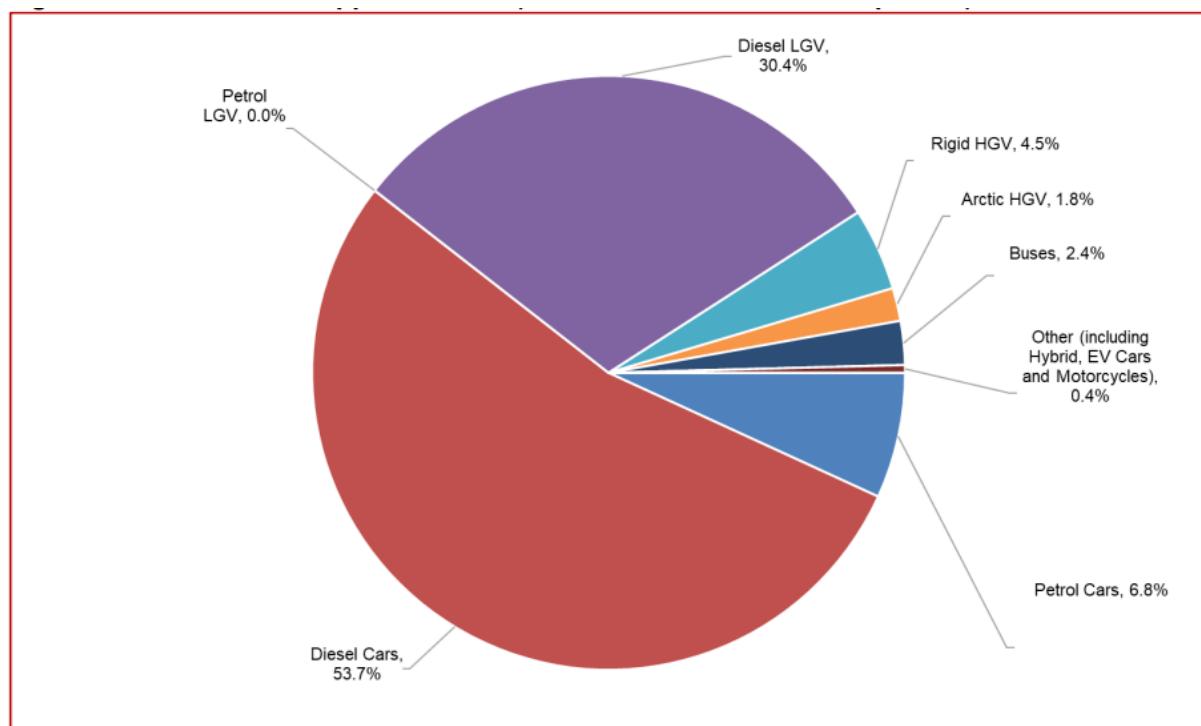


Figure 3.2 - NO<sub>x</sub> Source Apportionment (At Maximum Modelled Receptor 41)

### 3.4 Required Reduction in Emissions

As the current monitored levels of NO<sub>2</sub> for the last 3 years are below the National Air Quality Objectives it has been determined as unnecessary to complete a required reduction in NO<sub>2</sub> exercise. The actions detailed within this AQAP once completed are intended to continue to reduce levels further and maintain them below the AQS objectives.

### 3.5 Key Priorities

Our priorities are to sustain a downward trend in emissions reduction through partnership work. The delivery of the Grantham Southern relief road remains a major focus to divert traffic away from the town centre. Traffic management and infrastructure for walking and cycling are prioritised by the Grantham Transport Strategy published in 2022. The Clean Air Lincolnshire project will continue to raise awareness of issues of air quality and provide additional monitoring data within the AQMA. Vehicle fleet

## **South Kesteven District Council**

efficiency and electrification opportunities will continue to be implemented by South Kesteven District Council.

- Priority 1 - The delivery of the Grantham Southern relief road remains a major focus to divert traffic away from the town centre – Phase 3
- Priority 2 – Implementation of Traffic management and infrastructure for walking and cycling as prioritised by the Grantham Transport Strategy published in 2022.
- Priority 3 – Raise continual awareness in conjunction with the Clean Air Lincolnshire project.

## 4 Development and Implementation of South Kesteven District Council AQAP

### 4.1 Consultation and Stakeholder Engagement

In developing/updating this AQAP, we have worked with other local authorities, agencies, businesses, and the local community to improve local air quality. Schedule 11 of the Environment Act 1995 requires local authorities to consult the bodies listed in Table 4.1. We consulted on this AQAP in early 2024 with stakeholders and methodology for consultation is detailed below.

- Website
- Articles in local newspaper
- Questionnaire available via online survey platform
- Localised marketing campaign.

The response to our consultation stakeholder engagement will be published within the final AQAP.

**Table 4.1 – Consultation Undertaken**

Consultee	Consultation Undertaken
The Secretary of State	No
The Environment Agency	Yes - proposed
The highways authority	Yes - proposed
All neighbouring local authorities	Yes - proposed
Other public authorities as appropriate, such as Public Health officials	Yes - proposed
Bodies representing local business interests and other organisations as appropriate	Yes - proposed

## 4.2 Steering Group

As part of developing this Action Plan, a steering group was established to review the existing actions that are in progress to improve air quality within the South Kesteven District Council's Air Quality Management Area as well as any future actions. This steering group will also oversee the implementation and monitoring of the actions contained within this and future revisions of the Action Plan.

This steering group is chaired by the Head of Service – Public Protection and consist of the following internal service areas:

- Environmental Health – Environmental Protection Leads
- Sustainability & Climate Change Lead
- Waste Services
- Planning Policy Team
- Housing Maintenance Services

The internal steering group liaise directly with relevant external stakeholders which include:

- Lincolnshire County Council – Highways
- Lincolnshire County Council - Assisting Development Team
- Lincolnshire County Council – Public Health

## 5 AQAP Measures

### Appendix A: Response to Consultation

**Table A.1 – Summary of Responses to Consultation and Stakeholder Engagement on the AQAP**

Consultee	Category	Response
Director of Public Health at Lincolnshire County Council	Other public authorities	<p>Thank you for the opportunity to comment on this draft Air Quality Action Plan produced by South Kesteven District Council. The overall position is well explained in the plan, and I am pleased to endorse it. It is good to see that concentrations of Nitrogen Oxides (NO<sub>x</sub>) are decreasing in the Air Quality Management Area declared in Grantham town centre. Whilst national objective levels are set, the view is that no level of air pollution is deemed to be safe for humans. South Kesteven District Council's ongoing commitment to reduce levels further in the centre of Grantham is, therefore, welcome.</p> <p>I am pleased to see the measures to improve air quality in Table 5.1, many of which have been developed in partnership with Lincolnshire County Council such as the Clean Air Lincolnshire website, which we will continue to develop to improve its usefulness. The focus on alternative, active travel</p>

**South Kesteven District Council**

Consultee	Category	Response
		(cycling and walking) is important, and my team will be working with South Kesteven District Council and sustainable travel officers to increase active travel rates and use of public transport, noting also the drive to improve the bus fleet and reduce emissions.

## South Kesteven District Council

Table 0.1 shows the South Kesteven District Council AQAP measures. It contains:

- a list of the actions that form part of the plan.
- the responsible individual and departments/organisations who will deliver this action.
- estimated cost of implementing each action (overall cost and cost to the local authority)
- expected benefit in terms of pollutant emission and/or concentration reduction.
- the timescale for implementation
- how progress will be monitored

**NB:** Please see future ASRs for regular annual updates on implementation of these measures.

## Appendix A: Response to Consultation

**Table A.1 – Summary of Responses to Consultation and Stakeholder Engagement on the AQAP**

Consultee	Category	Response
Director of Public Health at Lincolnshire County Council	Other public authorities	<p>Thank you for the opportunity to comment on this draft Air Quality Action Plan produced by South Kesteven District Council. The overall position is well explained in the plan, and I am pleased to endorse it. It is good to see that concentrations of Nitrogen Oxides (NO<sub>x</sub>) are decreasing in the Air Quality Management Area declared in Grantham town centre. Whilst national objective levels are set, the view is that no level of air pollution is deemed to be safe for humans. South Kesteven District Council's ongoing commitment to reduce levels further in the centre of Grantham is, therefore, welcome.</p> <p>I am pleased to see the measures to improve air quality in Table 5.1, many of which have been developed in partnership with Lincolnshire County Council such as the Clean Air Lincolnshire website, which we will continue to develop to improve its usefulness. The focus on alternative, active travel (cycling and walking) is important, and my team will be working with South</p>

**South Kesteven District Council**

<b>Consultee</b>	<b>Category</b>	<b>Response</b>
		Kesteven District Council and sustainable travel officers to increase active travel rates and use of public transport, noting also the drive to improve the bus fleet and reduce emissions.

Table 0.1 – Air Quality Action Plan Measures

Measure No.	Measure	Category	Classification	Estimated Year Measure to be Introduced	Estimated / Actual Completion Year	Organisations Involved	Funding Source	Defra AQ Grant Funding	Funding Status	Estimated Cost of Measure	Measure Status	Target Reduction in Pollutant / Emission from Measure	Key Performance Indicator	Progress to Date	Comments / Potential Barriers to Implementation
M1	Grantham Southern Quadrant East West Relief Road	Traffic Management	Strategic highway improvements, Re-prioritising Road space away from cars, including Access management, Selective vehicle priority, bus priority, high vehicle occupancy lane	Ongoing project	2025	Lincolnshire County Council Highways & South Kesteven District Council	Lincs County Council Highways Infrastructure funding Highways England Growth and Housing Fund Developer contributions	No	Fully funded	>£10 million	Implementation	0.5 - 1 µg/m3	Reduced HGV through traffic in the town centre – reduced overall traffic flows through the town	Work commenced on site in late 2015. Phase 1 complete, Phase 2 completed December 2022, Phase 3 estimated completion 2025.	In progress/ potential delay to estimated completion date.
M2	Improve traffic management at key junctions.	Traffic Management	Strategic highway improvements, Re-prioritising Road space away from cars, including Access management, Selective vehicle priority, bus priority, high vehicle occupancy lane.	Ongoing project	2024+ 3-5 years	Lincolnshire County Council Highways	Lincs County Council Highways Infrastructure funding	No	As funding opportunities arise	£50k-£100k	Planning	1 - 2 µg/m3	Reduced congestion and increased average speeds through the AQMA.	The Grantham Transport Strategy 2023 sets out several improvements planned for improving traffic management in and around Grantham.	Lack of funding/change in priorities
M3	Improvements in Bus fleet emissions	Promoting Low Emission Transport	Other	Ongoing project	2024+ 3-5 years	Lincolnshire County Council Highways & South Kesteven DC	Lincolnshire County Council Transport Services	No	As funding opportunities arise	£50k-£100k	Planning	1 - 2 µg/m3	Improved bus fleet composition. Bus use more attractive to potential users – increased passenger numbers.	The Lincolnshire Bus Service Improvement Plan 2023 has been approved. Working in partnership with operators and stakeholders this will enhance bus services and further improve the bus offer to residents and visitors over the next 5 - 10 years.	Lack of funding/change in priorities
M4	Clean Air Lincolnshire air quality monitoring and	Public Information	Via the internet	2023	2024+ 1-2 years	Lincolnshire County Council and South Kesteven DC	DEFRA	Yes	Fully funded	£50k-£100k	Implementation	0.2 - 0.5 µg/m3	Engagement sessions completed with school in AQMA.	Air monitors installed and engagement session underway	Clean Air Lincolnshire is a county wide project

Measure No.	Measure	Category	Classification	Estimated Year Measure to be Introduced	Estimated / Actual Completion Year	Organisations Involved	Funding Source	Defra AQ Grant Funding	Funding Status	Estimated Cost of Measure	Measure Status	Target Reduction in Pollutant / Emission from Measure	Key Performance Indicator	Progress to Date	Comments / Potential Barriers to Implementation
	communication														
M5	Encouraging modal shift	Promoting Travel Alternatives	Intensive active travel campaign & infrastructure	Ongoing	2024+ 3-5 years	Lincolnshire County Council and South Kesteven DC	Lincolnshire County Council South Kesteven District Council	No	Partially funded	<£10k	Implementation	0.2 - 0.5µg/m3	Reduced vehicle usage and increased use of public transport.	The Grantham Cycling & Walking Network Plan has been developed as part of the new Grantham Transport Strategy 2022. This document will inform all future schemes.	Lack of funding
M6	Provision of Cycling infrastructure	Promoting Travel Alternatives	Promotion of cycling	Ongoing	2024+ 3-5 years	Lincolnshire County Council Highways	Lincs County Council Highways Infrastructure funding Active Travel England funding	No	Not funded	£100k-500k	Planning	0.2 - 0.5µg/m3	Increased number of cycle lanes makes cycling a more attractive alternative method of transport.	The Grantham Cycling & Walking Network Plan has been developed as part of the new Grantham Transport Strategy 2022. This document will inform all future schemes.	Lack of funding/change in priorities/developments
M7	Rolling programme of replacing older more polluting vehicles with newer cleaner vehicles	Vehicle fleet efficiency	Company Vehicle Procurement - Prioritising uptake of low emission vehicles	Ongoing	2024+ 3-5 years	South Kesteven District Council	South Kesteven District Council	No	Partially funded	£100k-500k	Implementation	0.2 - 0.5µg/m3	Continue to improve average euro class of the whole council owned fleet and introduce additional EVs.	Fleet review completed 2021. New depot site targeted end of 2025 Review further EV implementation 2026 onward	Relocation of fleet to new facilities.
M8	Implement improved travel planning amongst the council's employees.	Public information	Via the internet	Ongoing	2024+ 3-5 years	South Kesteven District Council	South Kesteven District Council	No	Partially funded	<£10k	Implementation	0.2 - 0.5µg/m3	Reduce number of council staff driving to work	Staff travel survey completed 2020 showing decrease in single occupancy car travel. Hybrid working policy in place from 2021 to minimise need to travel. Cycle to work scheme in place- approx. 6 users each year	Lack of take up

## Glossary of Terms

Abbreviation	Description
AQAP	Air Quality Action Plan - A detailed description of measures, outcomes, achievement dates and implementation methods, showing how the local authority intends to achieve air quality limit values'
AQMA	Air Quality Management Area – An area where air pollutant concentrations exceed / are likely to exceed the relevant air quality objectives. AQMAs are declared for specific pollutants and objectives
AQS	Air Quality Strategy
ASR	Air Quality Annual Status Report
Defra	Department for Environment, Food and Rural Affairs
EU	European Union
LAQM	Local Air Quality Management
NO <sub>2</sub>	Nitrogen Dioxide
NO <sub>x</sub>	Nitrogen Oxides
PM <sub>10</sub>	Airborne particulate matter with an aerodynamic diameter of 10µm (micrometres or microns) or less
PM <sub>2.5</sub>	Airborne particulate matter with an aerodynamic diameter of 2.5µm or less

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# South Kesteven District Council

Annual Status Report 2024

Bureau Veritas

June 2024



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# Document Control Sheet

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SOUTH  
KESTEVEN  
DISTRICT  
COUNCIL

# 2024 Air Quality Annual Status Report (ASR)

In fulfilment of Part IV of the Environment Act 1995  
Local Air Quality Management, as amended by the  
Environment Act 2021

Date: June 2024

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<b>Report Reference Number</b>	South Kesteven_2024_ASR
<b>Date</b>	June 2024

## Executive Summary: Air Quality in Our Area

### Air Quality in South Kesteven

Breathing in polluted air affects our health and costs the National Health Service (NHS) and our society billions of pounds each year. Air pollution is recognised as a contributing factor in the onset of heart disease and cancer and can cause a range of health impacts, including effects on lung function, exacerbation of asthma, increases in hospital admissions and mortality. In the UK, it is estimated that the reduction in healthy life expectancy caused by air pollution is equivalent to 29,000 to 43,000 deaths a year<sup>1</sup>.

Air pollution particularly affects the most vulnerable in society, children, the elderly, and those with existing heart and lung conditions. Additionally, people living in less affluent areas are most exposed to dangerous levels of air pollution<sup>2</sup>.

Table ES.1 provides a brief explanation of the key pollutants relevant to Local Air Quality Management and the kind of activities they might arise from.

**Table ES.1 – Description of Key Pollutants**

Pollutant	Description
Nitrogen Dioxide (NO <sub>2</sub> )	Nitrogen dioxide is a gas which is generally emitted from high-temperature combustion processes such as road transport or energy generation.
Sulphur Dioxide (SO <sub>2</sub> )	Sulphur dioxide (SO <sub>2</sub> ) is a corrosive gas which is predominantly produced from the combustion of coal or crude oil.
Particulate Matter (PM <sub>10</sub> and PM <sub>2.5</sub> )	<p>Particulate matter is everything in the air that is not a gas.</p> <p>Particles can come from natural sources such as pollen, as well as human made sources such as smoke from fires, emissions from industry and dust from tyres and brakes.</p> <p>PM<sub>10</sub> refers to particles under 10 micrometres. Fine particulate matter or PM<sub>2.5</sub> are particles under 2.5 micrometres.</p>

<sup>1</sup> UK Health Security Agency. Chemical Hazards and Poisons Report, Issue 28, 2022.

<sup>2</sup> Defra. Air quality and social deprivation in the UK: an environmental inequalities analysis, 2006

South Kesteven, situated in the East Midlands of England and located in the county of South Lincolnshire, is a local government District with four main towns in its jurisdiction; Grantham, Bourne, Market Deeping and Stamford. The District is one of Britain's established visitor destinations with various holiday parks and Bed and Breakfasts (B&Bs) that support increasing tourism for the area. The District is popular for historical attractions, such as Belton House and Grimsthorpe Castle, and seeks to encourage countryside tourism through its established areas of geographical interest such as Grimsthorpe Special Area of Conservation (SAC), Barnack Hills and Holes SAC, and Baston Fen SAC. The location also seeks to encourage tourism by hosting several music events and festivals, for example Granthambury, and promotes active travel through the [Grantham Transport Strategy](#) which involves various integrated walking and cycling routes that connect to the broader East Midlands region.

The area occupies a key strategic position in Eastern England, with a variety of national railway stations connecting Edinburgh to London and facilitating access to the A1 and A15 road networks, comparative to neighbouring Council jurisdictions. Thus, the District acts as a gateway for many to visit Northern and Southern England, with the A1 a key corridor for vehicles and goods transportation. South Kesteven District is also approximately 37 miles east from East Midlands Airport, offering flights for passengers to continental Europe destinations such as Spain and France, and wider United Kingdom destinations such as Ireland, Scotland and northern England for example Newcastle.

South Kesteven District is approximately 365 square miles and boasts a rich variety of charming landscape, whilst providing access to local Areas of Outstanding Natural Beauty (AONB) such as Lincolnshire Woods AONB covering 216 square miles and approximately 33 miles north-east from the District's largest settlement, Grantham. There are also over 15 Sites of Special Scientific Interest (SSSI) in South Kesteven, two designated Woodnook Valley SSSI with other examples Allington Meadows SSSI, Grimsthorpe Park SSSI and Langtoft Gravel Pits SSSI. Furthermore, there are three Special Areas of Conservation (SAC), with Grimsthorpe SAC, Barnack Hills and Holes SAC, and Baston Fen SAC, as well as one Special Protection Area (SPA) and RAMSAR site in Rutland Water SPA and RAMSAR.

The District is predominantly a rural environment, with approximately 134,000 residents. The largest urban area is the town of Grantham where approximately 45,000 people live, followed by Stamford with approximately 21,000 residents. Other population centres across the District are Bourne and Market Deeping. The District is the eighth least densely

populated of the East Midland's 35 local authority areas, and is England's 153<sup>rd</sup> most densely populated area of the 309 local authority areas, as per the [Office for National Statistics \(ONS\)](#).

Air pollution within the District is predominantly caused by road traffic emissions originating from major roads including the A1, A15, A52, A606, and A1175 that pass through and around the area. Additionally, car ownership in households in South Kesteven is higher than the national average, 83.3% compared to 73.2% respectively, as reported in the [RAC Foundation](#). Vehicles as the major contributor to air pollution in South Kesteven is recognised by the [South Kesteven District Council Local Plan 2011-2036](#) and [Grantham Transport Strategy](#), which highlight that there is a dire need to minimise the requirement to travel by private car to employment, education and services due to the lack of provision of convenient public transport and sustainable travel modes in the District.

It is noted that major congestion often occurs in the District due to the strategic nature of the road links in connecting the area to wider England, with the majority of vehicles through-flow traffic, they do not start nor end their journeys within South Kesteven. This is reiterated by the [Department for Transport \(DfT\)](#) which reports that approximately 4.27 billion vehicle miles were travelled on roads in Lincolnshire (East Midlands) in 2023.

Furthermore, the A1 is recognised as a gateway to Northern and Southern England, as well as destinations in Eastern England such as the North Norfolk Coastline AONB with seasonal traffic flows in the area significantly changing with the influx of tourist-related through-flow traffic. Thus, this route has a tendency to become heavily congested on a periodic basis, resulting in the stopping and starting of vehicles, which in turns leads to elevated pollutant concentrations.

Other pollution sources including commercial, industrial, and domestic sources also contribute to pollutant concentrations within the District.

Due to South Kesteven District Council's (SKDC's) historic high reported Nitrogen Dioxide (NO<sub>2</sub>) concentrations, with some exceedances of the NO<sub>2</sub> Annual Mean Air Quality Standard (AQS) of 40 µg/m<sup>3</sup>, the 1-Hour NO<sub>2</sub> objective of 60 µg/m<sup>3</sup>, PM<sub>10</sub> 24-Hour Mean, and some occurrences within 10% of the annual NO<sub>2</sub> AQS, the District is considered to have some areas where the air quality is poor. Six air quality management areas (AQMAs) have been declared in response to these elevated pollutant concentrations, with five being revoked on 08/08/2013, as such only AQMA No.6 remains. South Kesteven District Council declared this AQMA in August 2013 for the NO<sub>2</sub> annual mean objective and NO<sub>2</sub> 1-Hour objective, with its extent encompassing Manthorpe Road, Wharf Road, High Street

and London Road.

During 2023, concentrations of NO<sub>2</sub> were monitored passively via a diffusion tube network of 58 sites. Of the 58 passive monitoring sites, 16 were single tube locations, 15 were duplicate monitoring locations, and four were triplicate monitoring sites. Thus, 35 sites were actually monitored across South Kesteven, 14 of which are located within AQMA No.6 (SK 19-22, 27-42, 50-57). When compared to the 35 sites that made up the diffusion tube network in the previous reporting year, the NO<sub>2</sub> annual mean concentration decreased at 24 locations, equating to a reduction in pollutant concentration at 68.57% of sites from 2022. No single diffusion tube site recorded an NO<sub>2</sub> annual mean concentration above the air quality objective of 40 µg/m<sup>3</sup> in 2023, with the maximum concentration within and outside of the AQMA being 36.1 µg/m<sup>3</sup> (SK33/SK34) and 29.3 µg/m<sup>3</sup> (SK45/SK46), respectively. NO<sub>2</sub> annual mean concentrations within South Kesteven have not exceeded the objective of 40 µg/m<sup>3</sup> since 2019, however they have been within 10% of the annual mean AQS objective between 2021-2023. Recent monitoring evidence suggests that there is no need to extend the current boundary for which the AQMA is designated, but there is a requirement to maintain the AQMA, particularly for the annual mean NO<sub>2</sub> objective. It is noted that AQMA revocation is proposed for the 1-Hour NO<sub>2</sub> objective, and the Council have prepared an updated AQAP document that is to be issued on 8<sup>th</sup> October 2024 pending Councillor and Cabinet approval.

## Actions to Improve Air Quality

Whilst air quality has improved significantly in recent decades, there are some areas where local action is needed to protect people and the environment from the effects of air pollution.

The Environmental Improvement Plan<sup>3</sup> sets out actions that will drive continued improvements to air quality and to meet the new national interim and long-term targets for fine particulate matter (PM<sub>2.5</sub>), the pollutant of most harmful to human health. The Air Quality Strategy<sup>4</sup> provides more information on local authorities' responsibilities to work towards these new targets and reduce fine particulate matter in their areas.

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<sup>3</sup> Defra. Environmental Improvement Plan 2023, January 2023

<sup>4</sup> Defra. Air Quality Strategy – Framework for Local Authority Delivery, August 2023

The Road to Zero<sup>5</sup> details the Government's approach to reduce exhaust emissions from road transport through a number of mechanisms, in balance with the needs of the local community. This is extremely important given that cars are the most popular mode of personal travel and the majority of Air Quality Management Areas (AQMAs) are designated due to elevated concentrations heavily influenced by transport emissions.

As part of the South Kesteven District Council's commitment to reduce the impacts of climate change, and specifically air pollution, the Council declared a climate emergency on 26<sup>th</sup> September 2019 and continues to progress and aim to hit 30% carbon emission reduction by 2030 for Council activities and across the District, as reported in the [South Kesteven Climate Action Strategy](#). The Climate Action Strategy sets out various actions to reduce Carbon Dioxide (CO<sub>2</sub>) emissions, of which also have shared benefits in improving air quality through reducing both NO<sub>2</sub> and Particulate Matter (PM) emissions. Examples include engagement with partners to support projects boosting biodiversity and tree planting across the District, using renewable energy sources to power buildings, ensuring a high-quality network of electric vehicle (EV) charging points are available, adopt Light Emitting Diode (LED) lighting, and further improve public transportation infrastructure and active travel provision across the District, particularly for urban journeys.

The Council have been committed to improving the District's social housing stock as well as broader accommodation in South Lincolnshire, thus making it more energy efficient. Via the Green Homes Grant (GHG) and Local Authority Delivery Phase 2 (LAD2), the Council has upgraded 164 properties with owner-occupiers and social housing tenants. These properties, with no connection to the gas supply grid, were previously heated with inefficient storage heaters or solid fuel systems, and as a result were more expensive to run with a higher-than-average carbon footprint. Works included installing energy saving measures such as solid wall insulation and renewable heating technologies Air Source Heat Pumps (ASHPs) and Solar PV, to replace the current electric heating systems. It is acknowledged that the scheme funding did not cover the cost of gas boiler replacements. Properties eligible for the grant were those with a low Energy Performance Certificate (EPC) rating of D, E, F or G, as well as households with a combined income of ≤£30,000 and savings <£16,000. The overall initiative has improved property thermal efficiency across South Kesteven with EPC ratings updated to minimum of Band C, as well as

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<sup>5</sup> DfT. The Road to Zero: Next steps towards cleaner road transport and delivering our Industrial Strategy, July 2018

reducing broader carbon footprint. More information can be found at:

<https://moderngov.southkesteven.gov.uk/documents/s36347/Energy%20Efficiency%20-%20Grant%20Funding.pdf>

South Kesteven District Council have continued work to deliver energy efficiency upgrades to targeted homes within the District, thus improving them and the wellbeing of tenants, by securing £1.2 million in funding through the [Home Upgrade Grant \(HUG\)](#), currently in phase two (HUG2), and the [Local Authority Delivery Phase 3 \(LAD3\)](#) scheme. The Council are working in collaboration with energy experts YES Energy Solutions to deliver this incentive, with 49 properties in the District having been upgraded. The core aims of the schemes are to alleviate fuel poverty alongside reducing carbon emissions associated with energy used in domestic properties. Works include internally insulating and rendering the building, replacing kitchens, loft and floor voids insulation, installing photovoltaic panels and more energy-efficient air source heat pumps to replace the current electric heating system. Thus, improving property thermal efficiency with EPC ratings updated in most instances to Band C, as well as reducing broader carbon footprint.

South Kesteven District Council has also installed solar PV on leisure centres in Grantham, Bourne and Stamford which provide energy used on site, reduce carbon emissions and generate income.

During 2023, South Kesteven District Council commissioned a Source Apportionment Exercise to support their updated AQAP document, shown in Appendix F. The assessment involved reviewing Automatic Traffic Count (ATC) and Automatic Number Plate Recognition (ANPR) traffic data within and around the outskirts of the AQMA boundary to determine the composition of vehicles travelling in the centre of Grantham. Thus, ascertaining which vehicle types are most polluting and contributing to increased NO<sub>2</sub> concentrations across South Kesteven. From the exercise, the Council were able to outline key strategies to implement which seek to reduce air pollutant concentrations in the District, as detailed in the updated AQAP set for issue on 8<sup>th</sup> October 2024 post approval by Councillors and Cabinet. This project demonstrates the Council's approach to collaborative working with partner organisations to improve air quality within the area and for its residents and visitors' welfare, particularly those who are vulnerable.

The Council has been awarded a total of £540,460 in funding through The Rural Fund, integrated into the UK Shared Prosperity Fund (UKSPF), for projects delivered between 2023 and March 2025. The fund finances projects across rural areas throughout South Kesteven, with a key objective for business projects inclusive of but not limited to

productivity enhancing, energy efficient and low carbon technologies and techniques. Thus, encouraging applicants to consider the impact of their business on the environment and subsequent longevity of their proposals. More information can be found at: <https://www.southkesteven.gov.uk/economic-development/south-kesteven-rural-fund>

South Kesteven District Council maintains to promote the [Let's Move Lincolnshire](#) initiative who highlight free sessions for locals across various activities within South Kesteven District, such as swimming, cycling, walking. This platform encourages active transportation uptake and methods across the District whilst outlining benefits of active transport on air quality and health.

The Council, alongside Lincolnshire County Council (LCC), continue to progress with, develop and enhance the [Komoot](#) app. Komoot is an app for encouraging cycling in South Kesteven, as well as alternate locations, with users able to review a collection of road biking routes around the area. Individuals are able to utilise the 'Tours' tab to see a full breakdown of route details including elevation profiles and surface analyses, as well as browsing cycling tips and photos shared by other members of the Komoot community. The app seeks to promote an inclusive community with future collaboration between the Council, neighbouring local authorities, and people by working together to identify opportunities to improve air quality by limiting emission source(s) use whilst encouraging mortality longevity.

During 2023 the Council has maintained its positive relationship with the bicycle club [Witham Wheelers](#) in Grantham, who are part of British Cycling's GoRide development programme and were established in 1958. The club offer cycling activities such as: club rides, touring, time trials, road racing, track racing, sportives, cyclo-cross, mountain biking, and charity events. This relationship promotes the use and benefits of active transport on air quality and health whilst educating the next generation to reduce vehicle uptake.

South Kesteven District Council maintains to promote the [Cliff Edge Cycles](#) innovative bike sharing and hiring services. The scheme replicates notable cycle sharing schemes found in large metropolitan areas (e.g., Santander Cycles, Mobike, Lime) and compliment the rural and urban cycling routes. Cliff Edge Cycles also offer chargeable bicycle servicing sessions for locals to check that their bikes are safe and make minor adjustments to get them on the road. They attempt to promote alternative and accessible forms of travel between neighbouring towns and villages across the East Midlands region to help its residents lead active lifestyles and limit vehicular emissions. The business has a local base in Wyndham Park in Grantham.

Lincolnshire County Council, with support of South Kesteven District Council, have issued the [Grantham Transport Strategy](#), with identification of three key areas in Grantham with high propensity for walking and cycling, as such there is proposed development for a cycle and pedestrian priority junction, toucan crossings and segregated cycle lanes at the following locations:

- North of Grantham town centre towards Manthorpe, via Grantham and District Hospital;
- South of Grantham town centre along A52 Somerby Hill; and
- West of Grantham town centre along A52 Barrowby Road.

Identified routes experience high commuting levels due to key destinations including the population centres. Thus, it is proposed that greater active travel infrastructure is established to support the adoption comparative to vehicle commuting to these areas, therefore reducing emissions released.

South Kesteven District Council promotes active travel, and the reduction in vehicle usage and subsequent emissions, through walking with established Core Walking Zones (CWZs) across the District. The CWZs have been assessed and audited to ensure safety and identify any required interventions along the pedestrian corridors within each CWZ.

Interventions proposed include improving existing infrastructure as well as introducing new pedestrian facilities such as wayfinding, new pedestrian crossings and benches to improve the public realm.

The Council, alongside neighbouring and far-reach Councils, is host to the [National Cycle Network \(NCN\)](#) as well as having a Local Cycle Network (LCN) that forms the connections between the NCN and destinations such as small town centres and villages. The NCN provides a strategic network for the county with connections to key destinations, towns, villages, transport hubs, employment and housing areas with long distance trails and loops that support the visitor economy in the District. A key NCN route in South Kesteven is [Route 15](#), which leads into Grantham centre and along the canal.

The District continued to promote the cycling initiative '[Bikeability](#)' in 2023, led by Lincolnshire County Council. The scheme, focussed at school children and adults, involves frequent cycling proficiency courses and has educated circa 100,000 people as of May 2023 with the area named amongst the top ten local authorities for providing cycle training within 2023. The initiative has centred on three core stages, Bikeability: Level 1, Level 2 and Level 3, with individuals required to meet specific criteria to enable being

accredited the awards. There is also 'Bikeability Balance' and 'Bikeability Learn to Ride' levels which bode a suite of courses to meet needs and specifically to complement and support the core training delivered. The scheme also offers 'Bikeability Families' and 'Cycle Confidence' courses which provide parents/carers skills to cycle safely with children and allows individuals to develop cycling skills and build confidence. This programme seeks to encourage the uptake of cycling across the District, therefore, seeking to reduce pollutant concentrations imminently and through actions of longevity by also targeting future generations.

The Council promotes its established and well-connected main rail network with the branch line between Edinburgh and London via Grantham one of the area's railway routes, a core, busy commuter line that connects South Kesteven with wider English and Scottish destinations. Highlighting the benefits of public transport on air quality comparative to private vehicle use to commute.

South Kesteven District Council actively encourages developers at the planning stage to install electric charging points or consider suitable infrastructure to allow for future cost-efficient installations, as outlined in Policy SB1 of the [South Kesteven District Council Local Plan 2011-2036](#).

In 2023, South Kesteven District Council adopted the '[Lincolnshire Electric Vehicle Strategy](#)' which recommends that in collaboration with Lincolnshire County Council, circa 1100 Electric Vehicle (EV) publicly funded charging points are to be delivered by 2030 in the District, assuming a blend of both rapid and fast chargers. There will be a particular focus on charging points on residential streets in rural and remote areas with electric grid constraints, where higher uptakes of EVs are forecast and communities without or with limited access to off-street parking. The scheme, funded by Department for Transport's Local Electric Vehicle Infrastructure (LEVI) Fund, will significantly expand on an already growing network of on and off-street EV charging points in South Kesteven and neighbouring Councils.

South Kesteven District Council has developed a programme of charging points for Electric Vehicles (EV) across the area, resulting in 12 new EV charging points being implemented in Council owned car parks across the District since 2020. Installation of EV charging points in South Kesteven has been funded by the On-Street Residential Charge Point Scheme (OSRCPs), delivered by the Office of Zero Emission Vehicles (OZEV). The initiative seeks to support communities, aiming to provide convenient and efficient charging for residents without off-street parking as well as visitors. Furthermore, charge

points have been installed to assist residents in South Kesteven convert from internal combustion vehicles to EVs. As more residents use electric vehicles, communities will benefit from improved air quality and lower their carbon footprint. The uptake of each installed charger is monitored to understand demand and inform future installations. More information can be found at: <https://www.southkesteven.gov.uk/parking-transport-and-roads/electric-vehicle-charging/skdc-electric-vehicle-charging-points>

South Kesteven District Council has also encouraged Ultra Low Emission Vehicle (ULEV) adoption across the District during the 2023 monitoring year, with infrastructure to support the uptake of ULEVs being implemented as aforementioned with a wider extent planned for implementation.

The Department for Transport (DfT) awarded Lincolnshire County Council £799,900 in funding through the Active Travel Fund. Through this, the 'Grantham Active Travel Zone' has been proposed, referenced in the Lincolnshire County Council issued [Grantham Transport Strategy](#), which aims at redeveloping the centre to improve travel choices and the transport network for people living, working, and visiting Grantham, in response to the climate emergency declared in 2019. The programme set out the Council's transport infrastructure priorities until 2036, with many schemes progressed or delivered as of 2023. The structural amendments to Grantham's pedestrian routes, cycleways, rail and road infrastructure seeks to allow easy interchange with other modes of public and active transport, promoting a green, cleaner District and broader, East Midlands region.

Improvements proposed, inclusive of but not limited to, are:

- High Street – Creation of a one-way system with a 'sustainable travel corridor' allowing buses and cycles to progress southbound on High Street towards St Peter's Hill but no other traffic. Northbound traffic heading towards Watergate would continue;
- St Peter's Hill – Straight ahead lane removed from the west side including along the frontage of Munch and Prezzo, turning it into a wider footway and area for outdoor retail/hospitality;
- St Peter's Hill – Eastbound lane removed to continue the sustainable travel corridor, breaking into filter lanes opposite Belvoir Estate agents; and
- Closure of Guildhall Street at the junction of High Street, but deliveries allowed.

The Council continue to promote and engage with the Lincolnshire County Council led [Clean Air Lincolnshire](#) project which is a partnership funded by DEFRA, between public health, sustainability, and environmental health departments at the eight local authorities

in Lincolnshire, inclusive of South Kesteven District Council. There are also eight Lincolnshire schools participating in the project, using air quality monitoring to encourage action for cleaner air in their school areas, with The Kings School Grantham a participant, located within AQMA No.6. Overall, the initiative seeks to increase awareness of air pollution, the sources and impacts of it, and encourage supportive actions that will improve air quality for the District and individual's health.

## Conclusions and Priorities

During 2023, the NO<sub>2</sub> annual mean objective was not exceeded at any monitoring location both within and outside of the AQMA boundary. This is a continuing trend that has been observed across the area since 2019, with the known exception of SK33/SK34 in 2019, as discussed in this ASR. However, concentrations have frequently been within 10% of the annual NO<sub>2</sub> AQS objective of 40 µg/m<sup>3</sup>, with the exception of 2020 acknowledged as a COVID-19 year. Therefore, the monitoring data does not support the Council's revocation of AQMA No.6 for the NO<sub>2</sub> annual mean AQS objective. It is noted that monitoring data for the past 11 years (including 2023) supports revocation of AQMA No.6 for the NO<sub>2</sub> 1-Hour objective.

It is acknowledged that the Council have prepared an updated AQAP document for AQMA No.6 which encompasses action for only the annual mean NO<sub>2</sub> AQS objective, given revocation of the AQMA for the NO<sub>2</sub> 1-Hour objective. The updated AQAP shall be issued on 8<sup>th</sup> October 2024 pending Councillor and Cabinet approval.

The Council will continue to use the passive monitoring network to monitor air quality within the District and ensure compliance is maintained with the annual NO<sub>2</sub> AQS objective.

The following actions are considered to be key priorities in ensuring the air quality conditions within South Kesteven continue to comply with the AQS objectives:

- Finalising preparation of the Draft Action Plan to ensure it can be issued publicly on 8<sup>th</sup> October 2024 post Councillor and Cabinet appraisal;
- Greater progression and completion of actions within the [Grantham Transport Strategy](#), to improve walking, cycling, rail and road infrastructure and to integrate greater public transport sources;
- Continue to review the current monitoring programme, exploring the need to deploy new monitoring locations in areas where monitoring has not previously been undertaken and where it is believed that there may be elevated concentrations of

NO<sub>2</sub> in areas of relevant public exposure, relocate monitoring tubes, or remove locations where necessary;

- Actively engage with developers at planning application stages to promote the installation of electric vehicle (EV) charging or alternatively, provide suitable infrastructure to allow for future cost-efficient installations as per Policy SB1 in [South Kesteven District Council Local Plan 2011-2036](#);
- Implementation of the scheduled EV charging points on streets and in car parks across the District as per [Lincolnshire Electric Vehicle Strategy](#);
- Continue to provide an integrated transport network to facilitate the efficient movement of pedestrian and vehicular traffic, goods, and services across the District as per [Grantham Transport Strategy](#);
- Continue to reduce the volume of traffic on the city roads by encouraging effective active transport methods (e.g. public transport, cycling, and walking);
- Continue to improve the existing walking and cycling network by acquiring funding for development;
- Take action via the Lincolnshire County Council led [Clean Air Lincolnshire](#) project to increase awareness of air pollution, the sources and impacts of it, and encourage supportive actions that will improve air quality for the District and individual's health, with a focus on The King's School in Grantham who deploy air quality monitoring equipment in and around their grounds; and
- Implement measures within the [South Kesteven Climate Action Strategy](#) to further reduce concentrations of NO<sub>2</sub> and PM.

## Local Engagement and How to get Involved

Given the main source of air pollution across South Kesteven is from transport sources, the public can support the reduction in air pollutant(s) release and improve air quality within the District by participating in active travel.

South Kesteven District Council have progressed additional public engagement work in 2023 through the below schemes, although the engagement schemes in 2022 are still active:

- The collaborative relationship with Lincolnshire County Council to roll out a programme of charging points for EVs across the District through the [Lincolnshire Electric Vehicle Strategy](#), with circa 1100 EV charging points scheduled for implementation;

- Successfully implementing 12 EV charging points in Council owned car parks for public use, alongside Office of Zero Emission Vehicles (OZEV);
- Improving the use of ULEVs across the District through improving infrastructure to support the uptake with a wider extent planned for implementation;
- Acquiring funding through The Rural Fund, integrated into the UK Shared Prosperity Fund (UKSPF), for projects with a key objective of productivity enhancement, energy efficient and low carbon technologies and techniques. Thus, encouraging applicants to consider the impact of their business in South Kesteven on the environment and subsequent longevity of their proposals;
- Continue to offer active transport education to children, the future generation, and adults through cycling proficiency courses via the '[Bikeability](#)' initiative, reducing vehicular pollutant emissions with circa 100,000 people engaging in the scheme;
- Planned investment via the [Grantham Transport Strategy](#) to further enhance adoption and utilisation of the public transport network;
- Collaboration between local businesses and clubs via [Let's Move Lincolnshire](#) initiative to host events promoting active transport and the benefits supporting people in becoming more sustainable and reducing their air pollutant contributions;
- Promotion of the [National Cycle Network \(NCN\)](#) and the Core Walking Zones (CWZs) post COVID-19 lockdown, encouraging active travel across the District and wider East Midlands region, with a community focus;
- Collaboration with Lincolnshire County Council, neighbouring local authorities and local residents through the [Clean Air Lincolnshire](#) project to increase awareness of air pollution, the sources and impacts of it, and encourage supportive actions that will improve air quality for the District and individual's health, with a focus on The King's School in Grantham who deploy air quality monitoring equipment in and around their grounds; and
- Enhancement and further endorsement of the [Witham Wheelers](#) and [Cliff Edge Cycles](#) innovative bike sharing services who offer cycling activities such as: club rides, supported rides, as well as chargeable bike maintenance workshops for locals to ensure bikes are safe and road worthy and broader bicycle hire. Thus, promoting the use and benefits of active transport on air quality and health whilst educating the next generation to reduce vehicle uptake, supporting the establishment of a greener, cleaner District.

The following measures are possible alternatives to private travel and actions that

everyone can complete that would contribute to improving air quality within the area:

- Use public transport where available – This reduces the number of private vehicles in operation reducing pollutant concentration through the volume of vehicles and limits congestion;
- Walk or cycle if your journey allows – From choosing to walk or cycle for your journey the number of vehicles is reduced and also there is the added health benefits through exercise;
- Car/lift sharing – Where a number of individuals are making similar journeys, such as travelling to work or to school car sharing reduces the volume of vehicles on the road and therefore the amount of emissions being released. This can be promoted via travel plans through the workplace and within schools;
- Alternative fuel / more efficient vehicles – Choosing a vehicle that meets the specific needs of the owner, fully electric, hybrid fuel and more fuel efficient cars are available, and all have different levels benefits by reducing the amount of emissions being released; and
- Asking your employer, school or college about the possibility of developing a green travel plan.

The public can also engage with air quality issues via South Kesteven District Council's dedicated [Air Quality Website](#). This provides information on a range of air quality topics, such as the current monitoring locations, the latest AQAP, declared AQMAs, and copies of previous ASRs.

## Local Responsibilities and Commitment

This ASR was prepared by Bureau Veritas on behalf of South Kesteven District Council, with the support of the following officers and departments:

- Francesca Bell, Senior Environmental Health Officer

This ASR has been approved by:

- Francesca Bell, Senior Environmental Health Officer

This ASR has not been signed off by a Director of Public Health.

If you have any comments on this ASR please send them to Francesca Bell at: South Kesteven District Council, The Picture House, St Catherine's Rd, Grantham, Lincolnshire, NG31 6TT.

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## Table of Contents

<b>Executive Summary: Air Quality in Our Area .....</b>	<b>i</b>
Air Quality in South Kesteven.....	i
Actions to Improve Air Quality .....	iv
Conclusions and Priorities .....	xi
Local Engagement and How to get Involved .....	xii
Local Responsibilities and Commitment .....	xiv
<b>1 Local Air Quality Management.....</b>	<b>1</b>
<b>2 Actions to Improve Air Quality.....</b>	<b>2</b>
<b>2.1 Air Quality Management Areas .....</b>	<b>2</b>
<b>2.2 Progress and Impact of Measures to address Air Quality in South Kesteven ...</b>	<b>5</b>
<b>2.3 PM<sub>2.5</sub> – Local Authority Approach to Reducing Emissions and/or Concentrations .....</b>	<b>11</b>
<b>3 Air Quality Monitoring Data and Comparison with Air Quality Objectives and National Compliance .....</b>	<b>15</b>
<b>3.1 Summary of Monitoring Undertaken .....</b>	<b>15</b>
3.1.1 Automatic Monitoring Sites.....	15
3.1.2 Non-Automatic Monitoring Sites .....	15
<b>3.2 Individual Pollutants.....</b>	<b>15</b>
3.2.1 Nitrogen Dioxide (NO <sub>2</sub> ).....	16
3.2.2 Particulate Matter (PM <sub>10</sub> ).....	18
3.2.3 Particulate Matter (PM <sub>2.5</sub> ) .....	18
3.2.4 Sulphur Dioxide (SO <sub>2</sub> ) .....	18
<b>Appendix A: Monitoring Results .....</b>	<b>19</b>
<b>Appendix B: Full Monthly Diffusion Tube Results for 2023 .....</b>	<b>30</b>
<b>Appendix C: Supporting Technical Information / Air Quality Monitoring QA/QC .....</b>	<b>34</b>
<b>New or Changed Sources Identified Within South Kesteven During 2023 .....</b>	<b>34</b>
<b>Additional Air Quality Works Undertaken by South Kesteven District Council During 2023.....</b>	<b>34</b>
<b>QA/QC of Diffusion Tube Monitoring .....</b>	<b>34</b>
Diffusion Tube Annualisation .....	35
Diffusion Tube Bias Adjustment Factors .....	35
NO <sub>2</sub> Fall-off with Distance from the Road.....	36
<b>Appendix D: Maps of Monitoring Locations and AQMAs.....</b>	<b>38</b>
<b>Appendix E: Summary of Air Quality Objectives in England .....</b>	<b>47</b>
<b>Appendix F: Source Apportionment Exercise – AQAP .....</b>	<b>48</b>
<b>Glossary of Terms .....</b>	<b>49</b>
<b>References .....</b>	<b>51</b>

## List of Figures

Figure 2.1 – South Kesteven District Council AQMA No.6 (2013) .....	3
Figure A.1 – Trends in Annual Mean NO <sub>2</sub> – Diffusion Tubes (Within AQMA No.6).....	26
Figure A.2 – Trends in Annual Mean NO <sub>2</sub> – Diffusion Tubes (Within AQMA No.6 - Continued) .....	27
Figure A.3 – Trends in Annual Mean NO <sub>2</sub> – Diffusion Tubes (Sites in Grantham (Outside AQMA)).....	28
Figure A.4 – Trends in Annual Mean NO <sub>2</sub> – Diffusion Tubes (Sites in Stamford) .....	29
Figure C. 1 - National Bias Adjustment Factor Spreadsheet (03/24).....	37
Figure D. 1 – All Non-Automatic Monitoring Locations in South Kesteven and AQMA No.6 .....	38
Figure D. 2 – Non-Automatic Monitoring Locations: Stamford .....	39
Figure D. 3 – Non-Automatic Monitoring Locations: Grantham.....	40
Figure D. 4 – Non-Automatic Monitoring Locations: Grantham AQMA No.6.....	41
Figure D. 5 – 2023 Annual NO <sub>2</sub> Concentrations All Non-Automatic Monitoring Locations.	42
Figure D. 6 – 2023 Annual NO <sub>2</sub> Concentrations All Non-Automatic Monitoring Locations: Stamford .....	43
Figure D. 7 – 2023 Annual NO <sub>2</sub> Concentrations All Non-Automatic Monitoring Locations: Grantham.....	44
Figure D. 8 – 2023 Annual NO <sub>2</sub> Concentrations All Non-Automatic Monitoring Locations: Grantham AQMA No.6.....	45

## List of Tables

Table 2.1 – Declared Air Quality Management Areas .....	4
Table 2.2 – Progress on Measures to Improve Air Quality.....	9
Table A.1 – Details of Non-Automatic Monitoring Sites .....	19
Table A.2 – Annual Mean NO <sub>2</sub> Monitoring Results: Non-Automatic Monitoring (µg/m <sup>3</sup> ) ....	23
Table B.1 – NO <sub>2</sub> 2023 Diffusion Tube Results (µg/m <sup>3</sup> ) .....	30
Table E.1 – Air Quality Objectives in England .....	47

# 1 Local Air Quality Management

This report provides an overview of air quality in South Kesteven during 2023. It fulfils the requirements of Local Air Quality Management (LAQM) as set out in Part IV of the Environment Act (1995), as amended by the Environment Act (2021), and the relevant Policy and Technical Guidance documents.

The LAQM process places an obligation on all local authorities to regularly review and assess air quality in their areas, and to determine whether or not the air quality objectives are likely to be achieved. Where an exceedance is considered likely the local authority must declare an Air Quality Management Area (AQMA) and prepare an Air Quality Action Plan (AQAP) setting out the measures it intends to put in place in order to achieve and maintain the objectives and the dates by which each measure will be carried out. This Annual Status Report (ASR) is an annual requirement showing the strategies employed by South Kesteven District Council to improve air quality and any progress that has been made.

The statutory air quality objectives applicable to LAQM in England are presented in Table E. 1.

## 2 Actions to Improve Air Quality

### 2.1 Air Quality Management Areas

Air Quality Management Areas (AQMAs) are declared when there is an exceedance or likely exceedance of an air quality objective. After declaration, the authority should prepare an Air Quality Action Plan (AQAP) within 18 months. The AQAP should specify how air quality targets will be achieved and maintained and provide dates by which measures will be carried out.

In August 2013, South Kesteven District Council declared AQMA No.6 for exceedances of the NO<sub>2</sub> annual mean and 1-Hour objectives. The AQMA is described as an:

*“Area encompassing Manthorpe Road, Wharf Road, High Street and London Road.”*

The extent of AQMA No.6 is shown below in Figure 2.1, and details of the AQMA are described in Table 2.1.

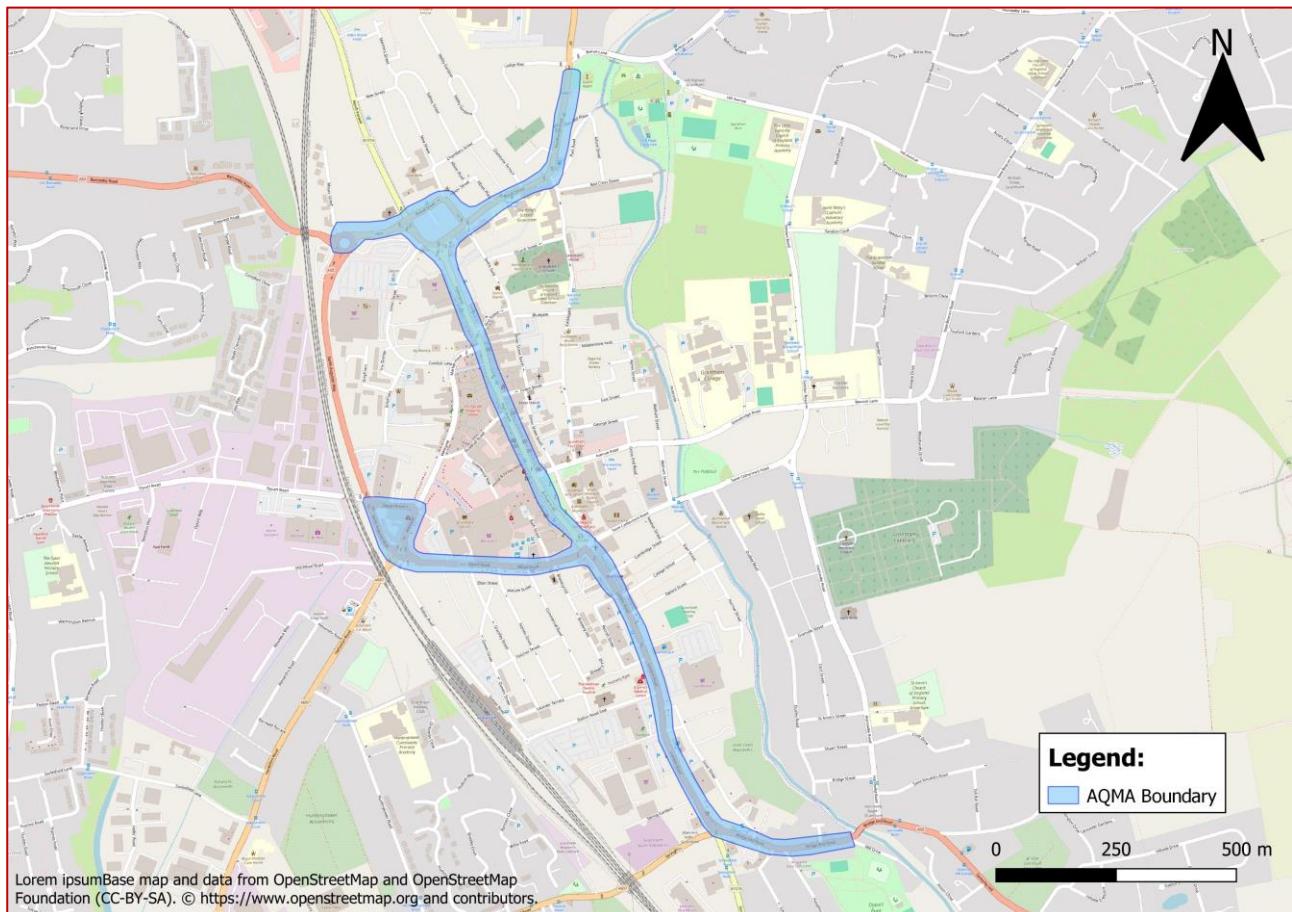
The Council has not achieved compliance with the NO<sub>2</sub> annual mean objective of 40 µg/m<sup>3</sup> since 2019, with duplicated monitoring location SK33 and SK34 reporting a concentration above the annual objective of 40.7 µg/m<sup>3</sup> in 2019. Between 2021-2023 this location has consistently reported concentrations within 10% of the NO<sub>2</sub> annual mean AQS, 36.6 µg/m<sup>3</sup> (2021), 37.8 µg/m<sup>3</sup> (2022) and 36.1 µg/m<sup>3</sup> (2023). Duplicate monitoring location SK50 and SK51 also fell within 10% of the annual mean NO<sub>2</sub> objective in 2019 reporting a concentration of 39.6 µg/m<sup>3</sup>.

2020 and 2021 were affected by COVID-19 management measures which restricted travel. These years are therefore not considered representative of long term trends for when discussing NO<sub>2</sub> annual mean compliance if an exceedance of the objective occurred in 2019. Given compliance with the annual mean NO<sub>2</sub> objective (40 µg/m<sup>3</sup>) was not achieved in 2019 with the known exceedance at SK33 and SK34, and concentrations have been within 10% of the annual mean NO<sub>2</sub> objective between 2021-2023, the monitoring data is currently insufficient to support the Council's revocation of AQMA No.6. It is noted that there are two consecutive years of compliance to date, 2022 and 2023, when considering the NO<sub>2</sub> annual mean objective of 40 µg/m<sup>3</sup>, excluding concentrations reported within 10% of the objective.

As such, the Council have prepared an updated AQAP for the District which will replace

the outdated 2016 version. The latest AQAP document is scheduled for issue on 8<sup>th</sup> October 2024, pending Councillor and Cabinet approval, and is only for the NO<sub>2</sub> annual mean, as the Council intend to submit for revocation of the NO<sub>2</sub> 1-Hour AQMA No.6 in 2024. Appendix F evidences the Source Apportionment Study which is included within the AQAP.

**Figure 2.1 – South Kesteven District Council AQMA No.6 (2013)**



**Table 2.1 – Declared Air Quality Management Areas**

AQMA Name	Date of Declaration	Pollutants and Air Quality Objectives	One Line Description	Is air quality in the AQMA influenced by roads controlled by Highways England?	Level of Exceedance: Declaration	Level of Exceedance: Current Year	Number of Years Compliant with Air Quality Objective	Name and Date of AQAP Publication	Web Link to AQAP
SKDC AQMA No.6	08/08/2013	NO <sub>2</sub> Annual Mean	An area encompassing Manthorpe Road, Wharf Road, High Street and London Road.	No	58.2 µg/m <sup>3</sup>	36.1 µg/m <sup>3</sup> (SK33/SK34)	2 (2022 and 2023 – 2020 and 2021 rejected COVID-19 years)	SKDC Air Quality Action Plan 2016	<a href="https://www.southkesteven.gov.uk/sites/default/files/2023-07/Air_Quality_Action_Plan_2016.pdf">https://www.southkesteven.gov.uk/sites/default/files/2023-07/Air_Quality_Action_Plan_2016.pdf</a>
SKDC AQMA No.6	08/08/2013	NO <sub>2</sub> 1 Hour Mean	An area encompassing Manthorpe Road, Wharf Road, High Street and London Road.	No	None predicted as annual mean is below 60 µg/m <sup>3</sup>	None predicted as annual mean is below 60 µg/m <sup>3</sup>	11	SKDC Air Quality Action Plan 2016	<a href="https://www.southkesteven.gov.uk/sites/default/files/2023-07/Air_Quality_Action_Plan_2016.pdf">https://www.southkesteven.gov.uk/sites/default/files/2023-07/Air_Quality_Action_Plan_2016.pdf</a>

South Kesteven District Council confirm the information on UK-Air regarding their AQMA(s) is up to date.

South Kesteven District Council confirm that all current AQAPs have been submitted to Defra.

## 2.2 Progress and Impact of Measures to address Air Quality in South Kesteven

Defra's appraisal of last year's ASR concluded that:

*"The report is well structured, detailed, and provides the information specified in the Guidance."*

The following comments were designed to help inform South Kesteven 2024 ASR:

1. Incorrect annual mean concentration data in Tables A.2 and B.1. The 2022 annual mean concentration data in Table A.2 do not match with those provided in Table B.1 (from SK37 and below).
  - a. This was addressed in a re-submission of the 2023 ASR, and the annual mean concentration data was corrected. Data has been checked in 2024 ASR to ensure it is correct.
2. Comments from last year's ASR have been mentioned and addressed, which is welcomed, and it is encouraged that this continues with future ASRs.
  - a. The appraisal comments from 2023 ASR have been addressed in the 2024 ASR.
3. The AQAP is now seven years old and is therefore due for review. If it is determined by the Council that the AQMA is no longer required due to the completion of three consecutive years of compliance, an AQS should be prepared.
  - a. The Council confirm that they have prepared a new AQAP due for issue on 8<sup>th</sup> October 2024 pending Councillor and Cabinet approval.
4. All graphs are well presented and are clear to read, with the addition of the AQS allowing for visual analysis of the monitoring data. Formatting is consistent between all charts. The Council have also provided a detailed discussion of these trends.
  - a. This has been continued in the 2024 ASR.
5. When additional staffing resource is available, the Council should consider the relocation of some monitoring sites that continuously show low concentrations, such as site SK3.
  - a. SK3 remains in the location previously reported in the 2024 ASR, the Council are aware of the requirement to relocate or remove this tube as well as

additional tubes across the District that have consistently reported low concentrations.

6. NO<sub>2</sub> 1 hour mean is compliant with Air Quality Objective for ten years and the AQMA declaration for the NO<sub>2</sub> 1 hour mean objective should be revoked.
  - a. The Council confirm that the new AQAP due for issue on 8<sup>th</sup> October 2024 pending Councillor and Cabinet approval is only for the NO<sub>2</sub> annual mean, as the Council intend to submit for revocation of the NO<sub>2</sub> 1-Hour AQMA No.6 in 2024.
7. Defra recommends that Directors of Public Health approve draft ASRs. Sign off is not a requirement, however collaboration and consultation with those who have responsibility for Public Health is expected to increase support for measures to improve air quality, with co-benefits for all. Please bear this in mind for the next annual reporting process too.
  - a. The Council acknowledge that ASR sign off by a Director of Public Health is not a requirement but recommended, however, this has not been organised for the 2024 ASR. It is noted to try arranging such sign off for 2025 ASR.
8. A national bias adjustment factor has been applied. It would be beneficial to include a screenshot of the tool so the factor can be verified.
  - a. This has been included in the 2024 ASR.
9. All DT locations are illustrated on four different maps. However, it would be helpful to include a map that shows all DT locations within the SKDC boundaries.
  - a. Various maps have been provided in Appendix D of the 2024 ASR to show monitoring locations across South Kesteven District Council, including one highlighting all monitoring locations in the District.

South Kesteven District Council has taken forward a number of direct measures during the current reporting year of 2023 in pursuit of improving local air quality. Details of all measures completed, in progress or planned are set out in Table 2.2. There are 10 measures included within Table 2.2, with the type of measure and the progress South Kesteven District Council have made during the reporting year of 2023 presented. Where there have been, or continue to be, barriers restricting the implementation of the measure, these are also presented within Table 2.2.

South Kesteven District Council's key completed measures are:

- Updating the existing AQAP document for issue on 8<sup>th</sup> October 2024;
- Commissioning a Source Apportionment Exercise to support the updated AQAP, reviewing Automatic Traffic Count (ATC) and Automatic Number Plate Recognition (ANPR) traffic data within and around the outskirts of the AQMA boundary to determine the composition of vehicles travelling in the centre of Grantham. Thus, ascertaining which vehicle types are most polluting and contributing to increased NO<sub>2</sub> concentrations across South Kesteven. From the exercise, the Council were able to outline key strategies to implement which seek to reduce air pollutant concentrations in the District, as detailed in the updated AQAP;
- Acquiring funding through The Rural Fund, integrated into the UK Shared Prosperity Fund (UKSPF), for projects with a key objective of productivity enhancement, energy efficient and low carbon technologies and techniques;
- Successfully implementing 12 new EV charging points in Council owned car parks across the District;
- Collaboration between local businesses and clubs via [Let's Move Lincolnshire](#) initiative to host events promoting active transport and the benefits supporting people in becoming more sustainable and reducing their air pollutant contributions;
- Through the Green Homes Grant (GHG) and Local Authority Delivery Phase 2 (LAD2), the Council has upgraded the District's social housing stock with 164 properties improved. Thus, increasing property thermal efficiency across South Kesteven with EPC ratings updated to minimum of Band C, as well as reducing broader carbon footprint;
- Secured £1.2 million in funding through the [Home Upgrade Grant \(HUG\)](#), currently in phase two (HUG2), and the [Local Authority Delivery Phase 3 \(LAD3\)](#) scheme, to alleviate fuel poverty alongside reducing carbon emissions associated with energy used in domestic properties. Working in collaboration with YES Energy Solutions to deliver this incentive, the initiative has supported the improvement of 49 properties in the District;
- Continue to offer active transport education to children, the future generation, and adults through cycling proficiency courses via the '[Bikeability](#)' initiative, reducing vehicular pollutant emissions with circa 100,000 people engaging in the scheme confirmed in May 2023; and
- Supported Lincolnshire County Council issue of the finalised [Grantham Transport Strategy](#), encouraging active travel across the District and wider East Midlands region, with a community focus.

South Kesteven District Council's priorities for the coming year are:

- Acquiring Councillor and Cabinet approval of the AQAP so it can be a public facing issued document in 2024;
- Implement measures within the [South Kesteven Climate Action Strategy](#) to further reduce concentrations of NO<sub>2</sub> and PM;
- Progress upgrades of District housing stock through the [Home Upgrade Grant \(HUG\)](#) and Green Homes Grant (GHG) to alleviate fuel poverty alongside reducing carbon emissions associated with energy used in domestic properties, thus improving South Kesteven's carbon footprint;
- Promote engagement with the Lincolnshire County Council led [Clean Air Lincolnshire](#) project to increase awareness of air pollution, the sources and impacts of it, and encourage supportive actions that will improve air quality for the District and individual's health;
- Further develop the area through the [Grantham Transport Strategy](#), expanding active transport accessibility and encouraging adoption of it as well as improving road connectivity across the District; and
- Continue to implement EV charging points throughout the District as part of the [Lincolnshire Electric Vehicle Strategy](#) to support the uptake of EVs and those residing in remote locations, with circa 1100 charging points planned for development in the District.

South Kesteven District Council worked to implement measures in partnership with the following stakeholders during 2023:

- UK Government (DfT);
- Local businesses and charities;
- Neighbouring local authorities; and
- Lincolnshire County Council.

Table 2.2 – Progress on Measures to Improve Air Quality

Measure No.	Measure Title	Category	Classification	Year Measure Introduced in AQAP	Estimated / Actual Completion Date	Organisations Involved	Funding Source	Defra AQ Grant Funding	Funding Status	Estimated Cost of Measure	Measure Status	Reduction in Pollutant / Emission from Measure	Key Performance Indicator	Progress to Date	Comments / Barriers to Implementation
M1	Grantham Southern Quadrant East West Relief Road	Traffic Management	Strategic highway improvements, Re-prioritising road space away from cars, including Access management, Selective vehicle priority, bus priority, high vehicle occupancy lane	2016	2023	Lincolnshire County Council Highways & South Kesteven DC	Lincolnshire County Council	NO	Funded	> £10 million	Implementation	0.5 - 1µg/m3	Reduced HGV through traffic in the town centre – reduced overall traffic flows through the town.	Under construction	
M2	Improve traffic management at key junctions	Traffic Management	Strategic highway improvements, Re-prioritising road space away from cars, including Access management, Selective vehicle priority, bus priority, high vehicle occupancy lane	2016	Ongoing	Lincolnshire County Council Highways	Lincolnshire County Council	NO	Funded	£100k - £500k	Implementation	1 - 2µg/m3	Reduced congestion and increased average speeds through the AQMA.	Lincolnshire County Council consulted on an Active Travel Zone for Grantham in 2021. The Proposal would see the High Street become one-way, with the creation of a 'sustainable travel corridor', while the footpath on St Peter's Hill would be extended into one lane of the road and the junction between Guildhall Street and High Street closed. Ongoing contributions from developments. SCOOT in operation at 4 key junctions in Grantham.	
M3	Improvements in Bus fleet emissions	Promoting Low Emission Transport	Other	2016	-	Lincolnshire County Council Highways & South Kesteven DC	Lincolnshire County Council	NO	Not Funded	£50k - £100k	Aborted	1 - 2µg/m3	Improved bus fleet composition but no direct traffic reduction. Bus use more attractive to potential users – increased bus use.	We currently have no plans to increase the emission standard or to change the age of vehicles operating within the passenger transport contracts. It is worth noting that not all vehicles will be operating as a contract for LCC.	
M4	Encouraging modal shift	Promoting Travel Alternatives	Intensive active travel campaign & infrastructure	2016	Ongoing	Lincolnshire County Council & South Kesteven DC	Lincolnshire County Council	NO	Funded	< £10k	Implementation	0.2 - 0.5µg/m3	Reduced vehicle use and increased use of public transport.	Grantham Transport Strategy was published in 2022 following a public consultation. Full and summary versions can be seen here: <a href="https://urldefense.com/v3/_https://www.lincolnshire.gov.uk/directory-record/61682/grantham-transport-strategy_">https://urldefense.com/v3/_https://www.lincolnshire.gov.uk/directory-record/61682/grantham-transport-strategy_</a> !NsIPjgbbnDqexgINjrFO77ct7RP8ACO3LdcNUOoehQ4c8zpo_TiuvGTqEjEfR6AX-KQOrSckBoz5cYNemmHY2N6LxPUGkDzhtLZNH5Qy3zvwpVwGuKoPAlcOq8-05c\$ Local Cycling and Walking Infrastructure Plan development for Grantham Other smaller plans being considered in other areas of SK District. Draft LCWIP in existence.	
M5	Reduction in Idling Traffic	Public Information	Via leaflets	2016	2020	South Kesteven DC	South Kesteven DC	NO	Funded	< £10k	Completed	0 - 0.2µg/m3	Reduced idling in key areas.	Public information is provided at the Council's web site on reducing idling time in vehicles. <a href="http://www.southkesteven.gov.uk/index.aspx?articleid=8323">http://www.southkesteven.gov.uk/index.aspx?articleid=8323</a>	
M6	Provision of Cycling infrastructure	Promoting Travel Alternatives	School Travel Plans	2016	Ongoing	Lincolnshire County Council Highways	Lincolnshire County Council	NO	Funded	£50k - £100k	Implementation	0 - 0.2µg/m3	Increased number of cycle lanes makes cycling a more attractive alternative method of transport.	There is no update on the Walking and Cycling Strategy. However, with this document in place any future opportunities arising from the developments or highway improvements will be taken.	
M7	Rolling programme of replacing older more polluting	Promoting Low Emission Transport	Company Vehicle Procurement - Prioritising uptake of low	2016	Ongoing	South Kesteven DC	South Kesteven DC	NO	Funded	£10k - 50k	Implementation	0 - 0.2µg/m3	Improve average euro class of the whole council owned fleet.	The Fleet has been improved with vehicles being replaced through a rolling program. Two pool cars used by staff are fully electric. Work to consider options for decarbonisation of the fleet is in progress.	

Measure No.	Measure Title	Category	Classification	Year Measure Introduced in AQAP	Estimated / Actual Completion Date	Organisations Involved	Funding Source	Defra AQ Grant Funding	Funding Status	Estimated Cost of Measure	Measure Status	Reduction in Pollutant / Emission from Measure	Key Performance Indicator	Progress to Date	Comments / Barriers to Implementation
	vehicles with newer cleaner vehicles		emission vehicles												
M8	Promote the use of cleaner or alternative fuels where possible	Promoting Low Emission Transport	Low Emission Zone (LEZ)	2016	2020	South Kesteven DC	South Kesteven DC	NO	Funded	£10k - 50k	Completed	0 - 0.2µg/m3	Introduce new electric and hybrid vehicles to the council fleet.	The Council is promoting the Woodsure Ready to Burn scheme for log burners to improve air quality on their website. <a href="http://www.southkesteven.gov.uk/index.aspx?articleid=8323">http://www.southkesteven.gov.uk/index.aspx?articleid=8323</a>	
M9	Investigate options for better travel planning amongst the council's employees	Public Information	Via other mechanisms	2016	2020	South Kesteven DC	South Kesteven DC	NO	Not Funded	< £10k	Completed	0 - 0.2µg/m3	Reduce number of council staff driving to work.	Public information is provided at the Council's web site on driving less and cycling. <a href="http://www.southkesteven.gov.uk/index.aspx?articleid=8323">http://www.southkesteven.gov.uk/index.aspx?articleid=8323</a> The Council has implemented flexible working arrangements which enable many staff to work from home for a proportion of the working week, reducing travel to and from the offices	
M10	Promotion of walking, cycling and public transport	Public Information	Via the Internet	2016	2017	South Kesteven DC	South Kesteven DC	NO	Not Funded	< £10k	Completed	0 - 0.2µg/m3	Increased public awareness of air quality issues and ultimate shift to less polluting forms of transport. Increased uptake of bicycle use and walking. Removal of existing road traffic from the road network and minimisation of that introduced by new schemes. Provision of cycle route maps.	Implemented. Further updates to the Air Quality page on the SKDC website have been carried out. <a href="http://www.southkesteven.gov.uk/index.aspx?articleid=8323">http://www.southkesteven.gov.uk/index.aspx?articleid=8323</a> . Continued work with Active Lincs and Love to Ride, exploration of Grantham based projects.	

## 2.3 PM<sub>2.5</sub> – Local Authority Approach to Reducing Emissions and/or Concentrations

As detailed in Policy Guidance LAQM.PG22 (Chapter 8) and the Air Quality Strategy<sup>6</sup>, local authorities are expected to work towards reducing emissions and/or concentrations of fine particulate matter (PM<sub>2.5</sub>). There is clear evidence that PM<sub>2.5</sub> (particulate matter smaller 2.5 micrometres) has a significant impact on human health, including premature mortality, allergic reactions, and cardiovascular diseases.

### ***PM<sub>2.5</sub> Monitoring:***

Between 2019-2023 there has been no monitoring of PM<sub>10</sub> or PM<sub>2.5</sub> within South Kesteven District Council. As such, no concentration values can be reported or estimated using the method described in Box 7.7 of LAQM.TG(22), which provides a for estimating PM<sub>2.5</sub> concentrations from PM<sub>10</sub> measurements.

### ***PM<sub>2.5</sub> Background Concentrations:***

The current Defra 2023 background maps for South Kesteven District Council (2018 based)<sup>7</sup> show that all background concentrations of PM<sub>2.5</sub> are significantly below the current annual mean AQS objective of 20 µg/m<sup>3</sup>. The highest background concentration is predicted to be 10.12 µg/m<sup>3</sup> within the grid square (1 km x 1 km) with the centroid grid reference 490500, 337500. This grid square encompasses North Grantham, including Gonerby Road (B1174), which is a key arterial route from the A1 into and through Great Gonerby and Gonerby Hill Foot towards the centre of Grantham, surrounding areas such as Little Ponton and rejoins the A1 southbound, where the PM secondary fraction (formed of gaseous pollutants) constitutes as the key contributor to PM<sub>2.5</sub>.

It is noted that although the maximum predicted PM<sub>2.5</sub> background concentration in 2023 is well below the current annual mean AQS objective of 20 µg/m<sup>3</sup>, it is above the AQS objective of 10 µg/m<sup>3</sup> that is not to be exceeded at any monitoring station by 31<sup>st</sup> December 2040. Therefore, South Kesteven District Council will consider further actions as well as continuing those implemented already to reduce PM<sub>2.5</sub> across the District.

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<sup>6</sup> Defra. Air Quality Strategy – Framework for Local Authority Delivery, August 2023

<sup>7</sup> Defra Background Mapping (2018 Based). Available at: <https://uk-air.defra.gov.uk/data/laqm-background-maps?year=2018>

### ***Smoke Control Areas:***

Smoke control areas (SCAs) are designated zones in which it is an offence to emit smoke from a chimney of a building, from a furnace or from any fixed boiler. It is also an offence to acquire an unauthorised fuel for use within a SCA unless it is used within an exempt appliance (exempted from the controls which generally apply in SCAs).

There are currently 42 SCAs declared within South Kesteven District. These areas are defined regions throughout Grantham and Stamford where smoke emissions from chimney's are legally prohibited. Only authorised fuels and 'exempt appliances' are not subject to these rules.

The Council have outlined if they determine an increase in smoke reports causing a statutory nuisance, they will enforce further SCAs within the District with accompanying fines for those who do not comply to the guidelines.

More information regarding the District's SCAs, including maps of the SCA enforcement areas, are available to review here: <https://www.southkesteven.gov.uk/environmental-health/noise-and-pollution/smoke-and-odour>

### ***Impact on Human Health:***

The Public Health Outcomes Framework data tool<sup>8</sup>, compiled by Public Health England quantifies the mortality burden of PM<sub>2.5</sub> within England on a county and local authority scale. The 2022 fraction of mortality attributable to PM<sub>2.5</sub> emissions within South Kesteven is 5.5%, which is lower than the regional average for the East Midlands (6.1%) and England as a whole (5.8%).

### ***Measures to Improve PM<sub>2.5</sub> Concentrations:***

South Kesteven District Council is taking the following measures to address PM<sub>2.5</sub>:

- Actively encouraging large developers at the planning stage to install EV charging points or the consideration of suitable infrastructure to allow for future cost efficient installations;
- Implementation of the [Grantham Transport Strategy](#) to reduce the number of vehicle trips generated by South Kesteven District and subsequent pollutant emission release, due to its moderate population concentration and related

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<sup>8</sup> Public Health England – Public Health Outcomes Framework. Available at: <https://fingertips.phe.org.uk/profile/public-health-outcomes-framework/data#page/1/gid/1000043/pat/6/ati/501/are/E07000141/id/93861/age/230/sex/4/cat/-1/ctp/-1/yr/1/cid/4/tbm/1/fip/0>

hierarchical position in the East Midlands settlements as well as its associated tourism appeal;

- Implementation of an EV charging programme alongside Lincolnshire County Council, with approximately 1100 publicly accessible EV charging points scheduled for implementation through [Lincolnshire Electric Vehicle Strategy](#) to encourage cleaner vehicle adoption;
- Promotion of railway routes across the area, with a core, busy commuter line between Edinburgh and London, and enhancement of existing networks to encourage more sustainable transportation uptake; and
- Introduction of strategies within the [South Kesteven Climate Action Strategy](#) to assist achievement of net-zero carbon emissions from Council activities by 2030 with many of the measures addressing local air quality including PM<sub>2.5</sub>.

The Council acknowledge that the move to electric vehicles is not the only solution for air quality and associated health concerns due to particulate matter, including PM<sub>2.5</sub>, being sourced from break and tyre wear. As such, the Council have also implemented alternate initiatives with active travel at the forefront:

- Investment into enhancing the existing active travel network for walking and cycling, promoting active travel and supporting the reduction in vehicle volume and associated emission releases;
- Promotion of its established and well-connected railway branch lines between Edinburgh and London via Grantham, a core, busy commuter line that connects South Kesteven with wider English and Scottish destinations. Highlighting the benefits of public transport on air quality comparative to private vehicle use to commute;
- Endorsement of the bicycle mechanic and hire business [Cliff Edge Cycles](#) who host servicing sessions for locals to check that their bikes are safe and make minor adjustments to get them on the road, as well as offering bicycle hire. Thus, incentivising active transportation uptake throughout the District whilst seeking to reduce air pollution contributions from frequent vehicular usage;
- Enhancement of the [Komoot](#) app to encourage cycling in South Kesteven, with users able to review a collection of road biking routes around the area. The app seeks to promote an inclusive community with future collaboration between the Council, neighbouring local authorities, and people by working together to identify opportunities to improve air quality by limiting emission source(s) use whilst

encouraging mortality longevity;

- Collaboration with [Witham Wheelers](#) to promote cycling activities such as: club rides, track racing, and charity events. This relationship promotes the use and benefits of active transport on air quality and health whilst educating the next generation to reduce vehicle uptake thus promoting the area as inclusive and an enabler of active travel for all; and
- Promotion and development of the [National Cycle Network \(NCN\)](#) as well as the Local Cycle Network (LCN), demonstrating South Kesteven District Council's commitment to cycling development in the area. The NCN highlights a key course ([Route 15](#)) available to cycle, walk, and run thus promoting alternative forms of travel and reducing emissions.

The Environmental Protection Team of South Kesteven District Council continues to work collaboratively alongside industrialised organisations in the District with activities permitted by the Council, subject to regular inspections. Inspections are undertaken to establish where combustion and non-combustion processes could lead to anthropogenic emissions of PM<sub>2.5</sub>, thus worsening air quality. The Council seeks to reduce, if not eliminate, additional anthropogenic PM<sub>2.5</sub> emissions by ensuring that they inspect and review industrialised activities and implement appropriate mitigation where necessary.

## 3 Air Quality Monitoring Data and Comparison with Air Quality Objectives and National Compliance

This section sets out the monitoring undertaken within 2023 by South Kesteven District Council and how it compares with the relevant air quality objectives. In addition, monitoring results are presented for a five-year period between 2019 and 2023 to allow monitoring trends to be identified and discussed.

### 3.1 Summary of Monitoring Undertaken

#### 3.1.1 Automatic Monitoring Sites

South Kesteven District Council did not undertake any automatic (continuous) monitoring in 2023.

#### 3.1.2 Non-Automatic Monitoring Sites

South Kesteven District Council undertook non-automatic (i.e. passive) monitoring of NO<sub>2</sub> at 58 sites during 2023, including single, duplicate and triplicate locations. Of the 58 Site ID's, 16 were single tube locations, 15 were noted duplicate monitoring locations, and four were triplicate monitoring sites. Thus, 35 sites are monitored across South Kesteven.

Table A.1 in Appendix A presents the details of the non-automatic sites. Maps showing the location of the monitoring sites are provided in Appendix D. Further details on Quality Assurance/Quality Control (QA/QC) for the diffusion tubes, including bias adjustments and any other adjustments applied (e.g. annualisation and/or distance correction), are included in Appendix C.

During 2023, the diffusion tube network was well maintained, with an average data capture of approximately 91.86%, as such no tubes required annualisation in 2023. It is noted that no tube reports data for October 2023 due to the tubes being lost in transit to the laboratory for analysis.

### 3.2 Individual Pollutants

The air quality monitoring results presented in this section are, where relevant, adjusted for bias, annualisation (where the annual mean data capture is below 75% and greater

than 25%), and distance correction. Further details on adjustments are provided in Appendix C.

### 3.2.1 Nitrogen Dioxide (NO<sub>2</sub>)

Table A.2 and Figure A.1 - Figure A.4 compare the ratified and adjusted monitored NO<sub>2</sub> annual mean concentrations for the past five years with the air quality objective of 40µg/m<sup>3</sup>. Note that the concentration data presented represents the concentration at the location of the monitoring site, following the application of bias adjustment and annualisation, as required (i.e. the values are exclusive of any consideration to fall-off with distance adjustment).

Figure A.1 - Figure A.4 highlight a decreasing trend in NO<sub>2</sub> concentrations reported across South Kesteven between 2019-2023, albeit in 2021 and 2022 there are slight increases shown. These could be attributable to a return to normalised traffic conditions post COVID-19 lockdown where UK Government advice was given to stay at home where possible, resulting in decreased levels of traffic observed across the UK, and as such, reduced annual mean NO<sub>2</sub> concentrations recorded.

Of the 35 sites that made up the diffusion tube monitoring network in 2023, the NO<sub>2</sub> annual mean concentration decreased at 24 locations compared to 2022 monitoring, equating to a reduction in pollutant concentration at 68.57% of sites from 2022. The maximum decrease in NO<sub>2</sub> concentration between the two reporting years was 10.8 µg/m<sup>3</sup> at SK 49, followed by 10.7 µg/m<sup>3</sup> at SK 40 and 10.2 µg/m<sup>3</sup> at SK 58. These tubes are located on Launder Terrace, east of Grantham Train Station, St Peter's Hill/ Avenue Road in Grantham Centre, and Wharf Road (A1175) in Stamford respectively, SK 49 and SK 58 are beyond the extent of the current AQMA boundary. SK 40 is located approximately 30 m beyond the AQMA boundary but is considered representative of concentrations within the AQMA by the Council. Figure D. 4 presents the location of SK 40 in relation to the AQMA boundary. The Council utilise the SK 40 to understand concentrations within the AQMA, as historically concentrations reported at SK 40 have been similar to those reported by sites within the AQMA. The greater percentage decrease in concentrations at sites across South Kesteven between 2022 and 2023 is in contrast to the previous reporting year, where concentrations decreased between 2021 and 2022 at 57.14% of sites. It is noted that SK 9 reported no concentration change between 2022 and 2023, and SK1/SK2 reported no change between 2021 and 2022.

The diffusion tubes around the edge of the current AQMA boundary showed an increase

of 0.1  $\mu\text{g}/\text{m}^3$  at SK 26 and decrease of 10.8  $\mu\text{g}/\text{m}^3$  at SK 49 respectively. SK 26 highlights a lower increase than the average increase observed across the entire diffusion tube network (2.2  $\mu\text{g}/\text{m}^3$ ), and SK 49 outlines a greater decrease than the average decreased seen across the complete diffusion tube network (3.1  $\mu\text{g}/\text{m}^3$ ). Recent monitoring evidence suggests that there is no need to extend the current boundary for which the AQMA is designated, but there is a requirement to maintain the AQMA, particularly for the annual mean  $\text{NO}_2$  objective. However, AQMA revocation is proposed for the 1-Hour  $\text{NO}_2$  objective.

Across the 14 diffusion tube sites that are located within the AQMA (SK 19-22, 27-42, 50-57), all sites recorded an  $\text{NO}_2$  annual mean concentration below the air quality objective of 40  $\mu\text{g}/\text{m}^3$ , with the maximum concentration recorded within the AQMA at SK33/SK34 being 36.1  $\mu\text{g}/\text{m}^3$ . Beyond the AQMA, the maximum reported  $\text{NO}_2$  annual mean concentration was 29.3  $\mu\text{g}/\text{m}^3$  at location SK45/SK46. SK33/SK34 was the only diffusion tube monitoring site in 2023 that recorded an  $\text{NO}_2$  annual mean concentration within 10% of the objective.

In 2019, SK33/SK34 exceeded the  $\text{NO}_2$  annual mean objective of 40  $\mu\text{g}/\text{m}^3$  by 0.7  $\mu\text{g}/\text{m}^3$ , as such this year cannot be considered one of compliance. It is known that 2020 and 2021 are considered COVID-19 years and cannot be accounted for when discussing  $\text{NO}_2$  annual mean compliance if an exceedance of the objective occurred in 2019. Given compliance was not achieved in 2019, and concentrations have been within 10% of the annual mean  $\text{NO}_2$  objective between 2021-2023, the monitoring data is currently insufficient to support the Council's revocation of AQMA No.6. It is noted that there are two consecutive years of compliance to date, 2022 and 2023, when considering the  $\text{NO}_2$  annual mean objective of 40  $\mu\text{g}/\text{m}^3$ , excluding concentrations reported within 10% of the objective.

It is acknowledged that the Council have prepared an updated AQMA No.6 AQAP document for issue on 8<sup>th</sup> October 2024 pending Councillor and Cabinet approval. The AQAP will cover AQMA No.6 for exceedances of the annual mean  $\text{NO}_2$  objective, with the Council seeking to revoke the AQMA for exceedances of the 1-Hour  $\text{NO}_2$  objective.

For diffusion tubes, the full 2023 dataset of monthly values is provided in Appendix B, Table B. 1. It is noted that the monitoring dates coincide with the Defra calendar dates. As such, there is a degree of certainty surrounding the monitoring results provided.

It is possible to infer the risk of exceedances of the 1-hour mean  $\text{NO}_2$  AQS objective at diffusion tube monitoring sites. LAQM.TG(22) provides an empirical relationship that states exceedances of the 1-hour objective are unlikely when the annual mean concentration is

below 60  $\mu\text{g}/\text{m}^3$ . Given that the highest recorded annual mean concentration at any of the diffusion tube monitoring sites is 40.7  $\mu\text{g}/\text{m}^3$  in 2019 (SK33/SK34), and the penultimate highest 37.8  $\mu\text{g}/\text{m}^3$  in 2022, it is possible to conclude that there have been no exceedances of the hourly mean  $\text{NO}_2$  objective at all monitoring locations in the last five years.

### **3.2.2 Particulate Matter (PM<sub>10</sub>)**

Particulate Matter (PM<sub>10</sub>) is not monitored in South Kesteven.

### **3.2.3 Particulate Matter (PM<sub>2.5</sub>)**

Particulate Matter (PM<sub>2.5</sub>) is not monitored in South Kesteven.

### **3.2.4 Sulphur Dioxide (SO<sub>2</sub>)**

Sulphur Dioxide (SO<sub>2</sub>) is not monitored in South Kesteven.

## Appendix A: Monitoring Results

Table A.1 – Details of Non-Automatic Monitoring Sites

Diffusion Tube ID	Site Name	Site Type	Town Location	X OS Grid Ref (Easting)	Y OS Grid Ref (Northing)	Pollutants Monitored	In AQMA? Which AQMA?	Distance to Relevant Exposure (m) <sup>(1)</sup>	Distance to kerb of nearest road (m) <sup>(2)</sup>	Tube Co-located with a Continuous Analyser?	Tube Height (m)
SK 1	Scotgate	Roadside	Stamford	502659	307218	NO <sub>2</sub>	No	3.2	1.6	No	2.5
SK 2	Scotgate	Roadside	Stamford	502659	307218	NO <sub>2</sub>	No	3.2	1.6	No	2.5
SK 3	Essex Rd	Roadside	Stamford	502717	307750	NO <sub>2</sub>	No	14.3	23.4	No	2.5
SK 4	Opp Stamford School	Roadside	Stamford	503291	307420	NO <sub>2</sub>	No	0.0	5.7	No	2.5
SK 5	East St/St Pauls St	Roadside	Stamford	503391	307396	NO <sub>2</sub>	No	0.0	3.2	No	2.5
SK 6	East St/St Pauls St	Roadside	Stamford	503391	307396	NO <sub>2</sub>	No	0.0	3.2	No	2.5
SK 7	Stamford School	Roadside	Stamford	503281	307398	NO <sub>2</sub>	No	0.0	2.5	No	2.5
SK 8	London Inn	Roadside	Stamford	502910	307120	NO <sub>2</sub>	No	0.0	2.3	No	2.5
SK 9	All Saints Rd	Roadside	Stamford	502873	307141	NO <sub>2</sub>	No	19.0	2.5	No	2.5
SK 10	Avondale Roundabout	Roadside	Stamford	502382	306890	NO <sub>2</sub>	No	4.7	1.3	No	2.5
SK 11	Welwyn Cl	Roadside	Grantham	490118	334165	NO <sub>2</sub>	No	5.0	2.0	No	2.5
SK 12	Welwyn Cl	Roadside	Grantham	490118	334165	NO <sub>2</sub>	No	5.0	2.0	No	2.5
SK 13	Welwyn Cl	Roadside	Grantham	490118	334165	NO <sub>2</sub>	No	5.0	2.0	No	2.5
SK 14	Springfield Rd	Roadside	Grantham	490877	334642	NO <sub>2</sub>	No	24.5	2.1	No	2.5
SK 15	Springfield Rd	Roadside	Grantham	490877	334642	NO <sub>2</sub>	No	24.5	2.1	No	2.5
SK 16	Meres Rd	Roadside	Grantham	489263	335353	NO <sub>2</sub>	No	26.0	12.1	No	2.5
SK 17	Meres Rd	Roadside	Grantham	489263	335353	NO <sub>2</sub>	No	26.0	12.1	No	2.5
SK 18	Balmoral Dr	Urban Background	Grantham	489956	336574	NO <sub>2</sub>	No	32.1	0.8	No	2.5
SK 19	Opp Asda	Roadside	Grantham	491067	336209	NO <sub>2</sub>	Yes - No.6	2.6	5.4	No	2.5
SK 20	Opp Asda	Roadside	Grantham	491067	336209	NO <sub>2</sub>	Yes -	2.6	5.4	No	2.5

Diffusion Tube ID	Site Name	Site Type	Town Location	X OS Grid Ref (Easting)	Y OS Grid Ref (Northing)	Pollutants Monitored	In AQMA? Which AQMA?	Distance to Relevant Exposure (m) <sup>(1)</sup>	Distance to kerb of nearest road (m) <sup>(2)</sup>	Tube Co-located with a Continuous Analyser?	Tube Height (m)
							No.6				
SK 21	Broad St Scout Hut	Roadside	Grantham	491270	336256	NO <sub>2</sub>	Yes - No.6	0.0	7.6	No	2.5
SK 22	Brook St	Roadside	Grantham	491260	336188	NO <sub>2</sub>	Yes - No.6	0.5	6.0	No	2.5
SK 23	Gt Gonerby Pond St	Roadside	Grantham	489720	338204	NO <sub>2</sub>	No	16.0	9.5	No	2.5
SK 24	Gt Gonerby Park	Roadside	Grantham	489870	338683	NO <sub>2</sub>	No	10.8	5.0	No	2.5
SK 25	Manthorpe	Roadside	Grantham	492069	337874	NO <sub>2</sub>	No	49.6	7.6	No	2.5
SK 26	Belton Ln	Roadside	Grantham	491280	336573	NO <sub>2</sub>	No	9.9	7.0	No	2.5
SK 27	Jet Garage	Roadside	Grantham	491496	336354	NO <sub>2</sub>	Yes - No.6	0.0	2.3	No	2.5
SK 28	Jet Garage	Roadside	Grantham	491496	336354	NO <sub>2</sub>	Yes - No.6	0.0	2.3	No	2.5
SK 29	Jet Garage	Roadside	Grantham	491496	336354	NO <sub>2</sub>	Yes - No.6	0.0	2.3	No	2.5
SK 30	King School 5 Bells	Roadside	Grantham	491472	336315	NO <sub>2</sub>	Yes - No.6	2.2	2.7	No	2.5
SK 31	King School 5 Bells	Roadside	Grantham	491472	336315	NO <sub>2</sub>	Yes - No.6	2.2	2.7	No	2.5
SK 32	King School 5 Bells	Roadside	Grantham	491472	336315	NO <sub>2</sub>	Yes - No.6	2.2	2.7	No	2.5
SK 33	Opp Jet Garage	Roadside	Grantham	491515	336389	NO <sub>2</sub>	Yes - No.6	0.0	1.7	No	2.5
SK 34	Opp Jet Garage	Roadside	Grantham	491515	336389	NO <sub>2</sub>	Yes - No.6	0.0	1.7	No	2.5
SK 35	Black Dog	Roadside	Grantham	491330	336022	NO <sub>2</sub>	Yes - No.6	5.0	1.0	No	2.5
SK 36	Black Dog	Roadside	Grantham	491330	336022	NO <sub>2</sub>	Yes - No.6	5.0	1.0	No	2.5

Diffusion Tube ID	Site Name	Site Type	Town Location	X OS Grid Ref (Easting)	Y OS Grid Ref (Northing)	Pollutants Monitored	In AQMA? Which AQMA?	Distance to Relevant Exposure (m) <sup>(1)</sup>	Distance to kerb of nearest road (m) <sup>(2)</sup>	Tube Co-located with a Continuous Analyser?	Tube Height (m)
SK 37	High St	Roadside	Grantham	491460	335715	NO <sub>2</sub>	Yes - No.6	1.2	0.8	No	2.5
SK 38	High St	Roadside	Grantham	491460	335715	NO <sub>2</sub>	Yes - No.6	1.2	0.8	No	2.5
SK 39	High St	Roadside	Grantham	491460	335715	NO <sub>2</sub>	Yes - No.6	1.2	0.8	No	2.5
SK 40	Old Job Centre	Roadside	Grantham	491512	335719	NO <sub>2</sub>	Yes - No.6	51.2	1.7	No	2.5
SK 41	London Rd	Roadside	Grantham	491602	335485	NO <sub>2</sub>	Yes - No.6	2.4	3.9	No	2.5
SK 42	London Rd	Roadside	Grantham	491602	335485	NO <sub>2</sub>	Yes - No.6	2.4	3.9	No	2.5
SK 43	Welcome Takeaway	Roadside	Grantham	491734	335196	NO <sub>2</sub>	No	2.0	0.5	No	2.5
SK 44	Welcome Takeaway	Roadside	Grantham	491734	335196	NO <sub>2</sub>	No	2.0	0.5	No	2.5
SK 45	South Parade	Roadside	Grantham	491869	334960	NO <sub>2</sub>	No	0.0	3.5	No	2.5
SK 46	South Parade	Roadside	Grantham	491869	334960	NO <sub>2</sub>	No	0.0	3.5	No	2.5
SK 47	White Lion	Roadside	Grantham	492067	334922	NO <sub>2</sub>	No	5.0	1.0	No	2.5
SK 48	White Lion	Roadside	Grantham	492067	334922	NO <sub>2</sub>	No	5.0	1.0	No	2.5
SK 49	Launder Terrace	Roadside	Grantham	491427	335193	NO <sub>2</sub>	No	4.0	1.4	No	2.5
SK 50	Gt Northern Ct	Roadside	Grantham	491184	335575	NO <sub>2</sub>	Yes - No.6	0.0	3.6	No	2.5
SK 51	Gt Northern Ct	Roadside	Grantham	491184	335575	NO <sub>2</sub>	Yes - No.6	0.0	3.6	No	2.5
SK 52	Blue Bull	Roadside	Grantham	491200	335636	NO <sub>2</sub>	Yes - No.6	2.0	0.5	No	2.5
SK 53	Blue Bull	Roadside	Grantham	491200	335636	NO <sub>2</sub>	Yes - No.6	2.0	0.5	No	2.5
SK 54	Bus Stn/Post Office	Roadside	Grantham	491492	335505	NO <sub>2</sub>	Yes - No.6	1.5	1.4	No	2.5
SK 55	Bus Stn/Post Office	Roadside	Grantham	491492	335505	NO <sub>2</sub>	Yes - No.6	1.5	1.4	No	2.5
SK 56	Wharf Rd Morrisons	Roadside	Grantham	491402	335501	NO <sub>2</sub>	Yes - No.6	0.8	0.9	No	2.5
SK 57	Wharf Rd Morrisons	Roadside	Grantham	491402	335501	NO <sub>2</sub>	Yes -	0.8	0.9	No	2.5

Diffusion Tube ID	Site Name	Site Type	Town Location	X OS Grid Ref (Easting)	Y OS Grid Ref (Northing)	Pollutants Monitored	In AQMA? Which AQMA?	Distance to Relevant Exposure (m) <sup>(1)</sup>	Distance to kerb of nearest road (m) <sup>(2)</sup>	Tube Co-located with a Continuous Analyser?	Tube Height (m)
							No.6				
SK 58	Wharf Rd Stamford	Roadside	Stamford	503070	306957	NO <sub>2</sub>	No	3.4	1.5	No	2.5

**Notes:**

(1) 0m if the monitoring site is at a location of exposure (e.g. installed on the façade of a residential property).

(2) N/A if not applicable.

Table A.2 – Annual Mean NO<sub>2</sub> Monitoring Results: Non-Automatic Monitoring (µg/m<sup>3</sup>)

Diffusion Tube ID	X OS Grid Ref (Easting)	Y OS Grid Ref (Northing)	Site Type	Town Location	Valid Data Capture for Monitoring Period (%) <sup>(1)</sup>	Valid Data Capture 2023 (%) <sup>(2)</sup>	2019	2020	2021	2022	2023
SK 1, SK 2	502659	307218	Roadside	Stamford	92.3	92.3	28.4	21.4	24.3	24.3	23.4
SK 3	502717	307750	Roadside	Stamford	92.3	92.3	13.1	9.5	11.0	8.7	9.6
SK 4	503291	307420	Roadside	Stamford	84.6	84.6	30.3	21.3	24.9	26.2	26.6
SK 5, SK 6	503391	307396	Roadside	Stamford	92.3	92.3	30.1	23.5	27.0	24.6	24.5
SK 7	503281	307398	Roadside	Stamford	84.6	84.6	32.8	25.5	28.0	28.3	24.1
SK 8	502910	307120	Roadside	Stamford	92.3	92.3	22.5	15.8	18.4	17.3	17.1
SK 9	502873	307141	Roadside	Stamford	92.3	92.3	23.9	17.9	19.2	17.5	17.5
SK 10	502382	306890	Roadside	Stamford	92.3	92.3	18.3	14.7	15.1	14.5	13.4
SK 11, SK 12, SK 13	490118	334165	Roadside	Grantham	92.3	92.3	19.6	13.4	15.1	14.9	12.3
SK 14, SK 15	490877	334642	Roadside	Grantham	92.3	92.3	23.9	20.9	21.2	22.4	22.8
SK 16, SK 17	489263	335353	Roadside	Grantham	92.3	92.3	27.3	19.7	20.4	20.8	22.0
SK 18	489956	336574	Urban Background	Grantham	92.3	92.3	15.3	12.2	13.1	11.5	12.8
SK 19, SK 20	491067	336209	Roadside	Grantham	92.3	92.3	27.9	18.2	25.8	25.5	23.4
SK 21	491270	336256	Roadside	Grantham	92.3	92.3	25.0	18.8	22.4	20.6	19.3
SK 22	491260	336188	Roadside	Grantham	92.3	92.3	27.1	20.3	23.2	24.5	20.6
SK 23	489720	338204	Roadside	Grantham	92.3	92.3	18.7	14.3	16.2	15.1	13.1
SK 24	489870	338683	Roadside	Grantham	92.3	92.3	19.4	15.2	15.5	15.1	13.3

Diffusion Tube ID	X OS Grid Ref (Easting)	Y OS Grid Ref (Northing)	Site Type	Town Location	Valid Data Capture for Monitoring Period (%) <sup>(1)</sup>	Valid Data Capture 2023 (%) <sup>(2)</sup>	2019	2020	2021	2022	2023
SK 25	492069	337874	Roadside	Grantham	92.3	92.3	17.8	13.2	15.3	14.7	13.7
SK 26	491280	336573	Roadside	Grantham	92.3	92.3	22.2	15.7	21.1	19.1	19.2
SK 27, SK 28, SK 29	491496	336354	Roadside	Grantham	92.3	92.3	39.1	27.3	35.1	34.3	32.1
SK 30, SK 31, SK 32	491472	336315	Roadside	Grantham	92.3	92.3	28.5	22.0	24.6	24.5	24.6
SK 33, SK 34	491515	336389	Roadside	Grantham	92.3	92.3	40.7	31.3	36.6	37.8	36.1
SK 35, SK 36	491330	336022	Roadside	Grantham	92.3	92.3	31.8	25.3	26.8	27.4	26.3
SK 37, SK 38, SK 39	491460	335715	Roadside	Grantham	92.3	92.3	34.0	30.6	22.1	27.5	25.8
SK 40	491512	335719	Roadside	Grantham	92.3	92.3	30.6	22.1	27.5	27.7	17.0
SK 41, SK 42	491602	335485	Roadside	Grantham	92.3	92.3	21.9	18.7	19.8	18.7	24.8
SK 43, SK 44	491734	335196	Roadside	Grantham	92.3	92.3	30.8	22.5	27.7	25.2	23.9
SK 45, SK 46	491869	334960	Roadside	Grantham	92.3	92.3	27.9	21.2	26.0	26.3	29.3
SK 47, SK 48	492067	334922	Roadside	Grantham	92.3	92.3	34.5	26.4	29.7	31.2	23.6
SK 49	491427	335193	Roadside	Grantham	92.3	84.6	30.2	25.2	24.9	25.5	14.7
SK 50, SK 51	491184	335575	Roadside	Grantham	92.3	92.3	19.7	14.7	15.3	15.1	23.9
SK 52, SK 53	491200	335636	Roadside	Grantham	92.3	92.3	32.1	24.2	27.0	27.4	25.7
SK 54, SK 55	491492	335505	Roadside	Grantham	92.3	92.3	31.9	31.9	28.9	29.1	31.8
SK 56, SK 57	491402	335501	Roadside	Grantham	92.3	92.3	39.6	29.1	35.2	34.4	27.0

Diffusion Tube ID	X OS Grid Ref (Easting)	Y OS Grid Ref (Northing)	Site Type	Town Location	Valid Data Capture for Monitoring Period (%) <sup>(1)</sup>	Valid Data Capture 2023 (%) <sup>(2)</sup>	2019	2020	2021	2022	2023
SK 58	503070	306957	Roadside	Stamford	92.3	92.3	33.1	26.1	29.8	29.4	19.2

Annualisation has been conducted where data capture is <75% and >25% in line with LAQM.TG22.

Diffusion tube data has been bias adjusted.

Reported concentrations are those at the location of the monitoring site (bias adjusted and annualised, as required), i.e. prior to any fall-off with distance correction.

**Notes:**

The annual mean concentrations are presented as  $\mu\text{g}/\text{m}^3$ .

Exceedances of the  $\text{NO}_2$  annual mean objective of  $40\mu\text{g}/\text{m}^3$  are shown in **bold**.

$\text{NO}_2$  annual means exceeding  $60\mu\text{g}/\text{m}^3$ , indicating a potential exceedance of the  $\text{NO}_2$  1-hour mean objective are shown in **bold and underlined**.

174 Means for diffusion tubes have been corrected for bias. All means have been “annualised” as per LAQM.TG22 if valid data capture for the full calendar year is less than 75%. See Appendix C for details.

Concentrations are those at the location of monitoring and not those following any fall-off with distance adjustment.

(1) Data capture for the monitoring period, in cases where monitoring was only carried out for part of the year.

(2) Data capture for the full calendar year (e.g. if monitoring was carried out for 6 months, the maximum data capture for the full calendar year is 50%).

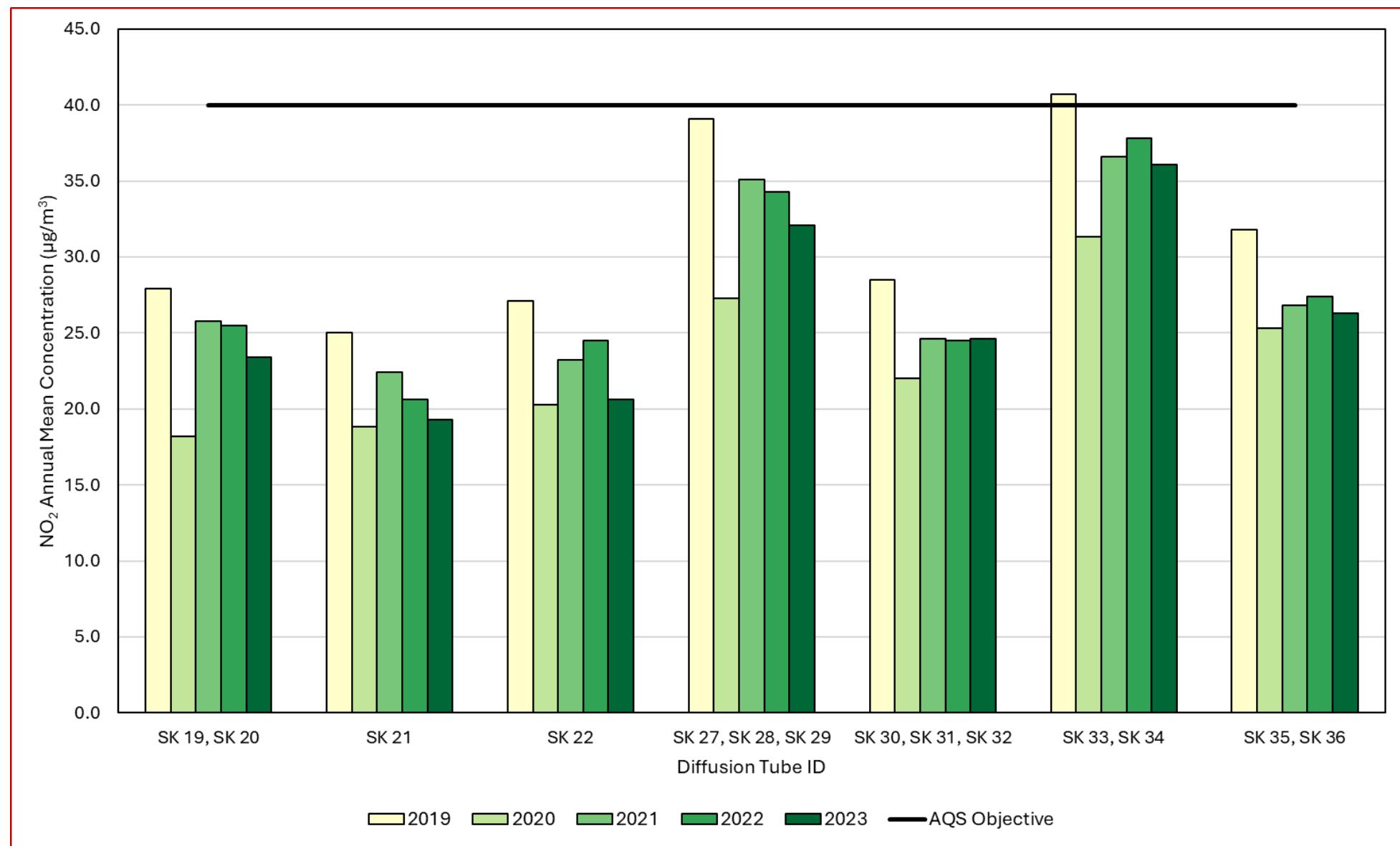
**Figure A.1 – Trends in Annual Mean NO<sub>2</sub> – Diffusion Tubes (Within AQMA No.6)**

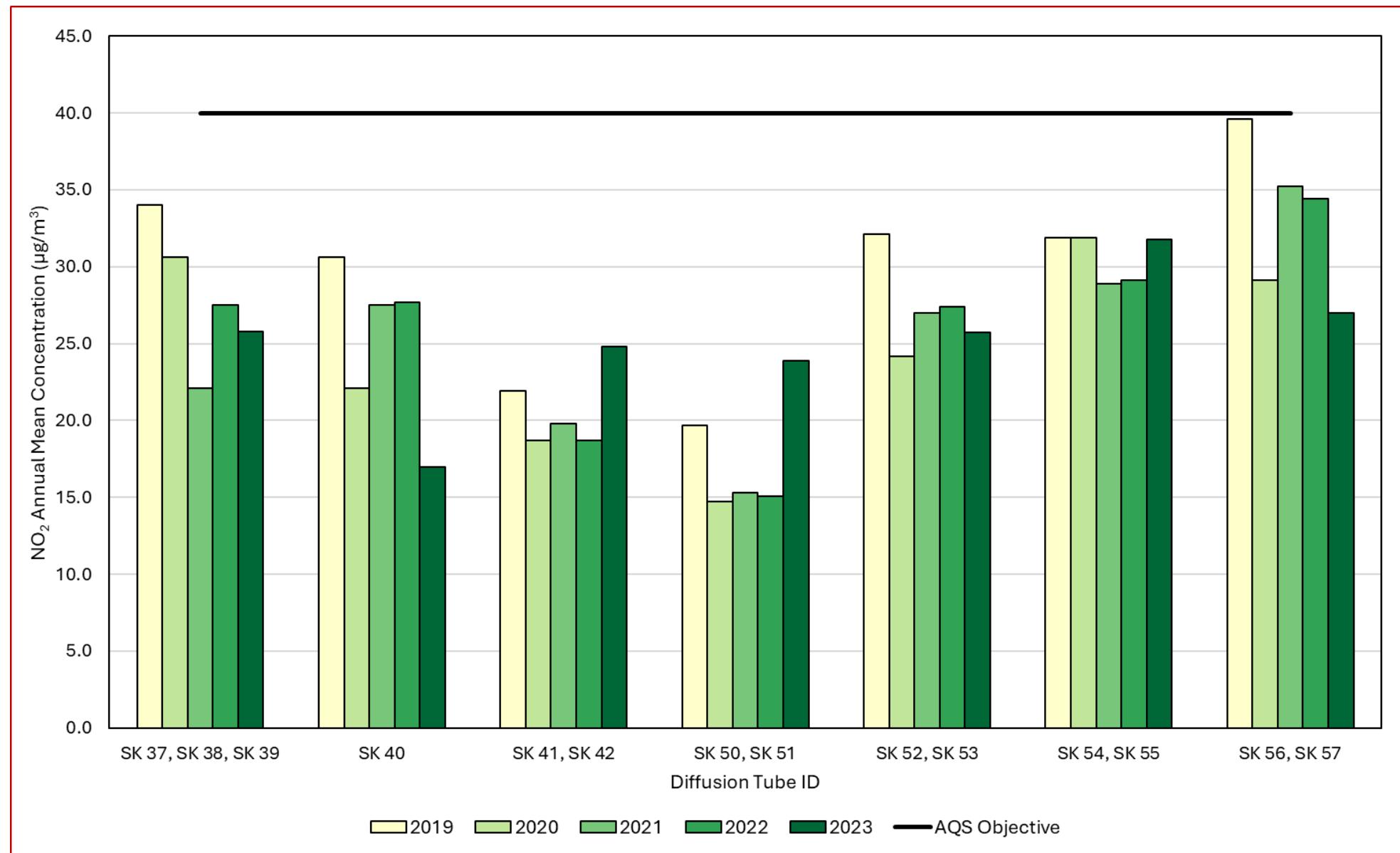
Figure A.2 – Trends in Annual Mean NO<sub>2</sub> – Diffusion Tubes (Within AQMA No.6 - Continued)

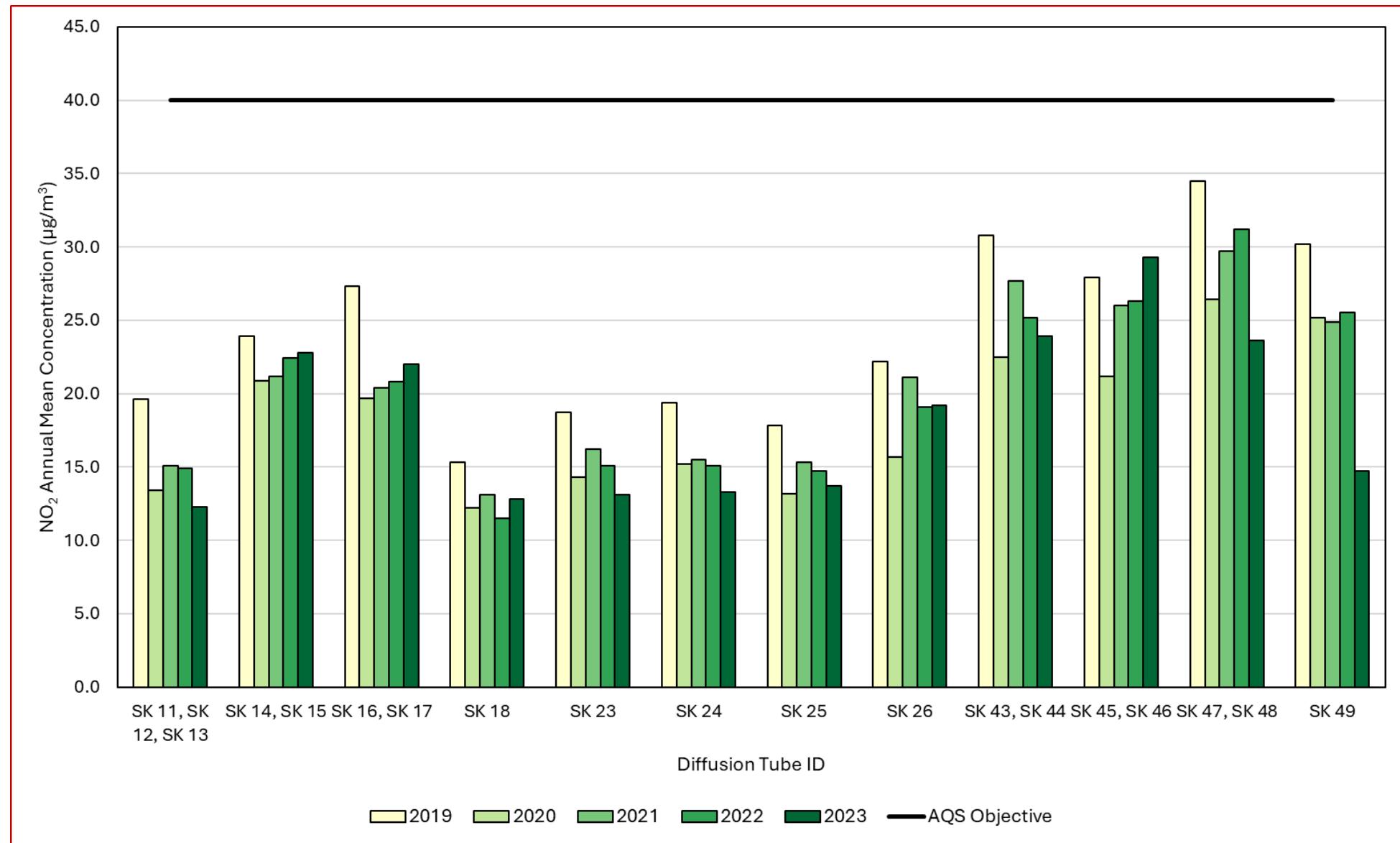
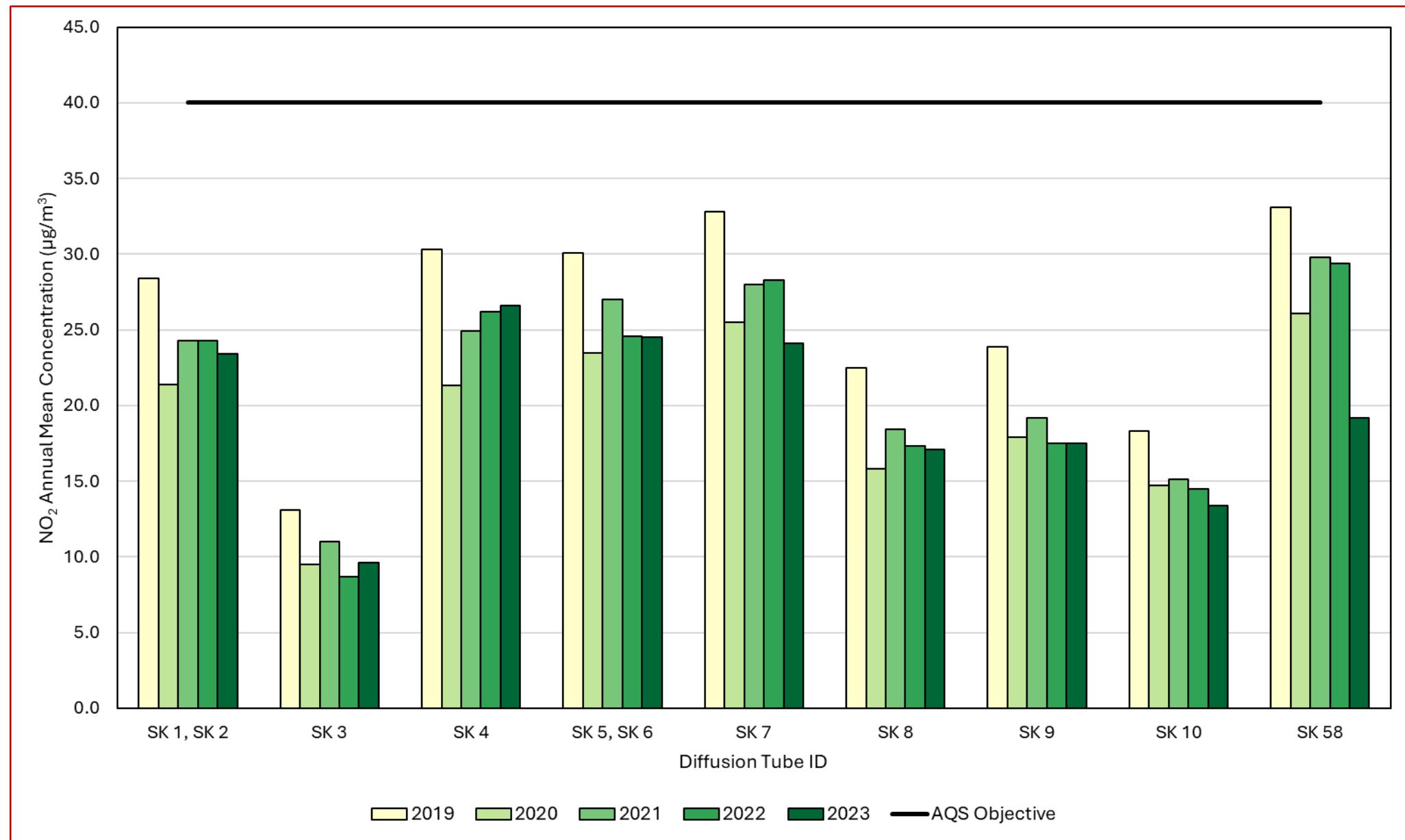
Figure A.3 – Trends in Annual Mean NO<sub>2</sub> – Diffusion Tubes (Sites in Grantham (Outside AQMA))

Figure A.4 – Trends in Annual Mean NO<sub>2</sub> – Diffusion Tubes (Sites in Stamford)

## Appendix B: Full Monthly Diffusion Tube Results for 2023

Table B. 1 – NO<sub>2</sub> 2023 Diffusion Tube Results (µg/m<sup>3</sup>)

DT ID	X OS Grid Ref (Easting)	Y OS Grid Ref (Northing)	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Annual Mean: Raw Data	Annual Mean: Annualised and Bias Adjusted (0.83)	Annual Mean: Distance Corrected to Nearest Exposure	Comment
SK 1	502659	307218	35.0	29.6	34.3	29.9	31.4	26.0	21.2	23.6	27.9	-	38.4	25.2	-	-	-	Duplicate Site with SK 1 and SK 2 - Annual data provided for SK 2 only
SK 2	502659	307218	30.1	30.9	28.5	29.8	31.3	21.8	20.7	22.5	31.1	-	27.6	22.6	28.2	23.4	-	Duplicate Site with SK 1 and SK 2 - Annual data provided for SK 2 only
SK 3	502717	307750	16.4	15.2	10.7	9.1	8.9	6.7	7.9	7.8	10.5	-	18.0	15.5	11.5	9.6	-	
SK 4	503291	307420	<b>42.0</b>	38.9	32.3	31.7	-	23.8	21.8	24.2	34.0	-	42.1	29.8	32.1	26.6	-	
SK 5	503391	307396	29.4	33.6	33.5	31.3	<b>40.3</b>	24.9	22.4	24.9	32.8	-	33.2	22.8	-	-	-	Duplicate Site with SK 5 and SK 6 - Annual data provided for SK 6 only
SK 6	503391	307396	26.6	28.4	29.7	31.1	<b>48.1</b>	23.7	20.1	23.9	30.4	-	33.8	23.5	29.5	24.5	-	Duplicate Site with SK 5 and SK 6 - Annual data provided for SK 6 only
SK 7	503281	307398	31.3	25.1	31.2	-	27.9	27.4	24.2	26.4	39.0	-	34.5	23.5	29.1	24.1	-	
SK 8	502910	307120	21.0	23.7	25.7	21.2	28.0	17.8	14.8	15.3	20.2	-	19.8	18.7	20.6	17.1	-	
SK 9	502873	307141	24.4	27.3	23.1	18.7	24.0	13.7	15.3	17.3	22.7	-	26.2	19.2	21.1	17.5	-	
SK 10	502382	306890	20.2	21.3	15.4	13.5	17.0	12.9	12.0	10.4	17.7	-	24.4	13.4	16.2	13.4	-	
SK 11	490118	334165	14.2	16.9	15.7	14.7	12.7	9.9	10.9	13.5	18.0	-	19.2	11.9	-	-	-	Triplicate Site with SK 11, SK 12 and SK 13 - Annual data provided for SK 13 only
SK 12	490118	334165	19.0	14.9	16.5	15.3	12.7	10.4	12.3	14.7	17.2	-	21.3	13.8	-	-	-	Triplicate Site with SK 11, SK 12 and SK 13 - Annual data provided for SK 13 only
SK 13	490118	334165	19.5	6.3	15.2	15.4	14.0	9.4	13.3	13.6	18.5	-	20.0	18.1	14.8	12.3	-	Triplicate Site with SK 11, SK 12 and SK 13 - Annual data provided for SK 13 only
SK 14	490877	334642	36.5	24.8	27.5	22.2	25.2	18.4	22.2	23.1	28.4	-	<b>41.6</b>	23.7	-	-	-	Duplicate Site with SK 14 and SK 15 - Annual data provided for SK 15 only
SK 15	490877	334642	32.5	35.6	28.7	22.6	23.2	19.9	19.6	23.5	30.4	-	<b>47.9</b>	26.0	27.4	22.8	-	Duplicate Site with SK 14 and SK 15 - Annual data provided for SK 15 only
SK 16	489263	335353	23.3	22.3	23.5	16.1	18.1	16.8	24.0	27.1	28.3	-	<b>50.6</b>	29.7	-	-	-	Duplicate Site with SK 16 and SK 17 - Annual data provided for SK 17 only
SK 17	489263	335353	26.5	34.4	20.5	17.7	19.2	15.8	26.7	26.1	28.3	-	<b>54.4</b>	32.7	26.5	22.0	-	Duplicate Site with SK 16 and SK 17 - Annual data provided for SK 17 only
SK 18	489956	336574	15.9	20.9	20.4	12.0	13.7	8.7	10.6	11.2	18.1	-	25.3	12.7	15.4	12.8	-	
SK 19	491067	336209	31.2	30.6	13.7	28.9	25.3	20.3	23.9	24.7	33.7	-	<b>43.5</b>	23.7	-	-	-	Duplicate Site with SK 19 and SK 20 - Annual data provided for SK 20 only

DT ID	X OS Grid Ref (Easting)	Y OS Grid Ref (Northing)	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Annual Mean: Raw Data	Annual Mean: Annualised and Bias Adjusted (0.83)	Annual Mean: Distance Corrected to Nearest Exposure	Comment
SK 20	491067	336209	31.0	32.6	30.3	29.1	25.1	22.7	23.4	25.8	33.3	-	<b>41.6</b>	26.6	28.2	23.4	-	Duplicate Site with SK 19 and SK 20 - Annual data provided for SK 20 only
SK 21	491270	336256	25.2	32.6	21.9	21.1	18.1	14.3	21.1	17.0	27.6	-	27.3	30.1	23.3	19.3	-	
SK 22	491260	336188	36.1	34.2	25.4	24.2	24.5	17.4	19.8	22.7	13.9	-	30.2	24.4	24.8	20.6	-	
SK 23	489720	338204	22.0	15.3	16.7	15.0	13.9	11.8	11.4	13.5	17.5	-	24.0	12.4	15.8	13.1	-	
SK 24	489870	338683	23.9	14.8	19.3	14.9	13.7	8.3	13.2	13.7	19.1	-	19.6	15.2	16.0	13.3	-	
SK 25	492069	337874	21.4	23.5	19.2	12.6	18.8	11.2	11.9	13.0	18.1	-	18.0	13.8	16.5	13.7	-	
SK 26	491280	336573	28.5	27.0	24.5	20.5	20.6	16.7	17.8	16.8	26.4	-	31.8	23.7	23.1	19.2	-	
SK 27	491496	336354	<b>45.2</b>	35.5	<b>44.9</b>	39.5	<b>42.3</b>	32.9	30.3	30.6	<b>52.0</b>	-	<b>46.4</b>	34.2	-	-	-	Triplicate Site with SK 27, SK 28 and SK 29 - Annual data provided for SK 29 only
SK 28	491496	336354	<b>46.8</b>	<b>48.4</b>	<b>43.5</b>	<b>42.0</b>	<b>41.2</b>	29.3	28.9	30.7	<b>42.9</b>	-	<b>51.4</b>	30.8	-	-	-	Triplicate Site with SK 27, SK 28 and SK 29 - Annual data provided for SK 29 only
SK 29	491496	336354	32.3	36.9	<b>42.7</b>	<b>40.5</b>	38.1	35.5	31.6	35.5	<b>44.3</b>	-	<b>48.3</b>	22.5	38.7	32.1	-	Triplicate Site with SK 27, SK 28 and SK 29 - Annual data provided for SK 29 only
SK 30	491472	336315	37.7	<b>40.7</b>	28.4	26.5	31.3	21.8	24.3	22.4	28.5	-	<b>48.4</b>	24.7	-	-	-	Triplicate Site with SK 30, SK 31 and SK 32 - Annual data provided for SK 32 only
SK 31	491472	336315	36.8	28.5	25.5	25.7	29.7	24.3	24.9	24.4	30.0	-	<b>46.1</b>	24.3	-	-	-	Triplicate Site with SK 30, SK 31 and SK 32 - Annual data provided for SK 32 only
SK 32	491472	336315	35.4	23.9	29.3	26.0	30.9	23.1	20.4	22.9	16.0	-	<b>61.3</b>	32.7	29.6	24.6	-	Triplicate Site with SK 30, SK 31 and SK 32 - Annual data provided for SK 32 only
SK 33	491515	336389	<b>55.4</b>	<b>59.0</b>	<b>48.8</b>	<b>41.8</b>	<b>41.2</b>	32.5	<b>40.0</b>	33.9	<b>50.9</b>	-	<b>50.6</b>	35.8	-	-	-	Duplicate Site with SK 33 and SK 34 - Annual data provided for SK 34 only
SK 34	491515	336389	35.8	<b>57.4</b>	<b>51.2</b>	<b>43.2</b>	<b>43.6</b>	28.9	39.4	37.5	<b>46.9</b>	-	<b>55.5</b>	26.4	43.4	36.1	-	Duplicate Site with SK 33 and SK 34 - Annual data provided for SK 34 only
SK 35	491330	336022	38.3	33.0	33.1	32.1	39.7	23.3	22.2	27.8	36.5	-	<b>45.5</b>	24.3	-	-	-	Duplicate Site with SK 35 and SK 36 - Annual data provided for SK 36 only
SK 36	491330	336022	32.1	35.5	30.5	30.2	36.7	27.0	23.1	28.1	22.2	-	<b>50.7</b>	25.3	31.7	26.3	-	Duplicate Site with SK 35 and SK 36 - Annual data provided for SK 36 only
SK 37	491460	335715	29.5	34.6	33.1	33.9	38.5	27.7	21.0	22.9	35.4	-	<b>43.5</b>	25.7	-	-	-	Triplicate Site with SK 37, SK 38 and SK 39 - Annual data provided for SK 39 only
SK 38	491460	335715	31.3	33.4	-	33.4	39.8	26.8	21.6	24.1	35.6	-	<b>46.2</b>	25.4	-	-	-	Triplicate Site with SK 37, SK 38 and SK 39 - Annual data provided for SK 39 only
SK 39	491460	335715	32.1	23.2	32.9	34.4	34.2	26.3	22.4	24.3	34.6	-	<b>44.8</b>	20.7	31.1	25.8	-	Triplicate Site with SK 37, SK 38 and SK 39 - Annual data provided for SK 39 only
SK 40	491512	335719	14.5	18.8	20.8	20.6	24.5	16.5	16.6	16.9	24.1	-	33.3	18.5	20.5	17.0	-	
SK 41	491602	335485	26.9	32.4	31.2	30.2	-	24.6	22.2	24.1	35.3	-	<b>42.6</b>	21.8	-	-	-	Duplicate Site with SK 41 and

DT ID	X OS Grid Ref (Easting)	Y OS Grid Ref (Northing)	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Annual Mean: Raw Data	Annual Mean: Annualised and Bias Adjusted (0.83)	Annual Mean: Distance Corrected to Nearest Exposure	Comment
																		SK 42 - Annual data provided for SK 42 only
SK 42	491602	335485	29.9	32.9	33.0	31.6	36.1	27.0	20.0	24.6	31.8	-	<b>41.4</b>	20.5	29.8	24.8	-	Duplicate Site with SK 41 and SK 42 - Annual data provided for SK 42 only
SK 43	491734	335196	29.0	<b>40.7</b>	28.7	23.4	31.2	20.5	25.1	20.5	36.0	-	<b>45.1</b>	25.0	-	-	-	Duplicate Site with SK 43 and SK 44 - Annual data provided for SK 44 only
SK 44	491734	335196	31.2	16.8	34.5	32.5	24.3	25.2	18.9	28.8	33.2	-	<b>40.2</b>	23.9	28.9	23.9	-	Duplicate Site with SK 43 and SK 44 - Annual data provided for SK 44 only
SK 45	491869	334960	<b>43.3</b>	<b>40.2</b>	<b>42.4</b>	32.8	33.6	26.6	25.2	26.9	<b>50.1</b>	-	<b>43.7</b>	19.8	-	-	-	Duplicate Site with SK 45 and SK 46 - Annual data provided for SK 46 only
SK 46	491869	334960	<b>43.1</b>	27.4	37.6	34.3	31.0	30.1	30.4	31.9	<b>40.4</b>	-	<b>49.0</b>	37.6	35.3	29.3	-	Duplicate Site with SK 45 and SK 46 - Annual data provided for SK 46 only
SK 47	492067	334922	31.6	10.5	30.9	29.4	22.4	23.4	26.0	26.8	38.1	-	<b>46.8</b>	26.6	-	-	-	Duplicate Site with SK 47 and SK 48 - Annual data provided for SK 48 only
SK 48	492067	334922	32.3	18.6	32.4	26.3	24.2	22.4	26.6	28.9	36.9	-	36.1	28.5	28.4	23.6	-	Duplicate Site with SK 47 and SK 48 - Annual data provided for SK 48 only
SK 49	491427	335193	23.1	25.8	18.0	13.3	13.3	9.5	12.1	12.9	17.3	-	31.6	-	17.7	14.7	-	
SK 50	491184	335575	-	23.8	33.6	28.7	29.6	24.4	-	27.4	-	-	38.9	-	-	-	-	Duplicate Site with SK 50 and SK 51 - Annual data provided for SK 51 only
SK 51	491184	335575	34.2	<b>40.4</b>	-	24.0	26.4	18.6	23.8	29.1	30.9	-	33.7	21.8	28.8	23.9	-	Duplicate Site with SK 50 and SK 51 - Annual data provided for SK 51 only
SK 52	491200	335636	20.4	38.3	31.6	33.0	24.6	24.4	27.5	28.7	32.8	-	32.9	33.0	-	-	-	Duplicate Site with SK 52 and SK 53 - Annual data provided for SK 53 only
SK 53	491200	335636	26.9	39.7	36.0	31.7	30.1	25.0	25.6	28.2	39.3	-	<b>41.2</b>	29.8	30.9	25.7	-	Duplicate Site with SK 52 and SK 53 - Annual data provided for SK 53 only
SK 54	491492	335505	38.3	41.3	38.0	<b>41.9</b>	<b>47.1</b>	28.0	30.3	34.6	<b>48.0</b>		<b>42.0</b>	26.8	-	-	-	Duplicate Site with SK 54 and SK 55 - Annual data provided for SK 55 only
SK 55	491492	335505	37.1	39.7	36.6	<b>41.8</b>	<b>46.3</b>	34.4	37.0	34.0	<b>50.4</b>	--	<b>47.1</b>	23.4	38.4	31.8	-	Duplicate Site with SK 54 and SK 55 - Annual data provided for SK 55 only
SK 56	491402	335501	36.8	<b>45.0</b>	<b>42.4</b>	31.2	32.6	27.1	-	30.9	<b>40.9</b>	-	<b>47.4</b>	35.4	-	-	-	Duplicate Site with SK 56 and SK 57 - Annual data provided for SK 57 only
SK 57	491402	335501	33.6	27.6	<b>43.1</b>	30.3	29.0	21.0	16.4	28.9	39.2	-	30.2	30.1	32.5	27.0	-	Duplicate Site with SK 56 and SK 57 - Annual data provided for SK 57 only
SK 58	503070	306957	32.3	28.8	24.1	19.4	18.5	17.0	27.7	20.2	21.3	-	22.2	23.1	23.1	19.2	-	

All erroneous data has been removed from the NO<sub>2</sub> diffusion tube dataset presented in Table B.1.

Annualisation has been conducted where data capture is <75% and >25% in line with LAQM.TG22.

Local bias adjustment factor used.

- National bias adjustment factor used.
- Where applicable, data has been distance corrected for relevant exposure in the final column.
- South Kesteven District Council confirm that all 2023 diffusion tube data has been uploaded to the Diffusion Tube Data Entry System.

**Notes:**

Exceedances of the NO<sub>2</sub> annual mean objective of 40µg/m<sup>3</sup> are shown in **bold**.

NO<sub>2</sub> annual means exceeding 60µg/m<sup>3</sup>, indicating a potential exceedance of the NO<sub>2</sub> 1-hour mean objective are shown in **bold and underlined**.

See Appendix C for details on bias adjustment and annualisation.

## Appendix C: Supporting Technical Information / Air Quality Monitoring QA/QC

### New or Changed Sources Identified Within South Kesteven During 2023

South Kesteven District Council has identified no new developments within the monitoring year of 2023 that are expected to significantly impact the air quality objectives within the area into the 2024 monitoring year and onwards.

### Additional Air Quality Works Undertaken by South Kesteven District Council During 2023

During 2023, South Kesteven District Council commissioned Bureau Veritas UK to undertake a Source Apportionment Exercise in support of the updated AQAP due for issue on 8<sup>th</sup> October 2024 pending Councillor and Cabinet approval. The Source Apportionment Exercise can be reviewed in Appendix F.

The Council indicated they may undertake short term monitoring in Bourne, a small market town within the Council jurisdiction, although this is yet to be confirmed as such will likely occur in 2024 monitoring year.

### QA/QC of Diffusion Tube Monitoring

The diffusion tubes for the year 2023 were supplied and analysed by Gradko International, using the 50% Triethanolamine (TEA) in acetone preparation method. Gradko International, a UKAS accredited laboratory, participate in the AIR-PT scheme for NO<sub>2</sub> diffusion tube analysis and Annual Field Intercomparison Exercise. These provide strict criteria relating to performance that participating laboratories must meet, ensuring that the reported NO<sub>2</sub> concentrations are of a high calibre. From the most recent set of AIR-PT results (AR058, July – August and AR059, September – October), in which Gradko scored 100% – the percentage score reflects the results deemed satisfactory based upon the z-score of  $\pm 2$ .

There were 15 local authority co-location studies which used tubes supplied by Gradko with the 50% TEA in acetone preparation method in 2023, 14 were rated as 'good', as shown by the precision summary results. This precision reflects the laboratory's

performance and consistency in preparing and analysing the tubes, as well as the subsequent handling of the tubes in the field. Tubes are considered to have a “good” precision where the coefficient of variation of duplicate or triplicate diffusion tubes for eight or more monitoring periods during a year is less than 20%.

Monitoring in 2023 throughout South Kesteven District was completed in adherence with the 2023 Diffusion Tube Monitoring Calendar, whereby all changeovers throughout the monitoring year were completed in line with Defra guidance. It is noted that no tube reports data for October 2023 due to the tubes being lost in transit to the laboratory for analysis.

### **Diffusion Tube Annualisation**

For any site where data capture is below 75%, annualisation is to be performed. This is because section 7.196 of TG(22) states that:

*“If data capture is below 75% for the year, then it is necessary to annualise the data... [as] the concentration varies throughout the year, and the instrument may have been operational for a period of above or below average concentrations”.*

During 2023, there was no requirement for annualisation at any diffusion tube sites within South Kesteven District, as all sites had greater than 75% data capture.

### **Diffusion Tube Bias Adjustment Factors**

The diffusion tube data presented within the 2023 ASR have been corrected for bias using an adjustment factor. Bias represents the overall tendency of the diffusion tubes to under or over-read relative to the reference chemiluminescence analyser. LAQM.TG22 provides guidance with regard to the application of a bias adjustment factor to correct diffusion tube monitoring. Triplicate co-location studies can be used to determine a local bias factor based on the comparison of diffusion tube results with data taken from NO<sub>x</sub>/NO<sub>2</sub> continuous analysers. Alternatively, the national database of diffusion tube co-location surveys provides bias factors for the relevant laboratory and preparation method.

South Kesteven District Council have applied a national bias adjustment factor of 0.83 to the 2023 monitoring data. A summary of bias adjustment factors used by South Kesteven District Council over the past five years is presented in Table C. 1.

No co-location studies are carried out by South Kesteven District Council therefore only a national factor can be applied. The national factor for Gradko 50% TEA in acetone, as presented in the Diffusion Tube Bias Factors Spreadsheet v03/24, was 0.83 based on 15 studies. The National Bias Adjustment Spreadsheet is presented in Figure C. 1.

**Table C. 1 – Bias Adjustment Factor**

Monitoring Year	Local or National	If National, Version of National Spreadsheet	Adjustment Factor
2023	National	03/24	0.83
2022	National	03/23	0.82
2021	National	03/22	0.83
2020	National	03/21	0.84
2019	National	03/20	0.89

**NO<sub>2</sub> Fall-off with Distance from the Road**

Wherever possible, monitoring locations are representative of exposure. However, where this is not possible, the NO<sub>2</sub> concentration at the nearest location relevant for exposure has been estimated using the Diffusion Tube Data Processing Tool/NO<sub>2</sub> fall-off with distance calculator available on the LAQM Support website. Where appropriate, non-automatic annual mean NO<sub>2</sub> concentrations corrected for distance are presented in Table B. 1.

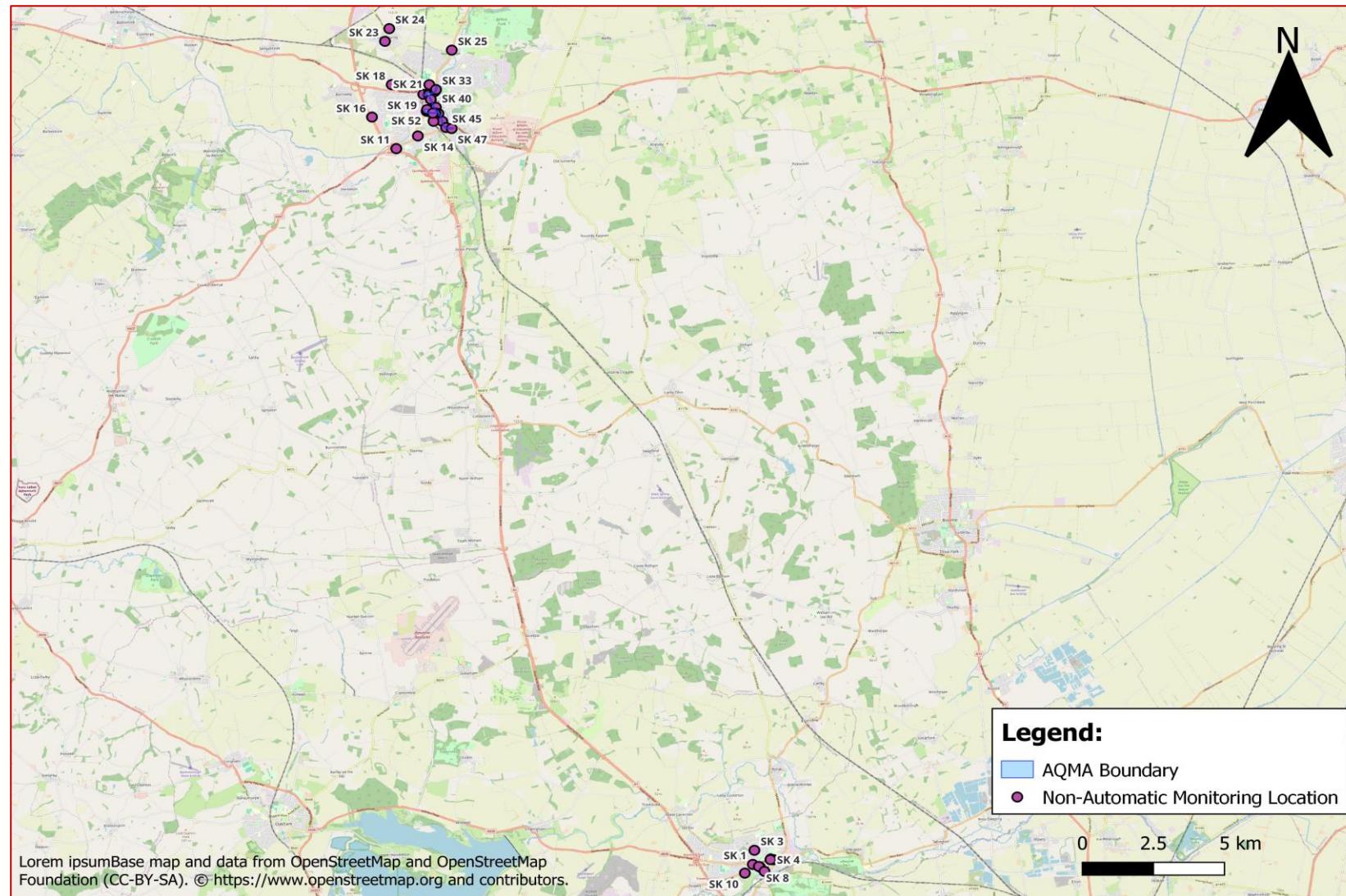
No diffusion tube monitoring location within South Kesteven District required distance correction during 2023.

Figure C. 1 - National Bias Adjustment Factor Spreadsheet (03/24)

National Diffusion Tube Bias Adjustment Factor Spreadsheet									Spreadsheet Version Number: 03/24										
Follow the steps below <b>in the correct order</b> to show the results of <b>relevant</b> co-location studies																			
Data only apply to tubes exposed monthly and are not suitable for correcting individual short-term monitoring periods																			
Whenever presenting adjusted data, you should state the adjustment factor used and the version of the spreadsheet																			
This spreadsheet will be updated every few months: the factors may therefore be subject to change. This should not discourage their immediate use.																			
The LAQM Helpdesk is operated on behalf of Defra and the Devolved Administrations by Bureau Veritas, in conjunction with contract partners AECOM and the National Physical Laboratory.							Spreadsheet maintained by the National Physical Laboratory. Original compiled by Air Quality Consultants Ltd.												
Step 1:	Step 2:	Step 3:	Step 4:																
Select the Laboratory that Analyses Your Tubes from the Drop-Down List	Select a Preparation Method from the Drop-Down List	Select a Year from the Drop-Down List	<b>Where there is only one study for a chosen combination, you should use the adjustment factor shown with caution. Where there is more than one study, use the overall factor<sup>3</sup> shown in blue at the foot of the final column.</b>  If you have your own co-location study then see footnote <sup>4</sup> . If uncertain what to do then contact the Local Air Quality Management Helpdesk at LAQMHelpdesk@bureauveritas.com or 0800 0327953																
If a laboratory is not shown, we have no data for this laboratory.	If a preparation method is not shown, we have no data for this method at this laboratory.	If a year is not shown, we have no data <sup>2</sup>																	
Analysed By <sup>1</sup>	Method	Year <sup>5</sup>	Site Type	Local Authority	Length of Study (months)	Diffusion Tube Mean Conc. (Dm) ( $\mu\text{g}/\text{m}^3$ )	Automatic Monitor Mean Conc. (Cm) ( $\mu\text{g}/\text{m}^3$ )	Bias (B)	Tube Precision <sup>6</sup>	Bias Adjustment Factor (A) ( $\text{Cm}/\text{Dm}$ )									
Gradko	50% TEA in acetone	2023	UB	City Of London Corporation	10	28	22	26.3%	G	0.79									
Gradko	50% TEA in acetone	2023	R	City Of London Corporation	11	36	31	15.0%	G	0.87									
Gradko	50% TEA in acetone	2023	R	LB Newham	12	27	21	28.0%	G	0.78									
Gradko	50% TEA in acetone	2023	SU	Redcar And Cleveland Borough Council	12	14	10	48.0%	G	0.68									
Gradko	50% TEA in Acetone	2023	R	Sandwell Mbc	12	33	26	27.6%	G	0.78									
Gradko	50% TEA in acetone	2023	UB	Sandwell Mbc	11	21	18	15.6%	G	0.86									
Gradko	50% TEA in acetone	2023	R	Sandwell Mbc	12	23	20	14.2%	S	0.88									
Gradko	50% TEA in Acetone	2023	UC	Falkirk Council	12	33	29	14.3%	G	0.87									
Gradko	50% TEA in Acetone	2023	UB	Falkirk Council	12	15	13	8.3%	G	0.92									
Gradko	50% TEA in acetone	2023	R	London Borough Of Lewisham	11	33	27	22.7%	G	0.82									
Gradko	50% TEA in Acetone	2023	R	London Borough Of Merton	12	37	31	18.5%	G	0.84									
Gradko	50% TEA in acetone	2023	KS	Marylebone Road intercomparison	11	47	38	25.7%	G	0.80									
Gradko	50% TEA in acetone	2023	R	Royal Borough Of Windsor And Maidenhead	11	27	23	21.6%	G	0.82									
Gradko	50% TEA in acetone	2023	R	Royal Borough Of Windsor And Maidenhead	12	24	24	0.6%	G	0.99									
Gradko	50% TEA in acetone	2023	R	London Borough Of Richmond Upon Thames	11	18	16	15.6%	G	0.86									
Gradko	50% TEA in acetone	2023		<b>Overall Factor<sup>3</sup> (15 studies)</b>					Use	0.83									

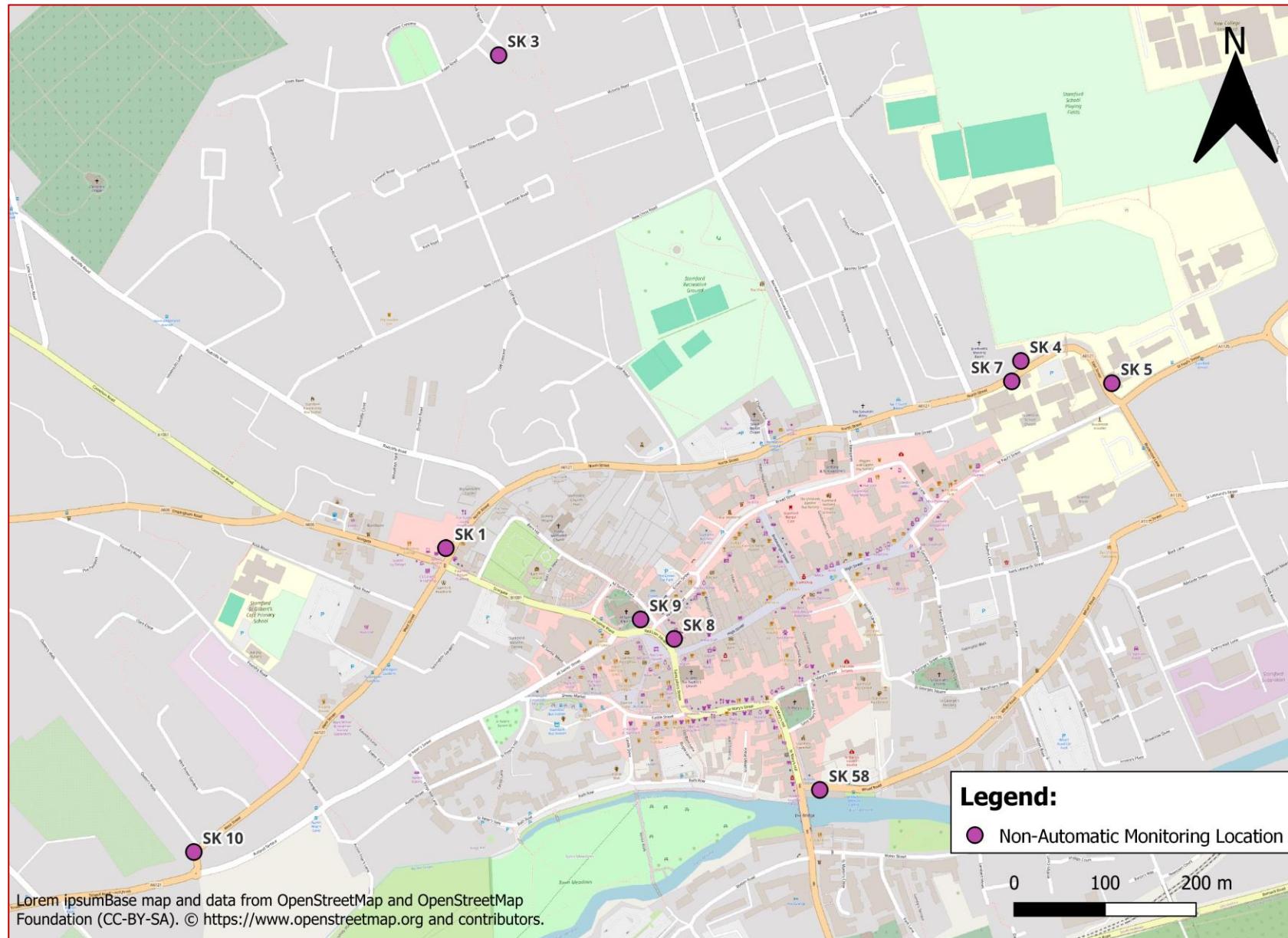
## Appendix D: Maps of Monitoring Locations and AQMAs

Figure D. 1 – All Non-Automatic Monitoring Locations in South Kesteven and AQMA No.6



NOTE: As majority of the monitoring locations in South Kesteven are duplicate or triplicates, only one Site ID has been provided for ease of visuals in the Appendix D Figures. Refer to Table A.2 to match up locations.

#### Figure D. 2 – Non-Automatic Monitoring Locations: Stamford



## Figure D. 3 – Non-Automatic Monitoring Locations: Grantham

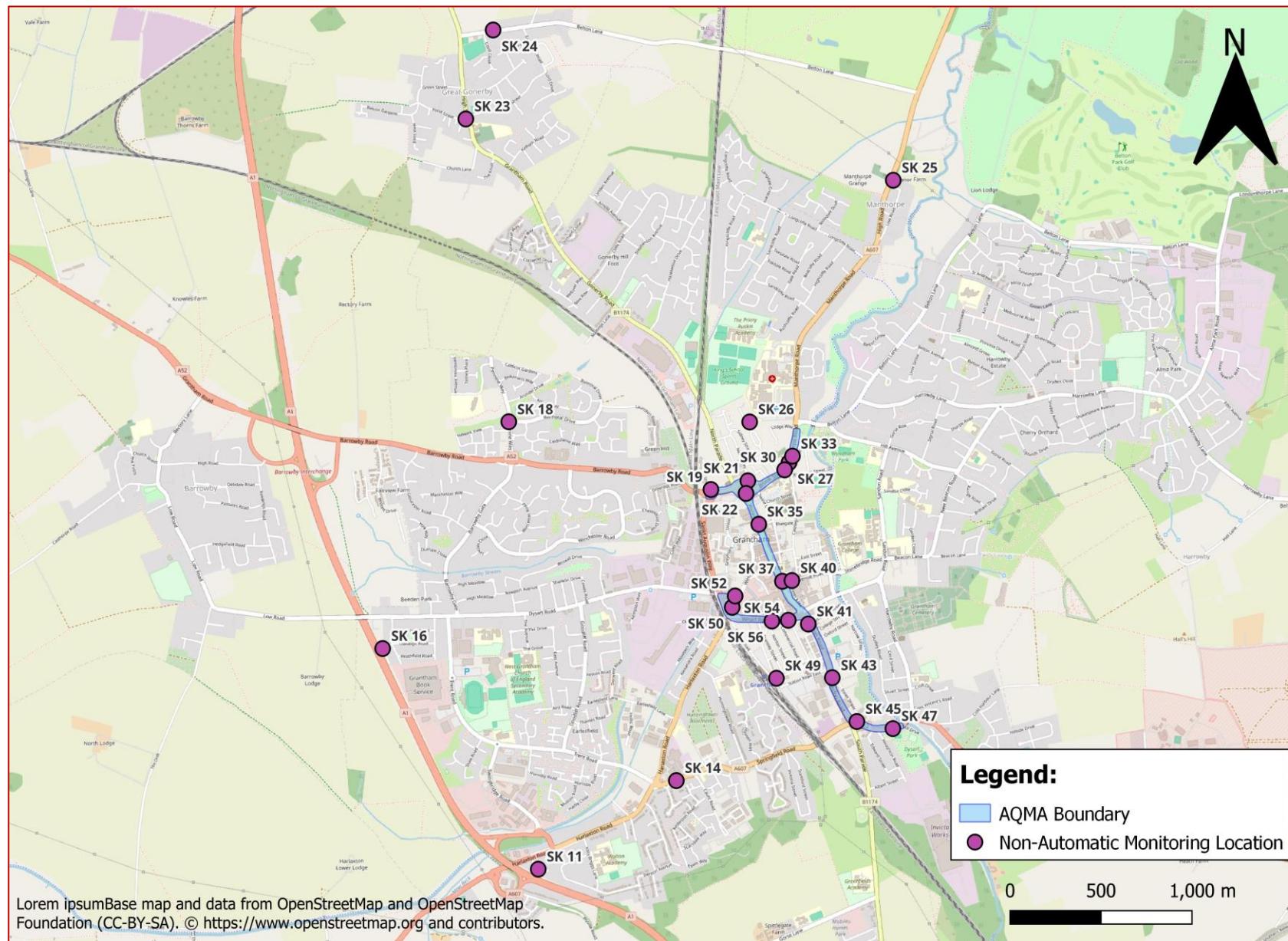
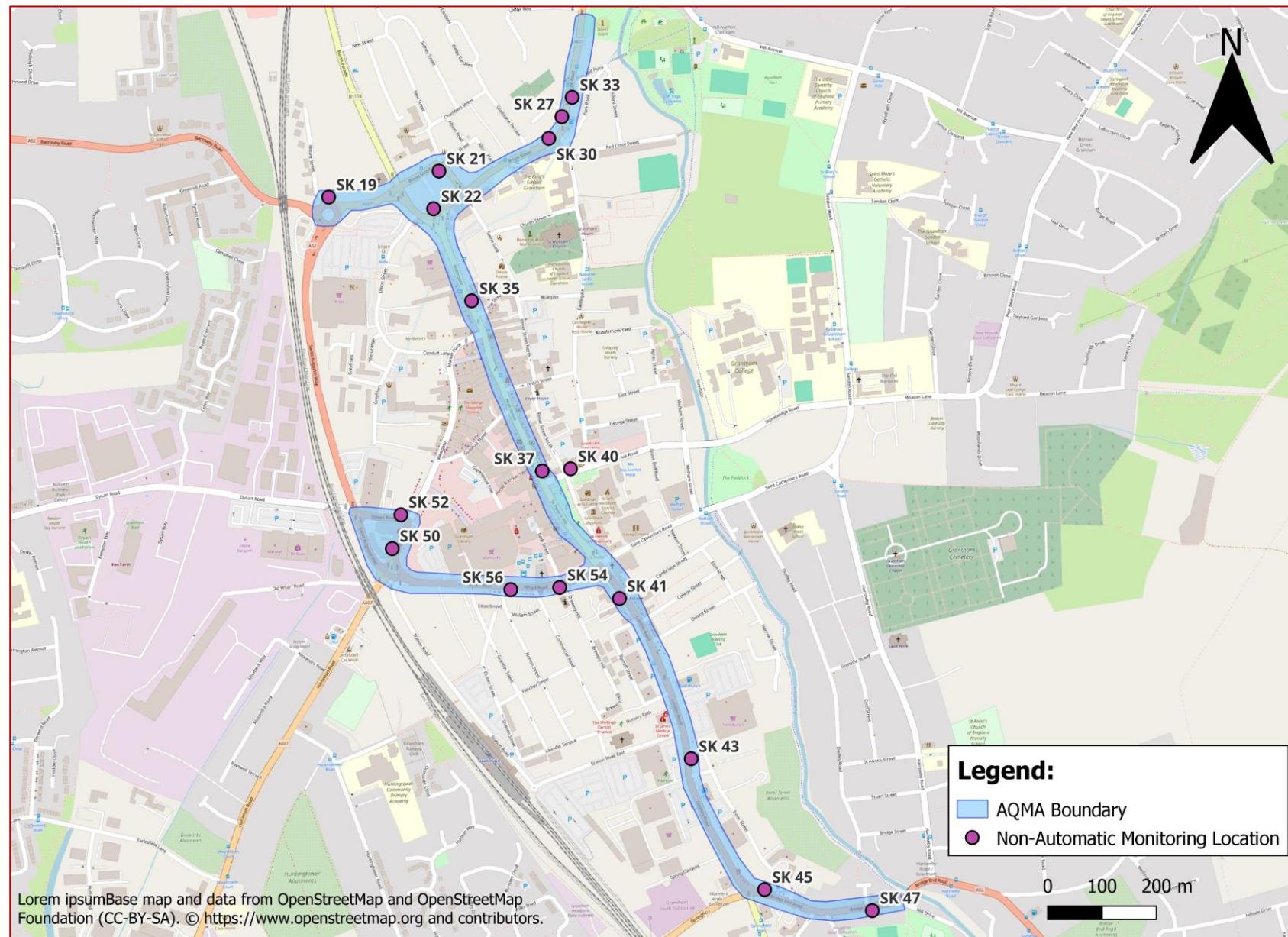


Figure D. 4 – Non-Automatic Monitoring Locations: Grantham AQMA No.6



NOTE: Figure D. 4 shows SK40 on the outskirts of the AQMA boundary. It has been included in the Figure as the Council still consider SK40 to be a good representation of concentrations within the AQMA despite being near the border.

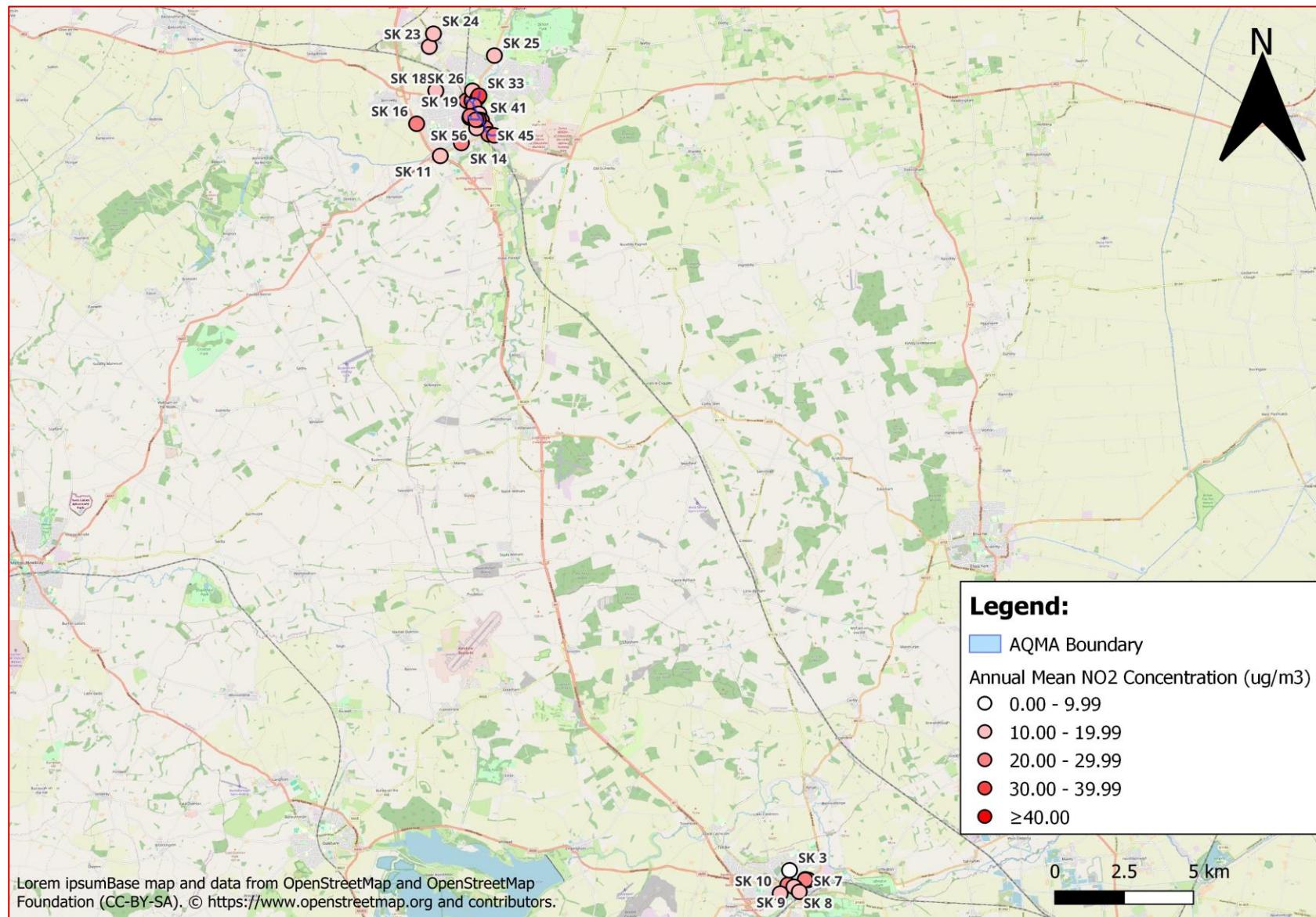
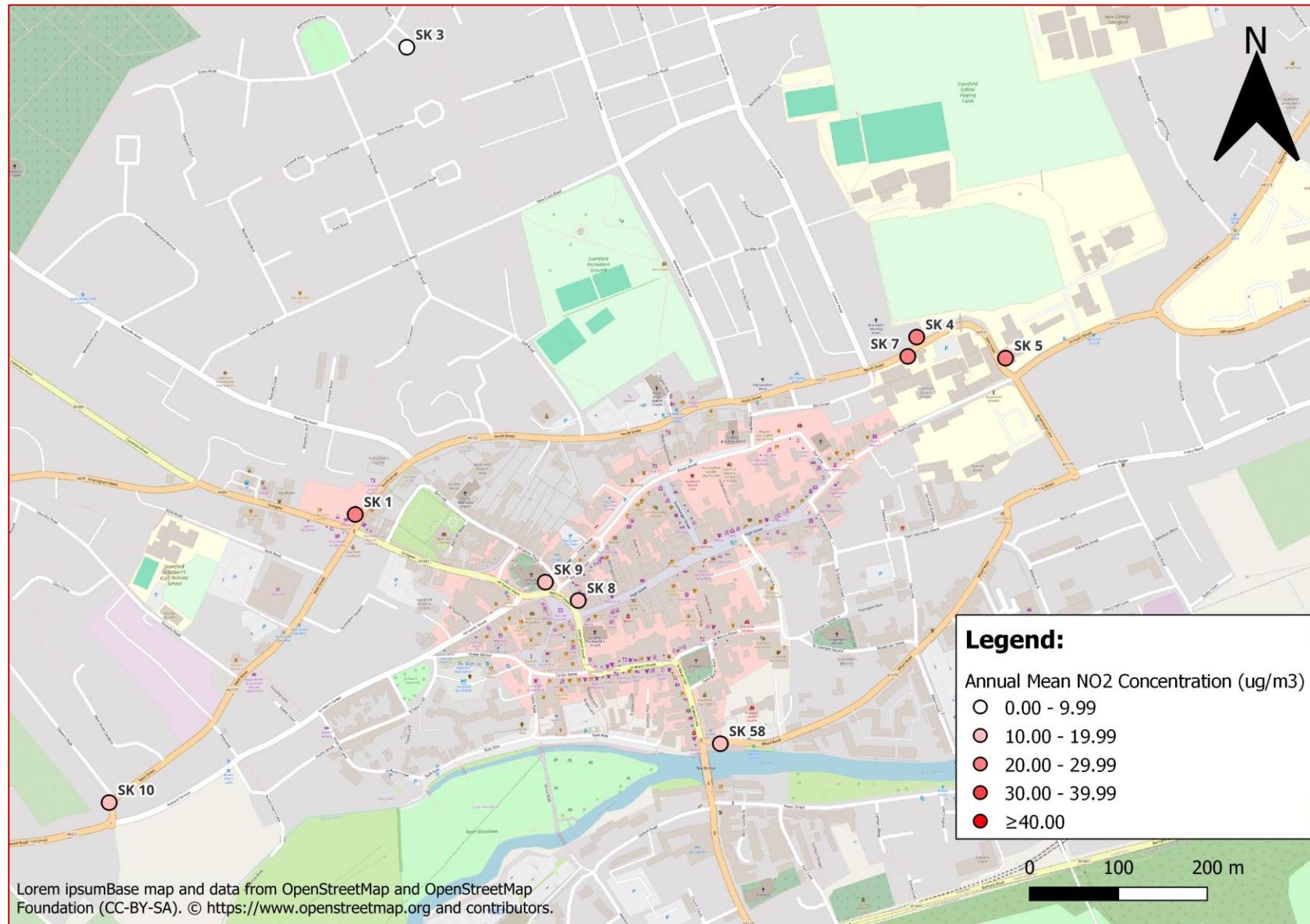
Figure D. 5 – 2023 Annual NO<sub>2</sub> Concentrations All Non-Automatic Monitoring Locations

Figure D. 6 – 2023 Annual NO<sub>2</sub> Concentrations All Non-Automatic Monitoring Locations: Stamford

#### Figure D. 7 – 2023 Annual NO<sub>2</sub> Concentrations All Non-Automatic Monitoring Locations: Grantham

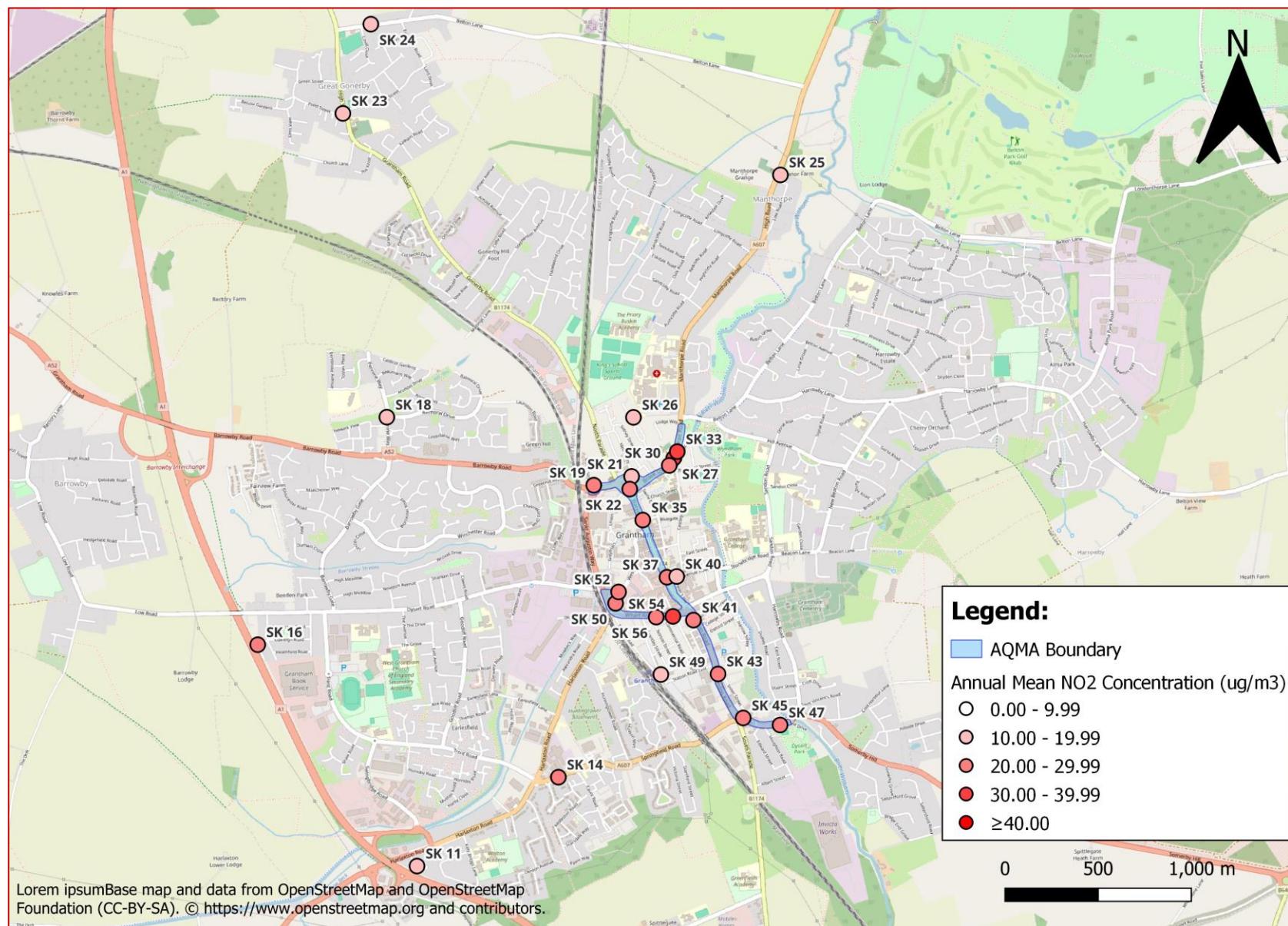
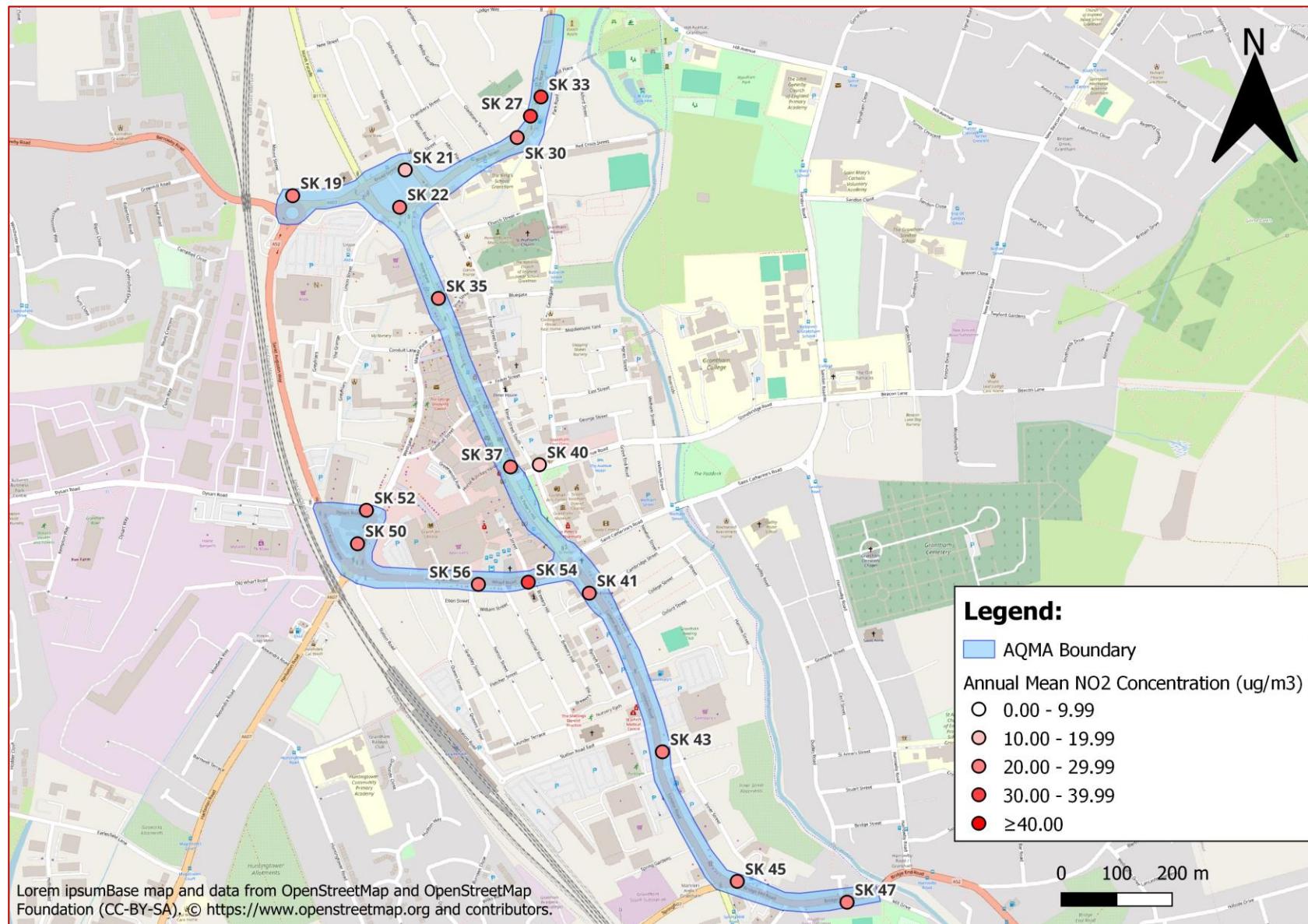


Figure D. 8 – 2023 Annual NO<sub>2</sub> Concentrations All Non-Automatic Monitoring Locations: Grantham AQMA No.6



## Appendix E: Summary of Air Quality Objectives in England

**Table E. 1 – Air Quality Objectives in England<sup>9</sup>**

Pollutant	Air Quality Objective: Concentration	Air Quality Objective: Measured as
Nitrogen Dioxide (NO <sub>2</sub> )	200µg/m <sup>3</sup> not to be exceeded more than 18 times a year	1-hour mean
Nitrogen Dioxide (NO <sub>2</sub> )	40µg/m <sup>3</sup>	Annual mean
Particulate Matter (PM <sub>10</sub> )	50µg/m <sup>3</sup> , not to be exceeded more than 35 times a year	24-hour mean
Particulate Matter (PM <sub>10</sub> )	40µg/m <sup>3</sup>	Annual mean
Sulphur Dioxide (SO <sub>2</sub> )	350µg/m <sup>3</sup> , not to be exceeded more than 24 times a year	1-hour mean
Sulphur Dioxide (SO <sub>2</sub> )	125µg/m <sup>3</sup> , not to be exceeded more than 3 times a year	24-hour mean
Sulphur Dioxide (SO <sub>2</sub> )	266µg/m <sup>3</sup> , not to be exceeded more than 35 times a year	15-minute mean

<sup>9</sup> The units are in microgrammes of pollutant per cubic metre of air (µg/m<sup>3</sup>).

## Appendix F: Source Apportionment Exercise – AQAP

## Glossary of Terms

Abbreviation	Description
AIR-PT	Air and Stack Emissions
AONB	Areas of Outstanding Natural Beauty
AQA	Air Quality Assessment
AQAP	Air Quality Action Plan - A detailed description of measures, outcomes, achievement dates and implementation methods, showing how the local authority intends to achieve air quality limit values'
AQMA	Air Quality Management Area – An area where air pollutant concentrations exceed / are likely to exceed the relevant air quality objectives. AQMAs are declared for specific pollutants and objectives
AQS	Air Quality Standard
ASR	Annual Status Report
AURN	Automatic Urban Rural Network
B&B	Bed and Breakfasts
CMCU	Central Management and Coordination Unit
CO <sub>2</sub>	Carbon Dioxide
COVID-19	Coronavirus-19
CWZ	Core Walking Zones
Defra	Department for Environment, Food and Rural Affairs
DfT	Department for Transport
DMRB	Design Manual for Roads and Bridges – Air quality screening tool produced by National Highways
DT	Diffusion Tube
EA	Environment Agency
ESU	Equipment Support Unit
EU	European Union
EV	Electric Vehicle
FDMS	Filter Dynamics Measurement System
LAD2	Local Authority Delivery Phase 2
LAD3	Local Authority Delivery Phase 3

Abbreviation	Description
LAQM	Local Air Quality Management
LCC	Lincolnshire County Council
LCN	Local Cycle Network
LCWIP	Local Cycling and Walking Infrastructure Plan
LEVI	Local Electric Vehicle Infrastructure
LED	Light Emitting Diode
LSO	Local Site Operator
NCN	National Cycle Network
NHS	National Health Service
NO <sub>2</sub>	Nitrogen Dioxide
NO <sub>x</sub>	Nitrogen Oxides
ONS	Office for National Statistics
PG	Policy Guidance
PM <sub>10</sub>	Airborne particulate matter with an aerodynamic diameter of 10µm or less
PM <sub>2.5</sub>	Airborne particulate matter with an aerodynamic diameter of 2.5µm or less
QA/QC	Quality Assurance and Quality Control
SAC	Special Areas of Conservation
SCA	Smoke Control Area
SO <sub>2</sub>	Sulphur Dioxide
SSSI	Sites of Special Scientific Interest
TEA	Triethanolamine
TG	Technical Guidance
UKAS	United Kingdom Accreditation Service
ULEV	Ultra Low Emission Vehicle

## References

- Local Air Quality Management Technical Guidance LAQM.TG22. August 2022. Published by Defra in partnership with the Scottish Government, Welsh Assembly Government and Department of the Environment Northern Ireland.
- Local Air Quality Management Policy Guidance LAQM.PG22. August 2022. Published by Defra in partnership with the Scottish Government, Welsh Assembly Government and Department of the Environment Northern Ireland.
- Chemical hazards and poisons report: Issue 28. June 2022. Published by UK Health Security Agency
- Air Quality Strategy – Framework for Local Authority Delivery. August 2023. Published by Defra.
- South Kesteven District Council Air Quality Annual Status Report. September 2023.



SOUTH  
KESTEVEN  
DISTRICT  
COUNCIL

## Environment Overview and Scrutiny Committee

Tuesday, 10 December 2024

Report of Councillor Rhys Baker,  
Cabinet Member for Environment and  
Waste

### Tree and Woodland Strategy Summary Work Programme

#### Report Author

Andrew Igoea, Tree Project Officer

andrew.igoea@southkesteven.gov.uk

#### Purpose of Report

To update Environment Overview and Scrutiny Committee on the South Kesteven District Council Tree and Woodland Strategy summary Work Programme

#### Recommendations

##### The Committee is recommended to:

1. Note the Tree and Woodland Strategy Summary Work Programme.

#### Decision Information

Does the report contain any exempt or confidential information not for publication? N

What are the relevant corporate priorities? Sustainable South Kesteven

Which wards are impacted? (All Wards);

## 1. Implications

Taking into consideration implications relating to finance and procurement, legal and governance, risk and mitigation, health and safety, diversity and inclusion, safeguarding, staffing, community safety, mental health and wellbeing and the impact on the Council's declaration of a climate change emergency, the following implications have been identified:

### ***Finance and Procurement***

- 1.1 This work programme outlines the implementation of existing agreed actions and does not require additional financial resources beyond those already committed in the original strategy documents.

*Completed by: Richard Wyles, Deputy Chief Executive and s151 Officer*

### ***Legal and Governance***

- 1.2 This work programme does not present any legal or governance issues.

*Completed by: Mandy Braithwaite, Legal Executive*

### ***Climate Change***

- 1.3 The primary aims of the Trees and Woodlands Strategy are to protect, enhance and increase the district's tree canopy cover, therefore there are clear benefits for the environment. The planting of trees of any kind provides valuable ecosystem services such as climate change regulation, carbon sequestration, filtering of pollution and in some cases flood prevention.
- 1.4 The Tree and Woodland Strategy Work Programme will help to ensure actions of the Strategy are prioritised and implemented in the most efficient manner.

*Completed by: Serena Brown, Sustainability and Climate Change Manager*

## 2. Background

- 2.1 Cabinet approved the Council's Tree and Woodland Strategy 2024-2034 on 24 May 2024. The Strategy aims to increase tree canopy cover, enhance biodiversity, and engage communities in sustainable tree management practices across South Kesteven, contributing to a greener, more climate resilient district.

2.2 A Tree Project Officer role was created to drive forward the implementation of the Tree and Woodland Strategy. This role will also be responsible for managing the Council's stock of trees.

2.3 Following successful recruitment into the role, the following 18-month work programme has been developed to support the delivery of the action plan included in the Strategy by 2034:

- Review the Council's 'Tree Guidelines' document, providing additional emphasis to relevant Tree and Woodland Strategy targets such as increased climate resilience, enhancement of biodiversity value, and social cohesion. The new document should also include policies which demonstrate that the Council's approach to managing its duty of care to trees is reasonable, proportionate and complies with current best practice.
- Introduce a new tree record management system which will allow the Council to own (and have control over) its tree inventory data and provide insights into the climate resilience of its trees.
- Analyse existing inventory data to obtain baseline population statistics about the number of trees, species diversity and the age distribution of trees on land in South Kesteven.
- Obtain baseline data for tree canopy cover over all towns and large villages within the district.
- Assess planting opportunities and constraints on land in South Kesteven to allow realistic targets to be set for new planting. Undertake consultation with Councillors, Parish Councillors and local community groups on planting proposals
- Expand the tree planting programme on Council owned land, prioritising high-impact areas such as parks, open spaces, and land adjacent to transport routes. Investigate and implement delivery models for post-planting monitoring and maintenance, including condition assessments, watering, weeding, formative pruning and removal of redundant support systems.
- Promote best practice in all tree planting schemes by producing a guidance document for parish/town councils and community groups, introducing a system for recording and monitoring newly planted trees and reviewing tree planting procurement policies to ensure that suppliers and contractors comply with current best practice guidelines.
- Establish a 'Tree Board' to oversee the delivery of the current and future work programmes.
- Run tree-related training courses for relevant Council officers to raise awareness within the organisation of arboricultural issues and enhance the skills and knowledge of the various staff members with responsibility for managing the council's trees.

- Produce promotional content that highlights the key elements and objectives of the Council's Tree and Woodland Strategy, to foster the development of partnerships working towards shared objectives and gain buy-in from local communities.

### **3. Reasons for the Recommendations**

3.1 The Committee are asked to note the work programme which defines specific objectives for the first 18 months of the delivery of the Strategy.

### **4. Background Papers**

4.1 [Item 10, Environment Overview and Scrutiny Committee](#), Tuesday 19<sup>th</sup> March 2024

4.2 [Item 5, Cabinet](#), Tuesday 14<sup>th</sup> May 2024

# Environment Overview and Scrutiny Committee 2024/25

## WORK PROGRAMME

REPORT TITLE	LEAD OFFICER	PURPOSE	ORIGINATED/COMMITTEE HISTORY DATE(S)	CORPORATE/PRIORITY
<b>10 December 2024</b>				
Green Bins and Bulky Waste Fees & Charges	Kay Boasman (Head of Waste and Markets)	To scrutinise the proposals for the following financial year's fees and charges.		
Mid-Year KPIs (Q2 2024/25)	Debbie Roberts (Head of Corporate Projects, Policy and Performance)	To provide an update on the Council's Mid-Year (Q2 2024/25) performance against the Corporate Plan 2024-27 KPIs.		
Green Fleet Strategy	Kay Boasman (Head of Waste and Markets)	To provide an update on the initial draft of the Green Fleet Strategy.		Sustainable South Kesteven
Waste Policy Update	Kay Boasman (Head of Waste and Markets)	To provide an update on the Waste Policy document.		Sustainable South Kesteven
Air Quality Annual Report and AQMA Update	Ayeisha Kirkham (Head of Service - Public Protection)			
Update on Tree Workplan	Serena Brown (Sustainability and Climate Change Manager)			
<b>10 February 2025</b>				

REPORT TITLE	LEAD OFFICER	PURPOSE	ORIGINATED/COMMITTEE HISTORY DATE(S)	CORPORATE/PRIORITY
Progress Update On Upgrade Of District Council Streetlights To LED Units	Serena Brown (Sustainability and Climate Change Manager)			
Communal Recycling Scope	Kay Boasman (Head of Waste and Markets)			
Update on the Climate Reserve Fund	Serena Brown (Sustainability and Climate Change Manager)			
EPC's Presentation	Peter Rowley (External via Cllr Selby)			
<b>18 March 2025</b>				
Update on the Climate Action Plan	Serena Brown (Sustainability and Climate Change Manager)			

Unscheduled future items				
Communal Recycling				
National Hedge Laying Association				

<b>Quality of the District's Rivers and Canals</b>				
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## **The Committee's Remit**

The remit of the Environment Overview and Scrutiny Committee will be to work alongside Cabinet Members to assist with the development of policy and to scrutinise decisions in respect of, but not limited to:

- Air quality
- Animal welfare licensing (Policy)
  - Commercial, industrial, and clinical waste collection and management
  - Dog breeding and control orders
  - Domestic waste and recycling management
  - Energy efficiency
  - Environment SK Ltd
  - Environment SK Commercial Services Ltd
  - Estate and grounds maintenance
  - Flooding
  - Food hygiene and safety
  - Health and safety
  - Noise
  - Renewable energy
  - Scrap metal dealers
  - Green open space management

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