

**Research into Land Use Planning
(Air Quality)
Final Report**

**Prepared for Scottish Environment
Protection Agency
by
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1. INTRODUCTION

- 1.1. Land Use Consultants (LUC) was commissioned by SEPA to undertake research to inform their planning staff and local air quality specialists about how best to achieve SEPA's outcomes for air quality through the planning system. The planning system is considered a key mechanism to achieve improved air quality and one which could be used more effectively by SEPA through improving the advice provided to planning authorities.
- 1.2. The main elements of the research comprise a review of local and structure plans and references to air quality and a review of planning decisions relating to air quality, including a review of appeal decisions, followed by consultation with a sample of local authorities, the Scottish Executive and the Department for Communities and Local Government in England, about their experience, policy and guidance on air quality and planning.

Air Quality Management Areas

- 1.3. Since December 1997 each local authority in the UK has been carrying out a review and assessment of air quality in their area. This involves measuring air pollution and trying to predict how it will change in the next few years. The aim of the review is to make sure that the national air quality objectives will be achieved throughout the UK by the relevant deadlines. These objectives have been put in place to protect people's health and the environment. If a local authority finds any places where the objectives are not likely to be achieved, it must declare an Air Quality Management Area for that area.

Table 1.1 Air Quality Management Areas in Scotland

Local Authority	Date AQMA declared	Extent of AQMA	Air Quality Action Plan
Aberdeen City	June 2001	Covering parts of the city centre. The original AQMA was extended in 2003 and 2005 and now covers Market, Union, Virginia, Commerce, King and Holborn Streets	Air Quality Action Plan 2006
East Dunbartonshire	December 2005	A 60 metre corridor along the A803 Kirkintilloch Road through Bishopbriggs town centre.	
Edinburgh	December 2000	The city centre, including the main link roads in to the city centre	Air Quality Action Plan 2003
Falkirk	November 2005	Grangemouth	
Glasgow	January 2002	City centre	Air Quality Action Plan 2004
North Lanarkshire	December 2005	Coatbridge, Chapelhall and Motherwell	
Renfrewshire	September 2005	Central Road beneath the Multistorey Car Park (AQMA is on part of Central Road, Paisley between Smithhills Street and County Square and the service road for the Piazza Shopping Centre adjacent to Central Road	

Dundee	July 2006	The whole of the local government area of the City of Dundee	
Perth and Kinross	May 2006	The whole of the Perth urban area	

1.4. The objectives of the research are as follows:

- to research the interface between land use planning and the protection and improvement of air quality;
- to assess the impact and effectiveness of planning decisions and policy on air quality.

1.5. The broader aim of the study is to inform SEPA planning staff and air quality specialists about how best to use the planning system to help achieve the agency's air quality improvement outcomes. The work reflects the unrealised potential of the planning system in contributing to such outcomes. The study will form a basis for SEPA's future engagement with the planning system in relation to air quality and will lead to the preparation of internal guidance for SEPA's planning liaison function. SEPA's outcome for air quality as set out in SEPA's Corporate Plan 2005-2008¹.

Outcome	Good air quality		
Measure	Local, national and international air quality and global climate change*		Compliance
Long-term targets	Achieve 2010 air quality objectives and emission limit values†.	Reduce emissions of airborne pollutants. Contribute towards UK 2010 targets and objective‡. Ensure effective and well-controlled Emissions Trading.	Maintain and improve levels of operator compliance and performance.
Year 3 2007/08 targets	Improve effectiveness of liaison with local authorities.	Reduce emissions of airborne pollutants from SEPA regulated processes. Complete three biodiversity actions.	Complete permitting for all sectors in Pollution Prevention and Control and achieve best available techniques. Maintain and improve levels of operator compliance and performance‡.
Year 2 2006/07 targets	Improve effectiveness of liaison with local authorities.	Reduce emissions of airborne pollutants from SEPA regulated processes. Develop long term reduction targets using information collated from data collection systems.	Achieve best available techniques for all installations permitted in Pollution Prevention and Control. Maintain and improve levels of operator compliance and performance‡.
Year 1 2005/06 targets	Meet nitrogen oxides 1-hourly and annual mean objectives and sulphur dioxide 15-minute objective.	Develop pilot for air classification scheme†.	Reduce emissions of airborne pollutants from regulated processes. Establish baseline for pollutants including volatile organic compounds.
			Achieve best available techniques for all installations permitted in Pollution Prevention and Control. Maintain and improve levels of operator compliance and performance‡.

¹ SEPA (2005) Corporate Plan 2005-2008

- 1.6. It is also important to take note of the themes embedded in all of SEPA's outcomes² that SEPA continually works towards:
- sustainable development;
 - conserving and enhancing biodiversity;
 - sustainable chemicals management;
 - upholding the principles of environmental justice; and
 - contributing to Scottish objective and UK targets relating to global climate change.
- 1.7. In fulfilling these outcomes and themes, SEPA plays an important role in the planning process as a consultee on development plans and a statutory consultee for certain types of development proposal as set out in Article 15(1) of the Town and Country Planning (General Development Procedure) (Scotland) Order 1992 (as amended). In addition other types of application can raise pollution control issues on which the advice of SEPA is required. SEPA is also a Consultation Authority for Strategic Environmental Assessment. The modernising planning agenda presents opportunities for SEPA to further engage in the planning system.
- 1.8. The structure of the report is as follows:
- Chapter 2 sets out the methodology of the research;
 - Chapter 3 sets out the findings of the planning policy review, review of appeals and stakeholder consultation.
 - Chapter 4 draws conclusions on the findings.

² Minimised, recovered and well-managed waste; good water environments; good air quality; good land quality; a respected environment: protected, informed and engaged communities; economic well being.

2. METHOD

Introduction

- 2.1. The aim of the research is to develop an understanding of the current role and consideration of air quality issues within the planning system. This has involved six main stages:
1. Review of all structure and local plans in Scotland approved/adopted since 2001 for references to air quality.
 2. Review of a sample of English structure and local plans approved/adopted since 2001 in local authorities with AQMA for references to air quality.
 3. Review of Supplementary Planning Guidance on air quality.
 4. Review of planning appeals in Scotland, England and Wales where air quality was an issue.
 5. Review of a sample of development control/management decisions.
 6. Consultation with planning officers and environmental health officers, Scottish Executive, the Department for Communities and Local Government, and the Environment Agency.
- 2.2. The methodology for each stage is discussed in more detail in the following sections.

Review of Structure and Local Plans

- 2.3. The review of structure and local plans recorded the following information:
- council;
 - name of plan;
 - date of plan;
 - web address;
 - geographic coverage of plan;
 - coincidence with Air Quality Management Areas;
 - existence of Air Quality Action Plans;
 - policy references to Air Quality;
 - supporting text references to Air Quality.
- 2.4. Appendix 1 provides a full list of the Scottish plans included in the review and the findings of the review can be found in Annex 1.
- 2.5. Table 2.1 below shows the English structure and local plans reviewed to provide a comparison with Scotland. These plans were selected on the basis of local

authorities with AQMA and development plans which had been approved/adopted in the last five years and were available online.

Table 2.1 English Structure and Local Plans

Local Plans	Air Quality Management Area
South Lakeland Local Plan and Interim Planning Approach to Housing Development (2006)	✓
South Oxfordshire Local Plan 2011 adopted on 20 January 2006	✓
City of Derby Local Plan Review adopted 25 January 2006	✓
Portsmouth City Local Plan 2001 - 2011 (Adopted July 2006)	✓
London Borough of Camden Replacement Unitary Development Plan Adopted June 2006	✓
Structure Plans	Air Quality Management Area
Oxfordshire Structure Plan 2016 with modifications adopted October 2005	(West Oxfordshire, South Oxfordshire, Oxford)
Northumberland County and National Park Joint Structure Plan Adopted by Northumberland National Park Authority on 26 January 2005 and by Northumberland County Council on 2 February 2005	(Blyth Valley)
Lincolnshire Structure Plan was Adopted September 2006, and runs from 2001 to 2021	(North Lincolnshire)
Bath and North East Somerset, Bristol, North Somerset, South Gloucestershire, Joint Replacement Structure Plan Adopted September 2002	(Bristol, Bath and NE Somerset)
The London Plan February 2004	(All central London Boroughs)

Review of Planning Appeals

- 2.6. We requested a search by IDOX of the Scottish planning appeal decisions within the last five years which make reference to air quality. The search terms used included 'air', 'pollution', 'emissions' and 'fumes'. Within this period there have been four appeals which make reference to air quality as a main issue. IDOX then widened their search to include appeal decisions since the 1980s and this identified a further 10 relevant appeals.
- 2.7. A similar search was made of English and Welsh planning appeals using the COMPASS search facility.

Review of Development Decisions

- 2.8. All nine Scottish local authorities with AQMA and the five English local authorities from the plan review were contacted to obtain information on planning applications which make reference to air quality issues. Local authority planning application databases have variable search capabilities, and the following approach was taken:
1. Search of planning applications in the last 5 years using the keyword 'air' or where an Air Quality Assessment had been undertaken.
 2. Asking for information on developments where the planning officers are aware of where air quality issues have been a consideration.
 3. If a keyword search facility is not available and where it is possible to request or undertake a search by location we have sought information on planning applications within AQMA so that these can be reviewed in terms of potential air quality impacts.
- 2.9. The majority of the planning authorities contacted were unable to carry out a key word search, or provide that facility online. However applications where air quality was an

issue were identified, including those where an AQA was requested. Two local authorities identified applications which were within the AQMA. The findings from this review and an exploration of the issues, is discussed in more detail in Chapter 3.

2.10. The review of the development management recorded:

- council;
- type of application (e.g. industrial, residential, transport...);
- date of application;
- decision;
- consideration of air quality issues within decision notice or in conditions;
- doincidence with AQMAs;
- existence of Air Quality Action Plans;
- reference to air quality policies in structure plan or local plan where appropriate, supplementary planning guidance or other published guidance.

2.11. The record of development management decisions is in Annex 2.

Stakeholder Consultation

2.12. The last stage of the work was discussions with planning and environmental health/environmental pollution officials in the nine local authorities in Scotland with AQMA.

2.13. Following discussions with the planning authorities we undertook a final stage of consultation with the Scottish Executive, the Department for Communities and Local Government and the Environment Agency.

3. FINDINGS

Introduction

- 3.1. This section of the report discusses the findings of each stage of the research in more detail for the following topics:
- background policy and guidance;
 - review of structure and local plans;
 - review of development management;
 - review of planning appeal decisions;
 - review of supplementary planning guidance;
 - consultation findings.
- 3.2. Each section provides an overview of the findings and draws initial conclusions from the results.

POLICY AND GUIDANCE

Background

- 3.3. The Environmental Protection Act 1990 (as amended by the Environment Act 1995) includes provisions relating to air quality, with particular regard to preparing a National Air Quality Strategy (NAQS) which was published in 1997. Local authorities have statutory duties for local air quality management (LAQM) under the Environment Act 1995.
- 3.4. The Environment Act (1995) also led to the establishment of SEPA whose responsibilities for air quality as set out in paragraph 23 of PAN51 (Revised 2006) *Planning, Environmental Protection and Regulation* include:
- controlling discharges and emissions to land, air and water from PPC Part A installations;
 - controlling emissions to air from PPC Part B installations;
 - acting as a statutory consultee for Local Air Quality Management.

National Air Quality Strategy

- 3.5. The NAQS introduced stringent new ambient air quality objectives and required local authorities to undertake a formal assessment process to determine whether these objectives would be met and, if necessary, what actions would be needed to meet them³. These seven pollutants were PM₁₀, NO₂, SO₂, lead, carbon monoxide, benzene and 1,3 butadiene. An updated NAQS was produced in 2000, and this added ozone to the list of pollutants, however ozone is a national target pollutant which is not related to local air quality management and not part of the regulations.

³ ARUP (1999) Good practice guide Air Quality and Land Use Planning, RTP1

The NAQS, issued in 2000, sets air quality standards and objectives for these eight key air pollutants to be achieved between 2003 and 2008. An Addendum issued in 2003 also added a target for polycyclic aromatic hydrocarbons (PAHs) which like ozone is not a local air quality management pollutant. Local authorities are required to review and assess the NAQS (2000) objectives for the seven air pollutants together with the newer (more stringent objectives) for benzene and carbon monoxide prescribed in The Air Quality Limit Values (Scotland) Regulations 2003.3.6. There are a number of sources of advice and guidance on air quality and planning issues for local authorities including SPPs and PANs, and additional advice including the *Good practice guide on air quality and land use planning* prepared by ARUP Environmental for the Royal Town Planning Institute in 1999 and *Development Control: Planning for Air Quality*, published by the National Society for Clean Air and Environmental Protection in 2004 and a 2006 update.

Planning Policy and Advice

- 3.7. Scottish Planning Policy (SPP) 1 *The Planning System* (2002) makes specific reference to the role of integrated and sustainable transport to help improve air quality, address climate change and protect environmental resources from the damage caused by pollution. In particular it identifies ways in which the planning system can encourage more sustainable travel patterns:

SPP1, Paragraph 20, The planning system and integrated transport:

- allocating land for development and selecting priority areas for regeneration to maximise the scope for access by foot, cycle and public transport;
- promoting an efficient transport network for the movement of freight and goods distribution, including where possible use of rail and water;
- providing direct and safe access to local facilities by a choice of transport modes;
- supporting mixed use, increased tenure choice and local service provision;
- ensuring that the layout and design of development gives priority to walking and cycling where appropriate;
- identifying priorities for investment in transport infrastructure and safeguarding land for longer term possibilities; and
- relating the level of car parking to the location and type of development through maximum parking standards.

- 3.8. SPP17 *Planning for Transport* (2005) promotes an integrated approach to land use planning, economic development, transport and the environment, in order to meet Government commitments and targets on greenhouse gases and local air quality.
- 3.9. SPP 4: *Planning for Minerals* (2006) includes a section on dust and air quality and the health concerns associated. Further reference is made to the need to assess the impacts of proposals against the objectives in the Air Quality Strategy for England, Scotland, Wales and Northern Ireland. The assessment of the impacts of dust from minerals sites should also make use of information collected by local authorities in undertaking their responsibilities for LAQM. The SPP also refers to the Scottish

Executive Air Quality and Planning Guidance and the National Society for Clean Air's planning guidance on LAQM. There is similar guidance in SPP 16: *Opencast Coal* (2005) which states that planning authorities should have regard to the environmental acceptability of likely dust emissions including the cumulative impact at residential properties and on other sensitive uses.

- 3.10. Planning Advice Note (PAN) 51 (Revised 2006) *Planning, Environmental Protection and Regulation* (Revised 2006) provides detailed advice on the role of the planning system in relation to air quality issues. This includes the role of structure plans, local plans and development management. This advice is discussed in more detail in the individual sections reviewing these findings.
- 3.11. SPP2 *Economic Development* (2002) in paragraph 51 states that; 'In making provision for economic development and considering proposals, planning authorities should seek to minimise adverse effects on the natural and built heritage, consistent with national planning policies in SPPs/NPPGs'. PAN57: *Transport and Planning* (2004) supports the integration of planning and transport and achieving sustainable travel choices
- 3.12. The consultation identified that the National Society for Clean Air (NSCA) (2004) *Development Control: Planning for Air Quality Guidance from NSCA on dealing with air quality concerns within the development control process* is a frequently used reference document. It covers:
 - a method for assessing the significances of the impacts of development proposals in terms of air quality.
 - clarification as to when air quality constitutes a material consideration and the factors which will influence the weight given to air quality as a material consideration in deciding an application;
 - where an air quality assessment is required and what this should contain;
 - mitigation measures for minimising the impact of a development.
- 3.13. It recognises that measures to address air quality impacts may create conflict, whereby re-routing traffic around a polluted area may increase pollution concentrations in another location.
- 3.14. The guidance stresses the importance of ensuring that air quality considerations are properly addressed by the appropriate personnel at the appropriate time and that there is a need for close working between environmental health officers and planners. 'The value of effective inter-departmental (intersectional, etc.) communication, co-operation and information exchange cannot be over-stated.'
- 3.15. The issue of considering cumulative impacts of development proposals is raised in the guidance. The consideration of each planning application on its own merits within the policy framework presents difficulties for addressing the issue of a series of low polluting developments which will cumulatively have a significant impact on air quality.
- 3.16. Scottish Executive (2004) *Air Quality and Land Use Planning Guidance* is a short document which sets out an overview of air quality and planning issues. It refers to the relevant national planning policy guidance documents and recommends that local authorities should consider developing supplementary planning guidance or protocols. It provides summary information on the role of the land use planning

system in supporting air quality objectives, the role of air quality and EIA and outline guidance on circumstances when air quality is likely to be particularly significant as a material consideration.

Development Plan Review

- 3.17. The seven pollutants included in the air quality review and assessment process required by the NAQS are associated with various different sources. These sources include⁴:
- road transport (including traffic generating development);
 - boilers;
 - power generation;
 - metal processing industries;
 - paper production processing;
 - petrochemical industry (e.g. oil and gas processing);
 - cement production, brick and tile works;
 - organic chemical industry;
 - inorganic chemical industry;
 - waste incineration.
- 3.18. Some of these categories fall under the Pollution Prevention and Control regulations⁵ which control pollution from certain industrial activities, however the main impact on air quality from other types of development is road transport.
- 3.19. A review of all Scottish structure plans adopted or emerging since 2001 was undertaken. This provides a comparison of the different policy approaches to air quality and planning. In Scotland Planning Advice Note 51 (Revised 2006) *Planning, Environmental Protection and Regulation* identifies the role of structure plans in planning for air quality.

Planning Advice Note 51 (Revised 2006) *Planning, Environmental Protection and Regulation*

Paragraph 34:

Structure plans have to reconcile the requirement for development with the protection of the environment at the strategic level. PAN51 recognises that their interaction with air quality may typically raise strategic issues and in particular that issues which may give rise to concern in specific instances may include areas where existing concentrations of activity such as industrial or petrochemical plants have a significant influence on the nature, scale and location of future development or redevelopment.

⁴ ARUP (1999) Good Practice Guide Air Quality and Planning, RTP1

⁵ The Pollution Prevention and Control (Scotland) Regulations 2000

- 3.20. The structure plan review identified references to air quality in policies and supporting text, (full details of policy and text references are provided in Annex 1).

Structure Plan Review Scotland

- 3.21. The review of Scottish structure plan references to air quality issues identified a number of different approaches:

- stand alone air quality policy;
- sustainable development/strategic development policies;
- transport specific policy with reference to air quality;
- waste specific policy with reference to air quality;
- mineral specific policy with reference to air quality;
- no policy references to air quality or air quality in the context of environmental protection.

- 3.22. Falkirk Council Structure Plan 2002 is the only structure plan reviewed with a specific policy on air quality. This makes a commitment to improving local air quality and the consideration of air quality standards in selecting locations for new development, assessing planning applications and addressing transport issues. The policy is as follows:

Policy ENV.14 Air Quality, 'The Council will contribute to the improvement of local air quality through the development and implementation of the Structure Plan Strategy including: consideration of air quality standards in selecting locations for new development and in assessing development applications; reducing the need to travel through protecting the viability of individual settlements and shopping centres; and in promoting public transport and an integrated transport system.'

- 3.23. The supporting text makes a number of references to the link between traffic and air quality and the location of new development and identifies air quality as a monitoring indicator. The text notes that pollution from vehicular traffic is a significant factor in influencing local air quality; other references include the impact of traffic on the achievement of the Council's air quality targets and the need to address transport issues through the provision of park and ride facilities.
- 3.24. The Orkney Structure Plan (2001) has a policy on air and water resources which seeks to safeguard these from developments which would have an adverse effect on their quality. The plan notes that the first air quality review carried out in 1999 concluded that Orkney as a whole does not suffer from any significant form of localised air pollution, but recognises the role of the plan in protecting and where possible enhancing the quality of air and water resources by resisting developments which are likely to result in damage.
- 3.25. A number of structure plans have strategic policies which address air quality issues. Both Argyll and Bute (2002) and the Western Isles (2003) include air quality as an issue to be taken into consideration when assessing development proposals. The supporting text also recognises that development should not have an undue adverse effect on air quality.

- 3.26. The issue of air quality is listed as one of the strategic planning objectives in the Perth and Kinross Structure Plan (2003) and air quality is identified as an indicator for a number of the structure plan themes including *A Healthy and safe Environment, Urban Environmental Quality* and *Resource Management*.
- 3.27. Fife Structure Plan (2002) Policy T1: *Transport and Development* states that one of the criteria against which development proposals will be supported in principle includes those that do not exacerbate a recorded air pollution problem identified in Local Air Quality Strategies. The plan makes reference to waste management as a potential source of air pollution. The Finalised Fife Structure Plan 2006-2026 (2005) outlines a commitment in the development strategy, *'To maintain, protect and enhance, where possible, Fife's natural heritage, built and historic environment, water resources and air quality'*. The plan also recognises the link between energy generation and air quality. Similar to the previous plan, reference is made to the potential role of waste management activities as a source of air pollution.
- 3.28. The Glasgow and Clyde Valley Joint Structure Plan (2002) makes a number of references to air quality in its strategic policies. This includes assessment of departures from the development plan, managing travel demands in order to improve air quality and identifies that uncommitted transport schemes should be assessed in terms of their environmental impact, in particular air quality. The supporting text identifies that the regulation and use of land is a component in air quality management, and that traffic is the main source of many significant pollutants, particularly in towns and cities. The Structure Plan will help to improve air quality standards through the management of demand for travel. Reference is also made to tree planting through the development of the Green Network and implementation of the Indicative Forestry Strategy will also act as a carbon sink. The need to have regard to the impact on air quality is also a requirement of Strategic Policy 9B (assessment of development proposals). Glasgow and Clyde Valley Joint Structure Plan (2006) Third Alteration to the 2000 Plan sets out additional criteria which have been added to Policy 9 to reflect emerging planning requirements. This includes the need for new development to give greater weight to the impact on air quality.
- 3.29. The Aberdeen and Aberdeenshire Structure Plan (2001) makes a specific reference to air quality in relation to the safeguarding of land for the development of transport infrastructure and states that development proposals that result in a breach of National Air Quality Standards will not be permitted. Further references in the supporting text refer to the need for; *'Policies and proposals to take account of the implications of transport infrastructure on the natural and built environment,'* and this identifies air quality impacts as one of the environmental issues to be addressed. The supporting text makes additional reference to vehicle exhaust emissions and their impact on air quality. The plan supports the adoption of an integrated package of transport measures to address some of the problems associated with transport (including air pollution).
- 3.30. The Clackmannanshire and Stirling Structure Plan 2002 Policy TR1 establishes an overall policy framework for an integrated approach to land use and transport, and seeks to *reduce environmental impact through appropriate monitoring and management of air quality, noise pollution and congestion*. The approach set out by this policy supports an integrated approach to transport planning and land use. The supporting text makes further reference to the framework provided by the structure plan for other strategies and plans, including an air pollution strategy. The plan makes further reference to its role in encouraging a wider choice of transport due to

the increasing levels of car ownership in the plan area and the problems of traffic congestion and air pollution which this brings.

- 3.31. Waste management is a key area with potential air quality impacts. In the Dundee & Angus Structure Plan 2001-2016 the only policy reference to air quality issues is regarding the avoidance of air quality issues in relation to development proposals for waste management facilities. In addition, the policy makes reference to the requirement for an Environmental Statement or Transport Assessment where appropriate. The supporting text in the plan refers to integrated land use and transport to improve accessibility and with a view to maintaining air quality. The supporting text also makes reference to air quality monitoring and the relationship of the Structure plan with Dundee City Council (2000) Air Quality Review and Assessment Stage 2. One of the Guiding Principles from the monitoring and review checklist in page 61 (chapter 11) is to 'Integrate land use and transport to improve accessibility for everyone between home, work, leisure and services with a view to monitoring air quality and reducing pollution and unnecessary travel'. The Plan Monitoring Indicator developed for that Guiding Principle in the same checklist (page 62) is "Continuous air Quality Monitoring".
- 3.32. Perth and Kinross Structure Plan (2003) has an environmental resources policy which includes the need to avoid air pollution associated with waste management. Fife Finalised Structure Plan also identifies that waste can be a potential source of air pollution. Although the air quality impact of waste is an important consideration, air quality policies should also consider air quality in the context of wider topic areas such as transport and sustainable development.
- 3.33. Falkirk Structure Plan also includes Policy ENV8 which sets out general principles for mineral working which includes avoiding pollution to water and air. The only Minerals Subject Plan which was reviewed was the Fife Minerals Subject Local Plan (2004). Air quality issues relating to minerals developments are likely to relate to issues such as dust, which is not one of the seven pollutants identified in the air quality review and assessment process. However vehicle movements associated with mineral extraction will contribute to these pollutants.
- 3.34. The Scottish Borders Structure Plan (2002) is the only structure plan reviewed which makes no reference to air quality either in policies or supporting text. Edinburgh and the Lothians Structure Plan 2015 makes no policy references to air quality issues however the supporting text refers to sustainable development patterns and the plan transport policies support sustainable transport, taking NPPG17 into account and complementing the Councils' Local Transport Strategies and the SESTRAN Interim Regional Transport Strategy. This makes specific reference to strike a balance between objectives relating to air quality, climate change and sustainability, as well as economic and social inclusion objectives. In doing this, they set out to tackle the problem of poor air quality at its root by assisting in reducing the need to travel by car and increasing the attractiveness of more sustainable modes of transport.

Structure Plan Review England

- 3.35. The review of the sample of English Structure plan policy references to air quality issues identified the following categories of approach:
 - transport;
 - assessment of major developments;

- waste;
 - minerals;
 - integrated land use planning and sustainable development.
- 3.36. The Oxfordshire Structure Plan 2016 (2005) provides policy coverage in relation to transport. Policy T8 states that *'proposals for development should be permitted only if they provide adequate access and mitigation of adverse transport impacts*. The supporting text refers to the Local Transport Plan (LTP) and its relevance to transport issues, and one of the objectives of the LTP is better air quality. The supporting text also discusses the role of travel plans, which reduce the release of greenhouse gases and reduce the harm to air quality associated with car travel. The plan discusses that where air pollution from traffic remains a problem, traffic orders may be used to limit access, with exemptions for vehicles using alternative fuels that have a low impact on air quality. It should be noted that Scottish legislation restricts the use of traffic orders to address air pollution from traffic.
- 3.37. Northumberland County and National Park Joint Structure Plan- Adopted Policies (2005) Policy M2 refer to major developments and that *'the Local Planning Authority will only permit Major Developments where the benefits clearly outweigh any potential environmental damage'*. This includes reference to undertaking an Environmental Assessment and that developments will be assessed in terms of their impact on air quality and the transport network.
- 3.38. The Lincolnshire Structure Plan (from 2001 to 2021) (2006) only makes reference to air quality in its policies on waste management facilities and waste disposal.
- 3.39. Bath and North east Somerset, Bristol, North Somerset and South Gloucestershire Joint Replacement Structure Plan (2002) makes policy reference to air quality both in relation to mineral working and new transport facilities which will be assessed in terms of environmental impact including effects on air quality. The structure plan strategy refers to sustainable development and the conservation of natural resources, including air quality and to shape new development patterns in a way which minimises the need to travel." The plan makes several references to traffic issues and the rise in traffic volumes and the impact of this on air quality. Traffic management measures should give priority to improving highway safety and air quality, discouraging car use, reducing traffic/ environmental conflicts and supporting the public transport, cycling and walking policies of the Plan. Air pollution is used as one of the indicators for measuring the guiding principles of the structure plan.
- 3.40. The London Plan: Spatial Development Strategy for Greater London (2004) has a specific policy on improving air quality. This includes reference to integrating land use and transport policy, and reducing the need to travel. Further policies set out strategic priorities for Central London which promote sustainable development and environmental improvement. There are many references to air quality in the supporting text of the London plan. The Mayor's vision makes reference to the transport strategy and air quality strategy which seek to safeguard the environment and enhance quality of life. The improvement of air quality is listed as one of the ways of improving environmental policy. The supporting text discusses air quality in the context of sustainable development and the role of air quality in supporting good health. Also in support of sustainable development the plan notes that more intensive development will require strategies to minimise noise and air pollution. The plan makes reference to the Mayor's Air Quality Strategy which seeks to minimise the

emissions of key pollutants and to reduce concentrations to levels at which no, or minimal, effects on human health are likely to occur. The Mayor's strategy provides guidelines on policies for UDPs and Supplementary Planning Guidance and refers to applicable documents. The plan states that *'Boroughs should ensure their UDPs include policies that seek to reduce levels of pollutants referred to in the government's National Air Quality Strategy having regard to the Mayor's Air Quality Strategy, and taking account of the findings of Air Quality Review and Assessments, in particular where Air Quality Management Areas (AQMAs) have been designated.'* Reference is also made to the recently completed study into the feasibility of establishing a Low Emission Zone in London in order to deliver air quality improvements.

Conclusions of Structure Plan Review

- 3.41. The findings from the review of structure plan policies and supporting text in both Scotland and England suggests that there is no uniform approach to air quality policy and the coverage of air quality issues within the structure plans. Rather, planning authorities adopt a very varied approach.
- 3.42. The majority of structure plans which refer to air quality make broad commitments to improving air quality or avoiding adverse impacts. There are relatively few examples of where air quality impacts are identified as a criteria against which to assess the impact of developments (Glasgow and Clyde Valley Joint Structure Plan, 2000), or as a strategic planning objective (Perth and Kinross Structure Plan, 2003).
- 3.43. The structure plans do not specifically refer to the role of local plans in addressing air quality issues as is sometimes the case in other policy areas, e.g. Edinburgh and Lothian's Structure Plan 2006 identifies that due to the local and variable nature of need for affordable housing, the local plans should include policies requiring the appropriate provision of affordable housing and setting out the planning mechanisms by which this will be achieved.
- 3.44. The five English structure plans reviewed, which all include local authority areas with AQMAs, demonstrate an inconsistent approach to air quality issues. The London Plan: Spatial Development Strategy for Greater London (2004) has the most comprehensive approach to air quality issues with policies relating to integrated land use planning, sustainable development and transport issues. The remaining four structure plans cover air quality issues in relation to key sectoral issues.
- 3.45. The piecemeal sectoral approach to air quality is particularly illustrated by the Northumberland Structure plan and the Lincolnshire Structure Plan where air quality is only discussed in relation to major developments and waste management facilities respectively. The Oxfordshire Structure Plan and the Bath and North east Somerset, Bristol, North Somerset and South Gloucestershire Joint Replacement Structure Plan (2002) take a more proactive approach by raising air quality issues in relation to transport, which is one of the major sources of air pollution.
- 3.46. Nearly all of the Scottish Structure Plans included in the review are from the earlier part of the five year review period, and therefore their coverage of air quality issues is not surprisingly less well developed than for more recent plans. However, even the more recent examples of structure plans from England do not provide a consistent or comprehensive approach. Although some of the Scottish structure plans address air quality issues in relation to strategic issues such as sustainable development and transport, the majority either relate it to key sectors such as waste and minerals, or environmental resources.

- 3.47. Air quality considerations are closely integrated with sustainable transport and sustainable development, and at the very least air quality considerations need to be integrated with such strategic policy drivers. The lack of a consistent policy framework for air quality at a structure plan level is, in turn, reflected in inconsistent coverage at local plan level.

Local Plan Review Scotland

- 3.48. All local plans which were adopted in the last five years and any draft or consultation documents have been reviewed for references to air quality issues.
- 3.49. Planning Advice Note 51 Planning, Environmental Protection and Regulation (Revised 2006) identifies the role of local plans in environmental protection:

Planning Advice Note 51 Planning, Environmental Protection and Regulation (Revised 2006)

Paragraph 35: If a structure plan has identified a general location where there are special environmental protection concerns, these should be set out in the local plan. The local plan should explain any implications and as appropriate identify the areas on the proposals map. PAN51 states that the most suitable way to do this may be by defining areas within which particular consultation arrangements apply.

Paragraph 36. During local plan preparation it is good practice to work with the environmental protection bodies so that the planning implications of the environmental protection regimes can be taken into account. Local plans may also need to refer to particular environmental protection regimes if they are likely to impose constraints or limitations on development or particular uses of land in a specific area. This may take the form of a policy or the identification of an area where consultation on specified types of planning application is required, for example with SEPA. In some areas the local plan may have to acknowledge that because certain capacity or environmental thresholds have been or are likely to be reached, further development is unlikely to be permitted unless it incorporates measures to address the environmental constraints.

- 3.50. The Edinburgh City Local Plan Consultation Draft (2006) includes a specific policy protecting Air, Water and Soil quality which states that planning permission will only be granted for development where there will be no significant adverse effects on quality. The supporting text states that the planning system has a role to play in the protection of air quality, by ensuring that development does not adversely affect air quality in any Air Quality Management Area that has been declared. The North East Edinburgh Local Plan Alteration (2004) makes no references to air quality. The South East Edinburgh Local Plan (2005) Policy DQ 1 – Environmental Impact states that permission will not be given to proposals which are likely to cause unacceptable harm to air, soil or water quality or biodiversity. Supporting text discusses air pollution in the context of congestion, health impacts, and global warming. Rural West Edinburgh Local Plan (2006) has a specific policy on Local Air Quality Management (Policy E2) stating that; *'Development proposals, especially those affecting Air Quality Management Areas (AQMAs), should not impede the achievement of National Air Quality Objectives. Applications for developments that would significantly contribute to air pollution should be accompanied by an assessment of the likely dispersion of pollutants'*. Further policy references are made to air quality in relation to

development in the Green Belt and Countryside, mineral extraction, business and industrial development and the transport impact of development proposals. The supporting text makes numerous references to air quality in particular in relation to transport and traffic generation.

- 3.51. The East Lothian Local Plan (2001) makes several references to air quality in relation to transport in the supporting text, but by contrast the Finalised East Lothian Local Plan 2005 only makes reference in the supporting text to air quality in relation to mineral extraction. Midlothian District Local Plan 2003 also only makes policy reference to air quality in relation to areas of search for surface mineral extraction.
- 3.52. The Glasgow City Plan (2003) makes policy reference to air quality in relation to low amenity industrial uses. Glasgow City Plan 2 (Consultative Draft Plan) states that '*The City Council will consider whether a new policy is required to address the relationship between new development and air quality*'. The supporting text addresses both the sources and impacts of climate change, and improving air quality and biodiversity, as some of the key components in delivering sustainable development and also recognises the impact on health.
- 3.53. East Dunbartonshire Local Plan (2005) Policy DQ3 *Assessment of impact* states that where development proposals are likely to have a significant impact on the natural, historic or community environment the Council may require developers to submit an Air Quality Assessment. Supporting text references are made in relation to traffic congestion and air pollution and contaminated land and air pollution.
- 3.54. East Renfrewshire Local Plan (2003) makes no policy or supporting text references to air quality. The East Renfrewshire Replacement Local Plan Consultation Document (2006) mentions the issue of air pollution in relation to sustainable development, but makes no clear commitment as to how this will be addressed.
- 3.55. South Lanarkshire Minerals Plan (2002), Lower Clydesdale Local Plan (2005), Cambuslang/Rutherglen Local Plan (2002) make no reference to air quality either in policy or supporting text.
- 3.56. In West Dunbartonshire, the Clydebank Local Plan (2004) states that proposals for renewable energy documents will be considered against the key goals of the Plan and Policy GD1 *Development Control*, and should have regard to air emission and odour.
- 3.57. The Renfrewshire Local Plan (2005) makes reference to air quality in policy in relation to non residential developments, new residential developments, mineral extraction and waste disposal facilities. The supporting text includes a section on Air Quality which refers to the National Air Quality Strategy and National planning guidance.
- 3.58. The Clackmannanshire Local Plan (2004) makes policy reference to air quality in relation to minerals development and the supporting text supports joint working with other agencies in relation to contaminated land and air pollution.
- 3.59. The Dundee Local Plan Review 2005 discusses air quality in Policy 27 Ancillary Services within Economic Development Areas. This policy states that depending on the nature of the operation, air quality studies may be required on submission of an application. The policy on waste management facilities also seeks to avoid air pollution. The supporting text also discusses regulating car use in relation to air pollution concerns, '*In association with the Structure Plan and Local Transport Strategy it is the strategy of the local plan to encourage an improvement of air quality*

through the promotion of appropriate transport choice and promotion of sustainable transport modes.'

- 3.60. Falkirk Local Plan (Adopted June 2000 (incorporating first alteration September 2002) and Polmont & District Local Plan (2001) makes no policy reference to air quality. The plans discuss in the supporting text that the conservation of natural resources such as air is fundamental to sustainable development. Falkirk Council Local Plan Finalised Draft (2005) Policy ST7 *Transport Assessments* states that Falkirk Council will require transport assessments of developments where the impact of that development on the transport network is considered likely to require mitigation. Transport assessments will include travel plans and where necessary, safety audits of proposed mitigation measures and assessment of the likely impacts on air quality as a result of the proposed development. In relation to the road network the plan notes the high levels of congestion, community severance and air quality in relation to a number of key road routes.
- 3.61. Coverage of air quality issues in the Ayrshire local plans includes the Isle of Arran Local Plan (2005), which discusses the sustainable allocation of land and reducing the need to travel, but identifies that traffic congestion or air pollution are unlikely to become significant problems. North Ayrshire (excluding Isle of Arran) Local Plan (2002), discusses the integration of transport with land use planning to minimise problems of traffic congestion and air pollution. The East Ayrshire Opencast Coal Subject Plan (2003) discusses air pollution in the context of dust reduction on open cast coal sites. Both planning authorities and the industry should as a minimum, adopt the assessment framework recommended in the research (Department of Epidemiology and Public Health at the University of Newcastle upon Tyne (1999) *Do particulates from opencast coal mining impair children's respiratory health?* The Stationery Office) in drawing up and considering proposals for new sites or extensions or modifications to existing sites and make use of information gathered by Local Authorities in undertaking the responsibilities for Local Air Quality Management.
- 3.62. East Ayrshire Local Plan (2003) Policy ENV20 states that the Council will ensure, through the introduction of appropriate conditions and s.75 agreement that any new development has minimum adverse effects on the physical environment and the amenity of an area as a result of air pollution. The supporting text refers back to structure plan which *is not supportive of new development which exposes large numbers of people to unacceptable levels of air pollution*. South Ayrshire Finalised Local Plan (2005) makes no reference to air quality.
- 3.63. None of the Fife local plans make policy reference to air quality and the only supporting text references to air quality relate to the positive role of trees, woodlands and hedgerows.
- 3.64. In Highland, the Caithness Local Plan (2002) makes no reference to air quality. The Inverness Local Plan (2006) discusses that monitoring of air and water quality is essential to detect pollution events and to pinpoint remedial action. Traffic restrictions in the central area of the city will greatly reduce the concentrations of noxious fumes that can arise in these streets at present. The Wester Ross Local Plan (2006) includes Policy G2 *Design for sustainability* which states that proposed developments will be assessed on the extent to which they impact on air quality (amongst other environmental considerations).
- 3.65. Plana Ionadail Deireannach nan Eilean Siar (Finalised Western Isles Local Plan) (2005) makes no reference to air quality issues, but the Broadbay Local Plan (2003)

includes a general policy on improving the quality of the environment. This encourages existing businesses to reduce their impact on the environment including specific reference to air emissions and congestion due to vehicular movements.

- 3.66. The Orkney Local Plan (2005) covers air quality issues in policies relating to development proposals outwith the Environmental Impact Assessment (Scotland) Regulations 1999, mineral planning applications and agricultural and non domestic rural buildings.
- 3.67. Perhaps surprisingly for the length of time that the AQMA has been in place in Aberdeen City (since 2001) the main policy reference to air quality of the Finalised Aberdeen Local Plan (2004) is a policy on the effect of waste management facilities on air quality. The plan also supports the role of the Western Peripheral Route which will link several park and ride sites around the edge of the city. This highlights that the problems associated with the Air Quality Management Area (Nitrogen Dioxide) Order 2001 could also potentially be reduced by removing much of the through traffic from the area affected by the order.
- 3.68. The Perth Area / Central Area Draft Local Plan (2004) includes Policy 60, which aims to protect air quality; *'Development that would give rise to a significant deterioration in air quality should not be located where that deterioration would adversely affect other land uses and amenity in the vicinity.'*

Local Plan Review England

- 3.69. All five of the English local plans included in the review were adopted in 2006 and therefore present a reflection of the most up to date policy approach to air quality issues.
- 3.70. South Lakeland Local Plan Alteration 2006 makes few references to air quality or air pollution, however transport policies cover the environmental impact of transport infrastructure and traffic management issues. Traffic management is a key consideration in South Lakeland due to its proximity to the Lake District National Park and the high levels of traffic which are generated by visitors. The supporting text refers to air quality in relation to sustainable development and traffic levels. Particular effort has been made to reduce traffic impacts in Kendal.
- 3.71. The introduction to the South Oxfordshire Local Plan 2011 (2006) refers to the sustainable location of development in order to assist in reducing air pollution in line with the strategy set out in the revised RPG9: Regional Planning Guidance for the South East (2001). Policy EP1 identifies that proposals which would have an adverse effect on people or the atmosphere will not be permitted, unless effective mitigation measures will be implemented. In addition, development will not be permitted near to an existing or proposed polluting use, unless effective mitigation measures will be implemented to ensure that there would be no adverse effect on the health and amenity of future occupiers. Policy G1 provides a commitment to provide development to meet the needs of the district in a sustainable manner. Under the chapter on protecting and enhancing the natural and built environment, the plan identifies that the range of policies within this section of the plan seek to protect and improve the quality of the air environment.
- 3.72. The Adopted City of Derby Local Plan review (2006) addresses air quality in Policy GD5 *Amenity* which identifies that it will consider the impact of developments which includes air pollution and traffic generation. The plan also includes policy E12 *Pollution* which seeks to avoid development which would generate pollutants

unacceptably detrimental to the health and amenity of users of the development or those nearby. The plan also includes policy T1 *Transport Implications of New Development* which states that, *'In considering applications for planning permission, the City Council will seek to ensure that the proposed development will not result in increased traffic congestion, have a detrimental effect on the local environment or lead to a reduction in road safety.'* The policy requests that transport Travel Plans should be submitted alongside planning applications that are likely to have significant transport implications, and where they are within or near to air quality management areas.

- 3.73. The supporting text in the Derby local plan makes reference to the need to respond to climate change and the need to reduce air pollution through sustainable development. The plan strategy makes several references to the need to reduce air pollution and promote sustainable forms of development and improve air quality. The plan also refers to its AQMAs and the supplementary planning guidance which provides guidance for applicants for development of land within or near to the declared AQMAs in the City. The section of the plan on transport makes numerous references to air quality and the AQMAs regarding air pollution and congestion. This includes the preparation of a travel plan, the justification for this is that reducing traffic congestion will help the Council to meet Government targets for reducing air pollution as well as bring other economic and environmental benefits.
- 3.74. The Portsmouth City Local Plan 2001- 2011 (2006) includes Policy DC5 *Amenity and Pollution* which identifies that, *New development will only be permitted where:*
(i) it would not cause unacceptable levels of air, noise, vibration, light, water or other pollution or otherwise cause unacceptable detrimental effects to the amenity of adjoining or nearby occupiers;
(ii) the amenity of future occupiers or users of the proposed development is not adversely affected by existing or projected levels of air, noise, vibration, light, water or other pollution.
- 3.75. The plan makes particular reference to the location of residential development in light of the above. The supporting text explains that the policy is intended to control both the potential adverse impacts which could arise from a development itself and, conversely, the adverse effects which could occur as a result of the inappropriate location of new development close to existing or projected sources of pollution or other amenity impacts. The plan also refers to the Local Transport Plan and stresses the need for land use and transport planning to achieve more sustainable patterns of development to avoid adverse impacts on air quality. The plan recognises the need to reduce congestion and air pollution from traffic but also to support investment in the local economy. The plan notes the significant role of road traffic as a major source of air pollution, alongside the industrial processes. It is important to note, however that there are different powers relating to traffic orders in England than Scotland.
- 3.76. The plan notes that the council's ongoing review and assessment of air quality has concluded that, given the current pattern of land and projected changes in traffic flow the Government's national air quality objectives are not expected to be exceeded. Whilst recognising that the NAQS seeks to reduce public exposure to air pollution and improve air quality, the plan itself does not address the issue of an overall improvement in air quality.
- 3.77. The whole of the London Borough of Camden is declared as an Air Quality Management Area (AQMA). The London Borough of Camden Replacement Unitary Development Plan (2006) states that the Council will take into account the AQMA and

the Air Quality Action Plan in assessing development proposals. Coverage of air quality issues includes a specific air quality policy, SD9A - Air quality; *'Where the Council considers that development could potentially cause significant harm to air quality, applicants will be required to submit an air quality assessment. The Council will not grant planning permission for development that would significantly harm air quality, unless mitigation measures are adopted to reduce the impact to acceptable levels.'*

- 3.78. The policy on waste management facilities also refers to air quality. The plan's sustainable development policies on conserving energy and resources are noted as contributing to the Community Strategy aims of slowing down climate change and improving air quality.
- 3.79. The supporting text refers to the Greater London Authority's 'Cleaning London's Air: The Mayor's Air Quality Strategy', (2002) and the supplementary planning guidance which sets out where an air quality assessment will be required. The supporting text makes further references to transport planning and air quality. It must be recognised that the role of reducing transport impacts of development is much more achievable within the London boroughs due to the high levels of public transport provision. The plan includes a policy to promote car free housing as a mechanism for reducing the use of the private car. The plan states that much of the Borough has, or by 2016 will have, sufficient access to transport and facilities to provide for car free lifestyles.

Conclusions of Local Plan Review

- 3.80. The findings of the local plan review are similar to those for the structure plans. There is varied coverage in the detail and extent of air quality issues within the local plans, with some examples of plan policies and text making wider links to the impact of poor air quality on health, climate change and sustainable development. Other plans still have very limited coverage of air quality issues, or only discuss these in relation to sectors such as minerals and waste, similar to the approach in the Structure plans. The somewhat surprising finding is that some of the local plans in areas where air quality issues are least likely to be a significant issue have policies which protect air quality, when local plans for much more urbanised areas do not.

Plan Review Conclusions

- 3.81. There are some examples of development plans with specific policies on air quality; whilst other plans include the protection of air quality alongside protection of other natural resources such as water and soil. In contrast with other plan policies, such as those protecting natural heritage, there appears to be a gap in plan references to their role in contributing to an *enhancement* of air quality.
- Only Camden Local Plan, Falkirk Structure Plan and the Rural West Edinburgh Local Plan provide examples of stand alone air quality policies. Of those, only the Falkirk Structure Plan policy on air quality makes reference to improving air quality, the two local plan policies only discuss air quality in terms of avoiding further decline in existing quality.
 - Some of the policies which cover air quality issues appear to lack 'teeth'. They may state that air quality implications of development will be assessed, but do not identify the parameters of when air quality or traffic impacts will be unacceptable. Where there is no supplementary planning guidance it does little to clarify the situation.

- The English plans with numerous AQMA have much more extensive coverage of air quality issues than the Scottish plans, and have a more joined up approach whereby air quality issues are discussed in relation to sustainable development, transport etc. To some extent the date of the plan correlates with the coverage of air quality issues, with the more recent plans providing more comprehensive policies and text references, although this is not universal.

Supplementary planning guidance

- 3.82. A wider search of supplementary planning guidance on air quality issues was undertaken. This identified eight examples in England and includes the overarching guidance produced for the London councils (London Councils Air Quality and Planning Guidance Revised version- January 2007 Written by: The London Air Pollution Planning and the Local Environment (APPLE) working group), and five of the examples of supplementary planning guidance are from London boroughs:
- Royal Borough of Kensington and Chelsea (2003);
 - London Borough of Hillingdon (2002);
 - London Borough of Haringey (2003);
 - London Borough of Ealing (undated);
 - London Borough of Croydon (2004);
 - City of Derby (2003);
 - City of Portsmouth (2006).
- 3.83. The only example of an additional planning guidance document on air quality is provided by Dundee, however this is not in the form of Supplementary Planning Guidance, but is a Planning Policy Advice Note. Aberdeen has SPG on transport which largely covers air quality issues, however this document is not widely available or publicised. North Lanarkshire and East Dunbartonshire identified that they were in the process of developing SPG for air quality but draft documents are not yet available.
- 3.84. The justification for preparing the SPG was identified in some documents and this included:
- response to applicants seeking guidance on carrying out AQIA (London Councils);
 - intended to raise the profile of improving air quality (Royal Borough of Kensington and Chelsea and Derby);
 - guidance on the way in which air quality and air pollution issues will be dealt with in the planning system (Portsmouth);
 - clarifies and amplifies plan policies (Ealing);
 - technical guidance for air quality professionals (Croydon).
- 3.85. All of the SPGs reviewed identify the circumstances in which an air quality assessment (AQA) is likely to be required. Further details of the criteria identified for

assessing significance of impacts and the requirement for AQA in SPG is provided in Appendix 2.

- 3.86. There is variation in the scope of the SPG documents. In addition to identifying the types of development or circumstances in which an AQA is likely to be required, several of the documents provide advice on the process of carrying out an AQA, and even guidance on the circumstances when conditions and s.106 agreements will be used and how to use them. All of the documents except for Haringey and the Royal Borough of Kensington and Chelsea provide some guidance on the role of mitigation. In relation to the cumulative impacts of development on air quality, all of the documents except for that produced by Royal Borough of Kensington and Chelsea make some reference, however there is generally not extensive coverage of this issue. It is noted that the 2006 updated NSCA guidance provides more detailed advice on these issues.
- 3.87. The production of SPG by local planning authorities is in response to a need to provide clearer guidance on how and when air quality issues are taken into consideration in planning applications both for developers and planners. Further research would be required to identify the benefits of the SPG in ensuring developers and planners understand the circumstances in which air quality issues will be taken into consideration. However, in light of the findings of the development plan review and the consultation with environmental health officers and planners, additional guidance such as that provided by SPG would appear to be beneficial. In the first instance this would raise the profile of air quality in planning and secondly it provides a means to set out the parameters for when air quality issues will be considered.
- 3.88. However in the appeal review a reporter made reference to the Hillingdon SPG Air Quality (2002) but found that this document did not include sufficient information to inform their decision on air quality issues. This suggests that there may be scope to improve the quality of information provided in SPG to provide clear guidance for the decision making process:

The Council's SPG indicates that air quality impacts will be considered significant where air quality objectives are likely to be breached; if an area is close to an area where the air quality objective is likely to be breached it is maintained that the air quality impact would be significant if the development would cause a deterioration however small in the quality of the air in that area. That statement however gives no measurable guideline and taken to its extreme would mean that any slight increase in NO₂ concentration could weigh disproportionately in any assessment of the acceptability of development in air quality terms. Turning to Technical Guidance Note – Air Quality Assessments for Planning Applications this suggests that the effect of the proposed development upon air quality would not be regarded as significant. The exact nature of air quality on the locality will depend upon the means of access deemed appropriate by the local planning authority. It is not part of the Council's case to deny development of the site on air quality grounds notwithstanding its presence within an AQMA or its proximity to an area of exceedence.

(Appeal reference: APP/R5510/A/01/1077460)

DECISION REVIEW

- 3.89. The decision review provides information on the types of development for which air quality considerations have been an issue. Due to the difficulties with carrying out a

search of planning decisions where air quality issues have been raised, the findings from the review of development management are indicative, as the only comprehensive search facility was only available for planning appeal decisions.

Appeals

- 3.90. In Scotland within the last five years there have been four appeals which make reference to air quality. These are illustrated in Table 3.1 below:

Table 3.1 Summary of appeal results relating to air quality in Scotland

Local Authority and appeal reference number	Date	Development	Air Quality issues	Decision
Aberdeen P/PPA/100/183	29/7/02	Claim for expenses against the council in bringing a case to inquiry for the change of use of former fire station to a superstore	The reporter considered that the weight which the council attached to the refusal on noise and air pollution came close to the limits of reasonableness, but did not in any case cause the appellant unnecessary expense	No expenses awarded
East Ayrshire PPA/190/87	5/3/03	Change the use of a former market garden to a coach operator's parking facility	Noise and exhaust fumes would have an adverse environmental impact and the reporter considered that there was not sufficient scope to introduce mitigation measures	Dismissed
Renfrewshire P/PPA/350/220	3/8/04	Surface an area of vacant land as a car park	Planning permission was granted subject to three conditions. The disputed condition required the submission of a report in relation to Local Air Quality Management objectives for pollutants and was imposed in the interests of amenity. Concern that the proposed coach park development could lead to the need to designate an AQMA. It was necessary for the developer to demonstrate that the additional traffic generated as a result of the coach park would not result in the further deterioration of air quality. Reporter notes that while the general tenor of the structure plan is supportive of protecting air quality, it is of little direct relevance to a development of this scale, therefore air quality is not a material consideration	Allowed with amendment to wording of condition relating to air quality. Within two months from the date of this permission, details of the scope and methodology of an assessment of the impact on air quality resulting from the approved development shall be submitted to and approved in writing by the planning authority. Within 1 month from the receipt of written approval from the planning authority the assessment shall be submitted to that body for their information. (reason to ensure that air quality within the area is not adversely affected by the proposed

				coach park)
Falkirk P/PPA/240/104	18/02/03	Conditions imposed on a planning permission for an office building and aluminium sulphate plant	Conditions were imposed to enable the planning authority to monitor the effect the development has on the environmental amenity of the area.	Appeal allowed with removal of two conditions The first condition required a new application to be submitted after one year. The second condition related to the emissions, requiring monitoring information to be provided to the planning authority, although that information will already be supplied to SEPA.

- 3.91. The search was widened to include appeal decisions since the 1980s and this identified a further 10 appeals where air quality was an issue, which are summarised below:
- 1999 – traffic congestions and atmospheric pollution from housing development;
 - 1993 – fumes relating to open cast coal processing facilities;
 - 1991 – fumes from a car repair workshop;
 - 1988 – atmospheric pollution from a burning station for factory waste;
 - 1986 – air pollution from formaldehyde resin manufacturing;
 - 1986 – fumes from a coach park in a residential area;
 - 1986 – impact of fumes from nearby roads and railway on a change of use of residential housing to a residential home for the elderly;
 - 1986 – airborne pollution due to increased vehicle movements from the infill of demolition material in the greenbelt;
 - 1985 – fumes from a car repair workshop;
 - 1985 – traffic fumes from residential development.
- 3.92. Three of the examples of planning appeals from the last five years include reference to air quality issues associated with road vehicles, and one to emissions from an aluminium sulphate plant. The majority of the older appeal decisions also relate to air pollution caused by traffic, and only one of the examples addresses the issue of sensitive receptors to air quality issues.
- 3.93. The small number of appeals which identified air quality as an issue largely reflects the findings from the consultation with the planning authorities and the review of development management findings which identified the relatively low importance of air quality in planning decisions.
- 3.94. The review of appeals in England and Wales identified a larger number of appeals where air quality was a consideration than in Scotland. There are nine examples of appeals where air quality was actually one of the main considerations in deciding the appeal. In the majority of cases the role of air quality was a minor element of the case and issues such as a departure from the development plan or technical issues were the main deciding factors. Details relating to the cases where air quality was a main issue are set out in Table 3.2 below.
- 3.95. Only one of the nine appeals in the examples in Table 3.2 was dismissed on the grounds of air quality. In all other examples although air quality was identified as a major issue it was not deemed significant enough or there was insufficient supporting evidence in terms of plan policy or SPG guidance for air quality to be the deciding issue. When it came to making the final decision in the examples looked at there is frequently another issue in the case which carried greater weight than the air quality considerations. Although there were some examples of where the air quality issues gave additional weight or supported the decision to dismiss a case. In light of these findings, the appeals highlighted relatively few examples of air quality related

conditions. These relate to the provision of mechanical ventilation for residential development within an AQMA (Windsor, 2006) and a condition requiring that no gardens or amenity spaces are located within an AQMA (Berkshire, 2006).

- 3.96. The appeals provide examples of differing approaches to air quality considerations, for example in Wokingham, 2003 the inspector allowed flatted development within an AQMA without mention of how the issue of poor air quality could be mitigated. This contrasts greatly with the appeal in Greenwich, 2001 for the development of flats which was dismissed as the inspector did not believe the developer would provide adequate ventilation, even if this was required as a condition. This also suggests a lack of confidence in the planning authority enforcing the conditions. Although a number of examples identified the impact of allowing residential development in an area of poor air quality, none of the appeals considered raised the specific issue of sensitivity of receptors. In the example for Hillingdon, 2002 although air quality issues were identified the appeal was allowed as the SPG did not provide sufficient guidance to judge the significance of the impact of the development on air quality and the implications of this for residents.

Table 3.2 Summary of appeal results relating to air quality in England

Location and appeal reference number	Date	Development description	Air quality issues	Decision
Thame, Oxfordshire APP/Q3115/A/03/1111927	2003	Conversion of a redundant furnace room to accommodate a coated roadstone plant and ready mixed concrete plant with associated aggregate storage	<p>The impact of fumes associated with the development on residential amenity was identified as one of the main issues in the appeal.</p> <p>The reporter noted that the emissions emanating from the coated roadstone plant are controlled under the provisions of the Environmental Protection Act and that this would provide adequate protection in respect of air quality and pollution.</p>	Approved with conditions (not related to air quality)
Hafod, Swansea APP/B6855/A/05/1172562	2005	Residential development (flats) (outline permission)	<p>The site lies within a declared AQMA where air quality levels are poor and if the proposed flats were allowed an increased number of residents would be exposed to poor air quality. Secondly the proposed development would lead to increased traffic movements and a further deterioration of air quality along this part of Neath Road.</p> <p>The report considered that the Council has given inadequate attention to the traffic and pollution generated by the present business operations on the site. In the absence of detailed proposals it is difficult to assess the amount of traffic likely to result from the proposed flats.</p> <p>The impact of air quality on the health and amenity of future occupants of sensitive new development is also a material consideration. In this case it is not disputed that the proposed flats would increase the number of residents exposed to poor air quality.</p> <p>The AQMA was declared due to failure to meet the statutory target for NO₂ and despite an action plan is unlikely to be met for several years. It is anticipated that the target level for fine particles will not be met when target levels are reduced in the near future. It is not disputed that these high levels of pollution</p>	<p>Dismissed.</p> <p>Future occupants would be likely to experience an unacceptable standard of living as a result of noise from the railway line and poor air quality.</p>

Location and appeal reference number	Date	Development description	Air quality issues	Decision
			<p>are harmful to health. What is in dispute is the weight to be attributed to this.</p> <p>Structure Plan policy EQ10 presumes against residential development where the proximity of the existing development would pose an unacceptable risk to life or health. In this case, the highway network is the existing development but the question remains as to whether or not the poor air quality poses an unacceptable risk. The report cites guidance which advises a prospective developer carry out an air quality assessment which was not done in this case.</p> <p>The reporter concluded that much of the advice in relation to air quality is outside the development plan and the draft UDP and AQMA action plan do not provide guidance on the issue of resisting additional residential development in an area on account of poor air quality. Therefore the reporter decided to attribute limited weight to this. The reporter concluded that the air quality was not of such weight to warrant refusal on air quality grounds, but it serves to reinforce the conclusion on the issue of noise.</p>	
West Drayton, Middlesex APP/R5510/C/04/1155934-5	2005	Off air port car parking at Heathrow providing space for about 700 vehicles	<p>Air quality is identified as one of the main issues regarding the effect upon local air quality from traffic generated air pollution in terms of nitrogen dioxide levels.</p> <p>The main air quality issues include the effect of the proposal on the living conditions of local residents from traffic and other pollutants and the effect on local air quality from traffic generated air pollution in terms of nitrogen dioxide levels.</p>	<p>Dismissed</p> <p>The reporter noted that the appeal development's contribution to air quality conditions would itself not justify rejecting this proposal but it does add weight to the significant harm identified to green belt and Heathrow Airport parking and transport access policy objectives.</p>
Windsor, Berkshire Appeal A:	2006	Residential development for 46 flats.	One of the main issues is whether the proposed developments would result in future residents being exposed to an unacceptable standard of air quality.	Appeal A Dismissed on ground of harm to character and appearance of the area

Location and appeal reference number	Date	Development description	Air quality issues	Decision
<p>APP/T0355/A/05/1179505</p> <p>Appeal B:</p> <p>APP/T0355/A/05/1191578</p>		<p>Subject of two appeals, one in respect to a revised layout and design</p>	<p>There is no suggestion that either development would materially worsen air quality in the area or the air quality objective will not be achieved.</p> <p>Air quality monitoring data was provided by both the appellant and the council.</p>	<p>Appeal B Allowed subject to conditions.</p> <p>Condition 12 Prior to the commencement of development details of the proposed measures to be taken acoustically insulate all habitable rooms within the development against aircraft and road traffic noise, together with the details of the methods of providing ventilation to habitable rooms, shall be submitted to and approved in writing by the local planning authority. The approved measures shall be implemented and thereafter retained unless otherwise agreed in writing by the local planning authority.</p> <p>Condition 13 Prior to the commencement of development details of the proposed measures to be taken to mechanically ventilate the flats facing the roundabout and Clarence Road between the access road into the site and the northern boundary of the site have been submitted to and approved in writing by the local planning authority. The approved scheme shall be</p>

Location and appeal reference number	Date	Development description	Air quality issues	Decision
				implemented prior to the first occupation of these flats and shall be kept available for use thereafter unless otherwise agreed in writing by the local planning authority.
Berkshire APP/J0350/V/05/1185598	2006	Outline application for Residential development (300 dwellings) health centre with associated infrastructure, play areas and car parking, construction of 5 sports pitches with car parking and changing rooms; public open space and landscaping works and extension of noise bund along M4 boundary	Air quality is identified as one of the main considerations in the case. An AQA was not submitted with the application, and no expert evidence on air quality was given at the inquiry. However the matter could be addressed by preventing any dwelling or garden from being sited within the AQMA unless supported by the findings of an AQA, which would be secured by a condition.	Called in by Secretary of State Allowed with conditions (the need for affordable family housing in this case is compelling) Condition 26 No dwelling or associated garden or private amenity space shall be placed within the designated area of Air Quality Management (No 1) Order 2005 unless supported by the findings of an AQA and approved in writing by the local planning authority.
Wokingham APP/X0360/A/02/1092900	2003	Outline application for demolition of an existing	One of the main issues identified was the effect of the proposal on the living conditions of the proposed occupiers in respect of noise and air quality. The council is concerned that the occupiers of the proposed flats	Allowed subject to conditions (not relating to air quality)

Location and appeal reference number	Date	Development description	Air quality issues	Decision
		dwelling and the erection of 8 flats, associated parking and highway improvements. The northern boundary of the site abuts a planted embankment of the M4 motorway.	would be exposed to high levels of NO ₂ which has been shown to be associated with numerous health problems. The site lies in an AQMA which has been designated along the M4 and A369 corridors where NO ₂ levels exceed Government targets and where the council is required to prepare an action plan with a view to improving air quality. The reporter concluded that although the designation of the AQMA is indicative of poor air quality in the vicinity of the motorways that in itself does not prevent development in such areas and that the proposal would not materially harm the living conditions of the proposed occupiers in respect of air quality.	
<p>Erith</p> <p>Three separate appeals covering the same issues</p> <p>Appeal A: APP/D5120/C/01/1060338</p> <p>Appeal B: APP/D5120/C/01/1060339</p> <p>Appeal C: APP/D5120/C/01/1061147</p>	2004	Breach of planning control by unauthorised use for the storage and sale of scrap motor vehicles and their parts	<p>Noise and air pollution from lorry traffic generated by unauthorised uses on the residents of Manor Road was identified as one of the main issues in the appeals.</p> <p>An increase in lorry flows on Manor Road is likely to add to the existing high levels of air pollution affecting the residents of Manor Road. It would also be contrary to the objectives of the AQMA to considerably reduce the levels of respirable particulates in the locality</p>	<p>Dismissed</p> <p>The effect on air quality and the conflict with Policy TS11 outbalance the support for the appeal uses in terms of other UDP policies, the advice in RPG9A and their recycling benefits.</p>
Deptford, Greenwich	2001	Provision of 130 flats, 3222 sq m B1	One of the main issues in the appeal was whether exposure to air pollution would prevent the occupiers of the dwellings from enjoying satisfactory living conditions.	<p>Dismissed</p> <p>The leaving of the matter of mechanical ventilation to be</p>

Location and appeal reference number	Date	Development description	Air quality issues	Decision
APP/E5330/A/01/1066472		(business use) floorspace, and 80 parking spaces	<p>An assessment of air quality in the Borough carried out by the Council has established that annual mean concentrations of NO2 and 24 hour mean concentrations of PM10 particulates are likely to breach Government objectives near to major roads in the Borough. The whole of the borough is designated an AQMA. Dwellings fronting Blackheath Road would be exposed to levels of pollutants above normal health threshold limits. This is not in itself a bar to residential development.</p> <p>The report adopted a precautionary approach assuming that current pollutant levels are unlikely to change for the time being. Given the conditions that prevail in this part of Blackheath Road, the occupiers of dwellings fronting on to it would be unable to rely on natural ventilation of the kind usually provided by opening windows. The issue therefore comes down to whether a suitable mechanical system could be devised to provide adequate ventilation for those dwellings. No allowance for a mechanical ventilation system had been made in the plans</p>	addressed by a planning condition or by the provisions of a planning obligation would be unreasonable
Uxbridge APP/R5510/A/01/1077460	2002	Redevelopment of former gas works site for B1 (business), B2 (industrial) and B8 (storage and distribution) purposes with access roads and parking.	<p>The reporter considered the main issues associated with the inquiry to be the effect of the proposals upon the amenities of residents on Cowley Mill Road principally in terms of noise and air quality, having regard to traffic generated by the development, taking into account additionally any alternative means of access to the site from that envisaged in the proposals. AQA carried out and submitted with a duplicate assessment. The site lies within an AQMA and while Heathrow airport is a major source of emissions, road traffic emissions are also a material contributor to poor air quality in the area. The appellants carried out a more detailed assessment of the air quality impacts of the development using data provided by the council.</p> <p>The Council's SPG indicates that air quality impacts will be considered significant where air quality objectives are likely to be breached; if an area is close to an area where the air quality objective is likely to be breached, it is maintained that the air</p>	Allowed subject to conditions – none relating to air quality

Location and appeal reference number	Date	Development description	Air quality issues	Decision
			<p>quality impact would be significant if the development would cause a deterioration, however small in the quality of the air in that area. That statement however gives no measurable guideline and taken to its extreme would mean that any slight increase in NO2 concentration could weigh disproportionately in any assessment of the acceptability of development in air quality terms. Turning to Technical Guidance Note – Air Quality Assessments for Planning Applications this suggests that the effect of the proposed development upon air quality would not be regarded as significant. The exact nature of air quality on the locality will depend upon the means of access deemed appropriate by the local planning authority. It is not part of the Council’s case to deny development of the site on air quality grounds, notwithstanding its presence within an AWMA or its proximity to an area of exceedence.</p>	

Review of Development Management

- 3.97. The review of development management was undertaken to identify any key trends in references to air quality either in terms of development type or frequency or weight of the issue arising. Data was requested from the Scottish planning authorities with AQMA, and the five English local authorities for which the local plans were reviewed.
- 3.98. In relation to development management PAN51 (Revised 2006) notes that although planning decisions should be made on planning grounds in the public interest, the issues controlled under other legislation may be material considerations.

PAN 51 Planning Advice Note 51 Planning, Environmental Protection and Regulation (Revised 2006)

Paragraph 46

There is a statutory requirement to consult a number of bodies, including SEPA, on specific types of planning applications as set out in Article 15(1) of the Town and Country Planning (General Development Procedure) (Scotland) Order 1992 (as amended). Other applications can also raise pollution control issues on which specialist advice is required. Planning authorities may therefore wish to identify in discussion with the environmental protection bodies, those types of planning applications in which they might have an interest and would want to be consulted. These arrangements may well vary according to the type of development and the nature of the area but the objective would be to put in place effective working relationships and keep them under review.

Paragraph 49

All determinations of planning applications must be made in accordance with the development plan unless material considerations indicate otherwise (Town and Country Planning (Scotland) Act 1997, section 25). Consideration of the quality of air and potential impacts arising from development, possibly leading to a proven impact on health, is capable of being a material consideration, insofar as it may arise from any land use.

Paragraph 62

In Air Quality Management Areas (AQMA) or adjacent to them, air quality is likely to be a material consideration for large scale proposals or if they are to be occupied by sensitive groups such as the elderly or young children or are likely to have cumulative effects. This does not mean that all such applications should be refused even if they are likely to affect local air quality, but it may mean that conditions have to be applied to mitigate adverse effects. Generally, it may be necessary to consider whether a development could lead to the designation of a new AQMA or if granting planning permission could conflict with an Air Quality Action Plan.

- 3.99. Although a number of local authorities were able to easily identify planning applications for which an AQA had been requested, or air quality issues had been considered, some local authorities were unable to identify any planning applications where air quality had been an issue either anecdotally or through the use of a search facility.
- 3.100. The variations in the availability of information on development management decisions relating to air quality mean that only broad conclusions can be drawn from the information provided. However in light of the number of applications identified from the review of Scottish Planning Appeal Decisions, and information from the consultation with planning officers and environmental health officers, this information

provides an additional layer of evidence for the level of consideration given to air quality issues.

- 3.101. From the data collected from various local authorities in Scotland and England, it is clear that air quality considerations are impacting upon the determining of planning decisions. However, the level of this impact appears dependent upon the scale of the development, the location of the development in relation to Air Quality Management Areas (AQMAs) or recognised hotspots of poor air quality, and the proximity of certain development types to neighbouring residential areas.
- 3.102. Where an AQA or Environmental Assessment is required for a planning application, these assessments will consider not only direct air pollution impacts of the proposed development, but also the indirect impacts, for example, any increase in traffic the development may generate. In October 2004, Portsmouth City Council rejected an application for the construction of a ten story building to form offices and flats in close proximity to a busy roundabout on the basis of an Air Quality Impact Assessment. The assessment identified this proposed location as an area where the annual average objective for nitrogen dioxide is likely to be exceeded and was not convinced that proposed mitigation methods put forward by the developer would provide an acceptable solution. This air quality issue was considered a material consideration for rejecting the proposal.
- 3.103. In determining other planning applications in relation to air quality issues, most decisions are based upon local circumstances, for example whether or not the proposed development falls within an AQMA or recognised area of poor air quality. The majority of planning officers will then liaise with an Environmental Health Officer or other specialist to identify any air quality issues that the development may cause and to predict if the development is likely to have a significant effect upon air quality standards and objectives. Where it is deemed that there is potential for adverse effects the applicant will then be requested to provide an assessment of the proposed development relative to local air quality. There are numerous cases both in Scotland and England of applicants being requested to provide an air quality assessment on the advice of an Environmental Health Officer. If the air quality assessment finds that the development will not meet current air quality objectives, recommendations are then usually given to the applicant on how these objectives can be met. An example of these recommendations is increasing the stack height of a boiler application. In some cases, planning officers may also refer applicants to published pollution prevention guidance and specialist advisers, for example the Scottish Environment Protection Agency (SEPA), to confirm specific pollution mitigation methods. In the majority of cases studied, applications were amended accordingly.
- 3.104. A significant proportion of planning decisions for industrial developments, energy generating schemes, minerals extraction, landfill sites and waste recycling schemes also required air quality reviews and assessments to be made to inform planning decisions. The threshold for requiring these air quality reviews and assessments appeared higher the closer the proximity of these developments to residential areas. The focus of these reviews in relation to air quality was in safeguarding residents from smell, fumes, smoke, soot, ash, dust and grime resulting from the new development. However, from the cases studied, most of these types of development applications were rarely refused on air quality grounds. Instead it is more likely that mitigation measures necessary to meet air quality objectives were set as a condition for development to be allowed.

3.105. The review of development management identified limited examples of air quality related conditions. This may also reflect the limited number of authorities who provided information on air quality related decisions. These included conditions requiring AQA and a condition requiring that prior to the commencement of any works on site, the developer will be required to submit a report which satisfies the Planning Authority that the Local Air Quality Management objectives for the pollutants specified in the Air Quality Regulations, made under Part IV of the Environment Act 1995, will not be exceeded at any relevant location due to the impact of the proposed development. Conditions identified in relation to appeals are outlined in table 3.2.

Conclusions

3.106. The majority of the development management examples reviewed included applications for which an AQA was requested by the local authority. There is some evidence of the increased profile of air quality issues in some of the applications in Perth and Kinross where air quality was identified as an issue. In particular this relates to the impacts of increased traffic on areas with existing poor air quality. Other references to air quality issues in planning applications include minerals and waste operations and boiler installations. Due to the limitations of the data obtained, it is difficult to draw wider conclusions on trends relating to air quality. Only two of the decisions reviewed were refused on air quality grounds, and as already discussed the most common air quality related condition was to request an AQA. This is a key issue as the findings of an AQA may then identify air quality impacts which would affect the decision. This highlights the need to ensure greater awareness and understanding is given to air quality issues within the planning process so that air quality information is provided prior to the decision making process. In addition the sample of decisions reviewed did not identify issues associated with the cumulative impact of developments.

CONSULTATION FINDINGS

3.107. Development control and environmental health/pollution control officers across the nine Scottish local authorities with AQMA were contacted. Drawing together the findings of the plan review and development management information the following issues were discussed in the consultation:

- to identify the mechanisms for triggering consideration of air quality issues;
- to identify the information or advice each local authority uses in relation to air quality issues;
- to identify examples of planning applications where air quality issues should have been a consideration, but weren't;
- to identify what changes would help ensure that air quality was addressed more comprehensively.

3.108. The consultees included a mixture of both development management and environmental health officers. Generally the environmental health officers were better placed to respond to the issues for discussion, although there was variation between local authorities. In particular the environmental health officers had a clearer idea of how air quality issues should be addressed but lacked the knowledge of how this could be best achieved through the mechanisms available in the planning system. This highlights the lack of integration between air quality and planning issues within

local authorities despite advice in revised PAN51 on the interaction between land use planning and environmental regulation. The findings from this consultation are discussed below.

- 3.109. Nick Evans of the Scottish Executive, and Jim Storey of the Environment Agency were consulted with to evaluate the emerging findings. The feedback from the consultation with these bodies has been integrated to support the conclusions and recommendations.

Mechanisms for triggering consideration of air quality issues

- 3.110. The planning authorities were asked to identify the mechanism used to trigger the consideration of air quality issues for a planning application. The majority of environmental health departments receive the weekly planning list and sieve this for developments with air quality impacts. In some instances the planning department highlights significant applications for the environmental health officers to consider, or does this in addition to the provision of the weekly planning list. Two local authorities mentioned the inclusion of the AQMA as a GIS layer on the development constraints map.
- 3.111. Renfrewshire Council noted that Environmental Services use a list of criteria which includes development types and receptors to identify if air quality issues are a consideration (these are listed in Appendix 3). Similar information is found in the NSCA guidance, and supplementary planning guidance.
- 3.112. Perth and Kinross highlighted the need to consider the cross boundary air quality impacts of development, as they share a boundary with Dundee, of which the whole of the authority is declared an AQMA. Perth and Kinross also identified the importance of considering the cumulative impact of developments as due to the topographical constraints in Perth whereby traffic is funnelled across the bridges and surrounding streets in the town centre.

Sources of information and advice on air quality issues

- 3.113. The consultation identified that there is a strong reliance on the expertise of the officers within the environmental health departments of the local authorities. An issue which emerged from the consultation was the need for a greater level of awareness of air quality issues amongst planning officers and also for improved cross departmental working between planners, transport planners and environmental health.
- 3.114. The most frequently cited source of information and advice on air quality issues is the NSCA (2004) *Development Control: Planning for Air Quality Guidance* (updated 2006) on dealing with air quality concerns within the development control process. Other sources identified in the consultation are listed below:
- Highways Agency Design Manual for roads and bridges – Volume 11 Environmental Assessment, Section 3 Environmental Assessment Techniques, Part 1 Air quality;
 - Defra Air Quality help desk <http://www.laqmsupport.org.uk/>;
 - ODPM (2004) Planning Policy Statement PPS23 Planning and Pollution Control;
 - Scottish Executive (Revised 2006) Planning Advice Note 51 Planning, Environmental Protection and Regulation;

- Scottish Executive Environment Group (2003) Part IV The Environment Act 1995 Local Air Quality Management Revised Policy Guidance Paper 2003/2;
- www.airquality.co.uk.

- 3.115. It was felt by some of the officers consulted that the Scottish Executive guidance documents do not provide sufficient weight to address air quality issues in planning. This was stated as one of the reasons for referring to Planning Policy Statement 23: Planning and Pollution Control (2004) which was seen as providing a more appropriate level of policy guidance, particularly in relation to the use of section 106 planning agreements (equivalent of section 75 agreements in Scotland).
- 3.116. PPS 23 provides clearer guidance on the use of section 106 planning agreements to secure developer contributions to offset the air quality impacts of a development. For example the air quality impacts of a development proposal may be some distance from the development site itself, such as at a busy road junction. It was also suggested through the consultation that additional guidance is needed to justify the distances from AQMA for assessing impacts on air quality. A section 75 planning agreement could be used to secure investment in provision of an off road cycle route, however it was suggested that the Scottish guidance documents did not facilitate this type of approach. In addition it was suggested that there may be some reluctance on the part of planners to use section 75 agreements in the same way due to the additional time implications this brings to the development control process.
- 3.117. There appears to be some degree of concern by planning authorities that requesting an AQA prolongs the planning application process. Even though the greater complexities of air quality issues are recognised it was suggested that guidance which included a template planning agreement may be useful in achieving the use of this mechanism.

Coverage of air quality issues

- 3.118. The majority of planning authorities contacted felt that the current systems in place ensured that applications with potential air quality impacts were identified and addressed. An example of where air quality issues were not adequately addressed by the planning system is provided for the Quartermile development in Edinburgh. The Quartermile development is a 19-acre site of the former Royal Infirmary in Edinburgh and the proposed development comprises residential, commercial and retail development. Environmental Health commented on an amendment to the original planning permission. This identified that since the initial assessment of the Quartermile site, further air quality monitoring had been undertaken by the Environmental Health Department which showed that air quality had deteriorated in the city centre Air Quality Management Area (AQMA) and that a further Air Quality Management Area is likely to be declared for West Port. Both of these areas are close to the development site. Taking this into account the Environmental Health Department considered that it would be necessary to reassess the air quality impact on the surrounding road network and in particular West Port. Further information on the air quality impact was requested but not provided. The application was subsequently granted without the submission of further air quality work.
- 3.119. This illustrates the need for air quality considerations to be more closely integrated with the planning system to ensure that where appropriate these issues are an integral part of the decision making process.

Recommended changes to help ensure that air quality is addressed more comprehensively

- 3.120. All respondents identified that there was scope for improvement in the way air quality issues are addressed in the planning system.
- 3.121. Edinburgh City Council identified the need for an independent strategic overview of the air quality implications of new developments. Transport impact assessments for new developments do not provide sufficient information for air quality monitoring purposes (use of peak flow data, not average daily flow data which tends to underestimate the total flow) and they need to be independent. A strategic overview of the air quality and transport issues within the planning authority area would provide independent verification of the impacts of new development and also allow assessment of the cumulative impacts of development. A model was developed for the assessment of the proposed trams for Edinburgh, and a similar model could be used incorporating recent figures on air quality, new developments and traffic impacts.
- 3.122. Perth and Kinross are currently looking at how they can ensure air quality issues are addressed more comprehensively and identified the need for a consistent approach to taking air quality issues into account. An additional issue for Perth and Kinross is that they share a boundary with Dundee City, the whole area of which is declared an AQMA, and they are currently considering how to address the cross boundary impact of developments.
- 3.123. Concerns were raised about the relative weight given to air quality issues, even when they had been raised by the environmental health officers as a consideration in a planning application. Where an AQA is requested it needs to be an integral part of the planning application. This lack of awareness of the importance of an AQA as part of a planning application means that applications are validated and 'the clock starts to tick' on the eight week period for deciding the planning application when AQA has not been submitted. This means that environmental health advice on measures to reduce the air quality issues associated with a development may come too late in the day and construction may have started.
- 3.124. Overall the consultees identified the following recommended changes:
- Additional /clearer guidance document including examples of how planning conditions can be used successfully in relation to air quality. It was recognised that there are constraints on what planning conditions can achieve, however they do not always achieve the desired outcomes.
 - Improved traffic data for AQA to ensure realistic assessment of impacts.
 - Greater awareness amongst developers and their agents of air quality issues.
 - Improved communication between council departments which deal with roads and transport, planning and environmental health.
 - Use of air quality modelling to allow cumulative impacts of new developments to be assessed.
 - More interaction between SEPA staff and planners (a number of consultees referred to the recent seminar event organised by SEPA and the positive impact of this).

- Improved plan policies.
- Development of SPG.
- Greater awareness by elected members of air quality issues and how they will impact in the long term to achieve more informed decision making.

3.125. These points are explored in more detail in the following chapter.

4. CONCLUSIONS AND RECOMMENDATIONS

INTRODUCTION

- 4.1. The research findings outline the challenges currently faced when addressing air quality issues through the planning system. This found that there are key issues in the coverage of air quality throughout the planning process from policy to decision making. However there was a positive response to the research, and recognition that air quality issues are now moving higher up the agenda. The conclusions and recommendations identify a number of ways forward for more comprehensive coverage of air quality issues in the planning system.

CONCLUSIONS

- 4.2. The research has highlighted that despite current advice air quality has a relatively low profile as a planning issue in Scotland, although there is evidence that this situation is starting to change. One of the main findings is that there appears to be an inconsistent approach to air quality and planning through planning policies and development management, even between local authorities with AQMA. Some plans have a specific policy relating to air quality, others include references to air quality in relation to sustainable development and transport policies. Other plans make little or no reference to air quality. To some extent this may reflect on the age of some of the plans, however this is not always the case. An additional finding is that there is no clear urban/rural split between the coverage of air quality issues in development plans, although the plans with the most air quality specific policies are those in the more urban areas.
- 4.3. The research identified that there is a clear need for clearer development plan policy guidance on air quality issues in future strategic plans and local development plans in Scotland. Development plan policy provides a mechanism for ensuring that air quality issues are addressed through the decision making process, supported by national planning policy and advice. The current lack of clear policy guidance in many plans is likely to be a key contributing factor in the difficulties of addressing air quality issues in the development management process. This compounds the largely reactive approach to the consideration of air quality issues in planning. It was also identified that in a minority of cases air quality issues may not be given sufficient weight in planning decisions. The development of supplementary planning guidance also provides an opportunity for greater clarity and detail on how air quality issues will be dealt with in the planning process.
- 4.4. The Planning etc (Scotland) Act 2006 represents a further important stage in delivering the Scottish Executive's commitment to reform the planning system. It includes a new duty for key agencies to co-operate in the preparation of development plans and statutory pre application discussions for certain types of development. The latter in particular may provide an opportunity for SEPA to influence air quality considerations in planning applications at an earlier stage. The Act also places a duty on planning authorities to carry out their development planning functions with the objective of contributing to sustainable development , which will support air quality objectives.
- 4.5. There are very few examples of supplementary planning guidance (SPG) on air quality outside of London, although some Scottish local authorities are in the process

of developing SPG. SPG provides an important role in setting out criteria for consideration of air quality issues in a planning application.

- 4.6. There is reliance on a small number of existing guidance documents which provide technical guidance on air quality issues and planning. The NSCA (updated 2006) guidance document is a comprehensive document which provides information on a number of more detailed planning and air quality issues. However there is also a need for greater clarity in national planning policy and advice to strengthen the coverage of air quality issues and policies in development plans.
- 4.7. Some local authorities demonstrated an effective joined up approach to the consideration of air quality issues (i.e. cross departmental working between planners, roads and environmental health officers), however there is a need to reflect this approach across all planning authorities.
- 4.8. Due to the limited decision and appeal information available in Scotland, and the inconsistent nature of air quality related policies it was not possible to trace plan policies through applications, to decisions to appeal. This would be a useful exercise to undertake to identify examples of robust air quality plan policies.

RECOMMENDATIONS

- 4.9. Based on the research findings the following recommendations have been identified for taking forward SEPA's role in addressing air quality and planning issues:

Recommendation 1

SEPA should continue to engage with planning officers in the preparation of development plans to ensure comprehensive coverage of air quality in plan policies.

How this relates to SEPAs outcomes

- 4.10. Under the provisions of the new Planning Act, SEPA will become a statutory consultee for development plans. One of SEPA's key outcomes is to achieve good air quality and the planning system can help to achieve this by ensuring that development does not generate new sources of air pollution and that development is located in sustainable locations. It can help achieve environmental justice by ensuring that people are not exposed to unnecessary levels of pollution caused by new development. Local Plans should make reference to the existence of LAQMA and identify the planning implications of these areas within the local plan.

Recommended Action for SEPA

- 4.11. SEPA's consultation responses should consider the extent to which air quality is identified in main issues reports and suitably addressed in proposed plans; and make appropriate recommendations to planning authorities. Key questions to ask include:
 - What are the air quality issues within this local authority?
 - Is a stand alone air quality policy warranted?
 - Is air quality covered in other environmental protection policies?
 - Do the policies seek to improve air quality or merely prevent deterioration?
 - Are air quality issues addressed in relation to specific development types?

- Do the relevant policies make links to sustainable development, climate change quality of life and environmental justice?
- 4.12. Where possible, SEPA staff should enter into dialogue with the planning authority at the outset of the plan preparation process, prior to the publication of a draft plan, since this will provide the greatest scope to ensure that air quality issues and policies are incorporated in the plan. It will often be more difficult to secure inclusion of such policies once the document has reached draft stage. Under the Planning etc. (Scotland) Act 2006 local planning authorities will prepare a main issues report to inform their work in preparing a strategic development plan. This stage of the plan making process will provide an important opportunity for SEPA to inform the plan to ensure air quality issues are adequately addressed.
- 4.13. Another potential role for SEPA would be to work with the Scottish Executive and planning authorities to inform development of exemplar or model policies relating to air quality to ensure that the policies address all required aspects of air quality.

Example of good practice

- 4.14. The following example of plan policy from the London Plan (2004) illustrates a positive example of a plan policy to address air quality.

The London Plan: Spatial development Strategy for Greater London (2004)

Policy 4A.6 Improving air quality

The Mayor will and boroughs should implement the Mayor's Air Quality Strategy and achieve reductions in pollutant emissions by:

- improving the integration of land use and transport policy and reducing the need to travel especially by car (see Chapter 3, Part C)
- promoting sustainable design and construction (see Chapter 4, Part B)
- identifying environmental constraints on polluting activities to ensure protection of local air quality, setting out criteria in respect of different pollutants against which plans and policies can be appraised and proposals assessed
- ensuring at the planning application stage, that air quality is taken into account along with other material considerations and that formal air quality assessments are undertaken where appropriate, particularly in designated Air Quality Management Areas
- seeking to reduce the environmental impacts of transport activities by supporting the increased provision of cleaner transport fuels, particularly with respect to the refuelling infrastructure
- working in partnership with relevant organisations, taking appropriate steps to achieve an integrated approach to air quality management and to achieve emissions reductions through improved energy efficiency and energy use (see Policy 4A.7).

The Mayor will work with strategic partners to ensure that the spatial, transport and design policies of this plan support his Air Quality Strategy.

Recommendation 2

SEPA may wish to encourage planning departments with AQMA to prepare supplementary planning guidance on air quality.

How this relates to SEPA's outcomes

- 4.15. This will support Recommendation 1 by allowing local planning authorities to provide additional detail on how air quality issues will be dealt with through the planning system and supporting the delivery of good air quality.

Recommended Action for SEPA

- 4.16. Scottish Executive (2005) *Modernising the planning system* sets out an intention to enhance the status of supplementary planning guidance. The Scottish Executive in conjunction with SEPA should consider the need for producing guidance on the scope and content of SPG on air quality to encourage more local authorities to develop this. SPG should support air quality policies through defining development types where air quality impacts should be considered, size thresholds for developments and information on when air quality impacts will be deemed 'significant'.

Example of good practice

- 4.17. The Portsmouth Local Development Framework Air Quality and Air Pollution Supplementary Planning Document Adopted March 2006 provides a high level of detail in relation to the circumstances when air quality may be a material planning consideration for a development:

1. A national air quality objective or an EU Limit Value may be exceeded for the first time on a specific site if a development is permitted

This may arise where sensitive development is proposed outside existing AQMAs and close to existing sources of the identified air pollutants. In Portsmouth this is likely to include the following types of development:

- The introduction of residential, school, hospital, or library uses closer to busy roads than existing similar uses. This form of development may expose members of the public to pollutant concentrations above objective levels for nitrogen dioxide and PM10.
- The introduction of uses that allow public access closer to shipping lanes, ports, docks than existing similar uses. This form of development may expose members of the public to pollutant concentrations above objective levels for nitrogen dioxide, PM10 and sulphur dioxide.
- The introduction of residential, school, hospital or library uses close to petrol stations may expose members of the public to pollutant concentrations above objective levels for benzene.
- The introduction of new industrial or commercial uses that emit any of the identified pollutants in significant quantities. This is particularly applicable to processes prescribed under the Pollution Prevention and Control Regulations.
- The introduction of new sensitive uses closer to significant prescribed industrial processes than existing sensitive uses where the industrial premises is known to emit significant quantities of the identified pollutants.

2. The level of exceedance over a national air quality objective or an EU Limit Value will be made significantly worse if a development is permitted

This will mainly apply to polluting developments within existing AQMAs. In Portsmouth this is currently limited to developments that will add significantly to nitrogen dioxide concentrations within an AQMA such as:

- Developments, which will significantly increase traffic flow, change traffic composition or increase congestion within an AQMA.
- Developments which enclose streets and significantly reduce the dispersion of pollutants.

3. The concentration of an air pollutant for which a national air quality objective or an EU Limit value has been prescribed will approach an exceedance such that other developments in the area, particularly development plan allocations, might be prevented

This point refers to situations where development in an area takes place in a piecemeal fashion. Whilst each individual development might only have a minor impact on air quality, over time this could lead to progressive incremental increases in air pollution. This process

might prejudice or result in more onerous requirements upon later developments to reduce the impact of air pollution. This could be particularly likely where air quality is already close to exceeding air quality objectives. A more holistic approach (whereby the net effect of all development in a particular area is considered) would be desirable but this would be difficult to implement, due to lack of foresight into which development sites are likely to come forward and indeed what affect these future developments may have on air quality objectives. In the main the local planning authority will consider the application of this principle in areas where significant development or regeneration is expected to occur in several phases and some of these developments are polluting. In these instances the major development site may be the subject of an Area Action Plan (an area based planning policy document). If air quality levels in this area are close to exceeding objectives, a policy or consideration of air quality issues will be included in the Area Action Plan.

4. The number of people potentially exposed in sensitive uses to exceedances of national air quality objectives or EU Limit Values is increased if a development is permitted

By definition this will apply either where a polluting development may extend the area of an existing AQMA or where new sensitive development is proposed in areas where air quality exceeds objectives or limits but where an AQMA does not currently exist. It also applies where new sensitive development is proposed within an existing AQMA that would increase the population exposed above the objectives or limit. Examples include:

- Introducing sensitive development for the first time into sites close to busy roads, which are currently exclusively or largely commercial or industrial in character and subject to air quality in excess of objectives.
- Introducing higher density development sites into areas subject to air quality in excess of objectives.

5. The likelihood of improving air quality in Air Quality Management Areas is significantly reduced if the development is permitted

This may apply to a range of potential developments if they were to prevent the City Council from carrying out actions to improve air quality. The measures that the City Council intends to take will be set out in the Local Transport Plan and the Air Quality Action Plan.

Recommendation 3

SEPA should continue to raise awareness of air quality issues within the context of the land use planning system and encourage cross departmental working on air quality issues within local authorities by promoting workshop/seminar events with environmental health officers, planners, transport planners and other specialists.

How this relates to SEPA's outcomes

- 4.18. In order to achieve good air quality there needs to be joined up working between environmental health officers, planners, transport planners and other specialists to ensure that air quality issues are taken into account at the right stage of the planning process, that they are afforded sufficient weight in planning decisions and that mitigation measures are suitably identified at an early stage. The research identified that in some instances there is a lack of knowledge by planners about what conditions can be imposed to address air quality issues and by environmental health officers about the extent to which the planning conditions can address air quality issues.

Recommended Action for SEPA

- 4.19. SEPA may wish to consider organising further workshop/seminar events on air quality which bring together environmental health officers, planners, transport planners and other specialists to encourage dialogue and to demonstrate the relationship between these areas of operation within local authorities.

Recommendation 4

Support greater integration of air quality issues in the planning system.

How this relates to SEPAs outcomes

- 4.20. In order to achieve good air quality, decisions which affect air quality need to ensure the air quality implications are given appropriate weight in the decision making process. The research found that air quality information requested is not always submitted as part of a planning application and decisions may be made with air quality information outstanding. This reflects differing levels of awareness and expertise on the part of planning officers, but also the relatively low profile accorded to air quality issues in Scottish Executive planning policy guidance and good practice guidance.

Recommended Action for SEPA

- 4.21. The recommended actions for Recommendation 3 will help to support greater acknowledgement of air quality issues. SEPA and the Scottish Executive may wish to consider the extent to which air quality issues are not being appropriately factored into the development management process. SEPA should also work with the Scottish Executive to ensure that air quality issues, and the role of the planning system in protecting and enhancing air quality, are more fully and explicitly addressed within Scottish Planning Policy and across the series of Planning Advice Notes.

Recommendation 5

SEPA should consider the need for local authority guidance on air quality related conditions.

How this relates to SEPAs outcomes

- 4.22. The time pressures on planning authorities to process and decide planning applications means that the development of air quality related conditions, to apply to a proposed development may be a limiting factor. This may be due to the lack of knowledge of the type of conditions to impose to best secure air quality outcomes. This issue needs to be addressed to ensure that where it would be appropriate to apply air quality related conditions, that it is easy and effective to do so.

Recommended Action for SEPA

- 4.23. SEPA in conjunction with the Scottish Executive should consider the scope to identify model conditions relating to air quality which can be applied to planning applications.

Example of good practice

- 4.24. The research did not identify a large number of examples of conditions relating to air quality issues. The following two examples are provided to illustrate typical conditions, however there is significant scope to further explore the effectiveness of conditions and the development of conditions to address particular air quality related issues:

<p>Prior to the commencement of development details for the proposed measures to be taken to mechanically ventilate the flats facing the roundabout and Clarence Road between the access road into the site and the northern boundary of the site have been submitted to and approved in writing by the local planning authority. The approved scheme shall be</p>
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implemented prior to the first occupation of these flats and shall be kept available for use thereafter unless otherwise agreed in writing by the local planning authority. (Appeal reference APP/TO355/A/11/1179505)

That prior to the commencement of any works on site, the developer will be required to submit a report which satisfies the Planning Authority that the Local Air Quality Management objectives for the pollutants specified in the Air Quality Regulations, made under Part IV of the Environment Act 1995, will not be exceeded at any relevant location due to the impact of the proposed development. (Renfrewshire 4/51/pp)

Recommendation 6

SEPA should continue to influence cross departmental working between government departments and agencies.

How this relates to SEPAs outcomes

- 4.25. Air quality is an issue which extends across a wide range of policy areas including health, transport, economic development, environment and sustainable development. In order to achieve good air quality, all of these areas which affect air quality must have regard to their impact on air quality and this can best be achieved through cross departmental working.

Recommended Action for SEPA

- 4.26. SEPA should continue to promote effective cross departmental working on addressing air quality issues within government departments and agencies. This can be achieved by ensuring that air quality issues continue to be reflected in debate and consultation on cross-cutting policy agendas such as sustainable development, climate change, transport and economic development.

Recommendation 7

That SEPA continues to keep up to date with and promote good practice elsewhere in the UK.

How this relates to SEPAs outcomes

- 4.27. The role of the planning system in achieving good air quality is an issue being addressed across many local authorities in the UK. This is particularly an issue in London where air quality issues are of a much greater influence than in other areas. Although it is important to recognise the different factors at play in different geographical locations, the action being taken in other areas can provide good practice examples and identify innovative solutions to issues being faced in Scotland. Good practice examples, which help to achieve good air quality, should be taken on board and disseminated amongst practitioners.

Recommended Action for SEPA

- 4.28. SEPA should maintain contact with colleagues in England and Wales who can share experience of emerging policy and practice relating to air quality issues and bring this experience to inform SEPAs input into policy development and advice.

Recommendation 8

SEPA should consider the need for new guidance on addressing cross boundary air quality impacts of development between local authorities.

How this relates to SEPA's outcomes

- 4.29. This issue is particularly relevant to the city regions but also to other local authorities for example, where key roads may cross local authority boundaries. The achievement of good air quality is an issue for the whole of Scotland and this needs to ensure that measures to support good air quality do not inadvertently impact on other areas, either within a local authority or into neighbouring authorities.

Recommended Action for SEPA

- 4.30. As outlined under Recommendation 3, workshop events which bring together environmental health officers, transport planners and planners will also provide opportunities for communication between neighbouring authorities, as well as opportunities for sharing good practice. SEPA may wish to consider preparing internal guidance on how best to identify and resolve cross boundary issues relating to air quality, as well as how to engage effectively with neighbouring authorities in addressing this issue .

Recommendation 9

SEPA should investigate the role of air quality modelling at a local authority level and the role this could play in informing decision making.

How this relates to SEPA's outcomes

- 4.31. This is closely related to Recommendation 8. Measures that assist the consideration of air quality issues in relation to planning applications and the allocation of land for development will support the achievement of good air quality through more informed decision making. The research identified that there is a lack of available information, particularly on the cumulative impacts of development on air quality to inform decision making.

Recommended Action for SEPA

- 4.32. SEPA expertise on modelling environmental impacts could be used to assist in the development of modelling which could be used by local authorities in monitoring and modelling air quality impacts as a local authority wide scale. This level of modelling would allow the impacts of large scale developments to be assessed, and in particular identify air quality impacts which may occur some distance from the development site, for example at key road junctions.

Recommendation 10

In responding to development management consultations SEPA should highlight the role of local authorities in addressing air quality issues.

How this relates to SEPAs outcomes

- 4.33. This will help to raise the profile of air quality considerations and reinforce the other recommendations which seek to ensure air quality issues are considered and addressed earlier in the planning process.

Recommended Action for SEPA

- 4.34. SEPA should use the opportunities provided by consultation on planning applications to raise the profile of air quality considerations to be addressed through the planning system where appropriate. This can be achieved by identifying where air quality issues should be addressed in a planning application through requesting an AQA or recommending the use of planning conditions, and specifying how the findings of the AQA should be used to inform the decision making process.

References

- ARUP (1999) Good Practice Guide Air Quality and Planning, RTP1
- ODPM (2004) Planning Policy Statement PPS23 Planning and Pollution Control
- National Society for Clean Air (2004) Development Control: Planning for Air Quality
Guidance from NSCA on dealing with air quality concerns within the development control
process (updated 2006)
- Scottish Executive (2002) Scottish Planning Policy (SPP) 1 *The Planning System*
- Scottish Executive (2002) Scottish Planning Policy (SPP) 2 Economic Development
- Scottish Executive (2006) Scottish Planning Policy SPP 4: *Planning for Minerals*
- Scottish Executive (2005) Scottish Planning Policy SPP17 *Planning for Transport*
- Scottish Executive (2006) Planning Advice Note (PAN) 51 *Planning, Environmental
Protection and Regulation*
- Scottish Executive (2004) Planning Advice Note (PAN) 57: *Transport and Planning*

APPENDIX 1
Scottish Structure and Local Plans

Post October 2001 Approved Structure Plans and Adopted Local Plans and emerging/replacement plans to be reviewed:

For areas where the emerging plans require to be reviewed, these are highlighted in yellow as these areas have AQMA but the adopted plans pre-date 2001.

	Approved Structure Plans	Date	Air Quality Management Areas	Emerging/replacement plans	
	North East Scotland Together (Aberdeenshire and Aberdeen)	Dec 2001	✓		
	Dundee and Angus	Oct 2002	<i>Emerging</i>		
	Argyll and Bute	Nov 2002			
	Edinburgh and Lothians	June 2004	✓	Edinburgh and the Lothians Structure Plan 2020 Consultation Paper.	
	Glasgow and Clyde Valley	May 2002	✓	Alterations: Glasgow and the Clyde Valley Joint Structure Plan First Alteration - Ravenscraig (2003) Glasgow and the Clyde Valley Joint Structure Plan Second Alteration - Glasgow Airport (2004) Glasgow and the Clyde Valley Joint Structure Plan 2006 Third Alteration (2006)	
	Stirling and Clackmannanshire	March 2002		Alteration No 1: Renewable Energy June 2004 Alteration No 2: Indicative Forestry Strategy August 2004 Third Alteration is currently being	

	Approved Structure Plans	Date	Air Quality Management Areas	Emerging/replacement plans	
				prepared to update the Plan towards 2025 in light of revised national policy, population, households and other trends.	
	Falkirk	June 2002		Falkirk Council Structure Plan Finalised Draft (draft, May 2005)	✓
	Fife	July 2002		Finalised Fife Structure Plan 2006 – 2026 (April 2006)	
	Orkney	Nov 2001			
	Perth and Kinross	June 2003	<i>Emerging</i>		
	Scottish Borders	Nov 2005			
	Western Isles	Dec 2003			

	Adopted Local Plans	Date	Air Quality Management Areas	Emerging/replacement plans	
Edinburgh and Lothians	NE Edinburgh First Alteration	Jan 2004		Edinburgh City Local Plan Draft (2006) (Will replace all existing Local Plans)	
	SE Edinburgh	Aug 2005			
	Shawfair (SE Wedge)	Sep 2003			
	Midlothian District	Dec 2003			
	<i>Central Edinburgh</i>	1997	✓		
	Rural West Edinburgh Local Plan	June 2006			
					Finalised West Lothian Local Plan 2005 (finalised April 2005)

	Adopted Local Plans	Date	Air Quality Management Areas	Emerging/replacement plans	
	East Lothian Local Plan 2000* (adopted April 2001)		<i>Emerging</i>	East Lothian Local Plan 2005 (finalised June 2005)	
Glasgow and Clyde Valley	Glasgow	August 2003	✓	Glasgow City Plan 2 (<i>consultative draft</i> , March 2006)	
	East Dunbartonshire	Feb 2005	✓		
	East Renfrewshire	Nov 2003		<i>East Renfrewshire Replacement Local Plan Consultation Document (October 2006)</i>	
	Lower Clydesdale	April 2004			
	Cambuslang/Rutherglen	Nov 2002			
	South Lanarkshire Minerals	Sept 2002			
	Clydebank	Sept 2004			
	Renfrewshire Local Plan	March 2006	✓		
Stirling and Clackmannanshire	Clackmannanshire	Dec 2004			
Dundee	Dundee	Aug 2005	<i>Emerging</i>		
Ayrshire	East Ayrshire	Apr 2003		Alteration to East Ayrshire Local Plan: Consultative Draft (August 2006)	
	East Ayrshire Opencast Coal Subject Plan	March 2003			
	North Ayrshire (excluding Isle of Arran)	Nov 2005			
	Isle of Arran Local Plan	February 2005			
					South Ayrshire Local Plan. Finalised 2002
Falkirk	Falkirk	Sept 2002	✓	Falkirk Council Local	

	Adopted Local Plans	Date	Air Quality Management Areas	Emerging/replacement plans	
	Polmont	Dec 2001		Plan (finalised March 2005) (Will replace all current Local Plans)	
Fife	Dunfermline and the Coast	Apr 2002			
	West Villages	Sep 2003			
				Cowdenbeath Area Local Plan (Finalised Plan September 2003) R Cowdenbeath Local Plan Modifications Report of Public Local Inquiry (May 2006)	
	Levenmouth	July 2004			
	Kirkcaldy Area	Mar 2003			
	Glenrothes	Mar 2003			
	Cupar and Howe of Fife	Mar 2003			
	Fife Minerals Subject Local Plan	Feb 2004			
				St Andrews and East Fife Local Plan (draft March 2005)	
Highland	Caithness	Sep 2002			
	Inverness	Nov 2005			
	Wester Ross Local Plan	June 2006			
				<i>Ross and Cromarty East Local Plan</i> Intention to Adopt Draft , October 2006	
Western Isles	Broad Bay (Western Isles)	May 2003			
Orkney	Orkney Isles	Dec 2005			
Aberdeen	<i>Aberdeen City District-wide Local Plan</i>	<i>September 1991</i>		Finalised Aberdeen City Local Plan August 2004 (currently at inquiry)	✓

	Adopted Local Plans	Date	Air Quality Management Areas	Emerging/replacement plans	
Perth and Kinross	<i>Perth Central Local Plan</i>	<i>December 1997</i>		New Perth Plan Draft (Dec 2004)	✓emerging

Plans in italics were not reviewed

APPENDIX 2

Extracts from Supplementary Planning Guidance

London Councils Air Quality and Planning Guidance Revised version- January 2007 Written by: The London Air Pollution Planning and the Local Environment (APPLE) working group.

The overall outcome of an air quality assessment is to determine whether the development will have a significant impact on air quality or whether the existing air quality environment is unacceptable for the proposed development.

The three main ways a development may have a significant impact are:

1. If the development is likely to cause a deterioration in local air quality (i.e., once completed it will increase pollutant concentrations)
2. If the development is located in an area of poor air quality (i.e., it will expose future occupiers to unacceptable pollutant concentrations)
3. If the demolition/construction phase will have a significant impact on the local environment (e.g., through fugitive dust and exhaust emissions). [Note the proposed London-wide Best Practice Guidance entitled *The Control of Dust and Emissions from Construction and demolition* should help reduce emissions from this stage of a development.

Local authorities will consider the following issues when determining whether an air quality assessment should normally be undertaken:

- Locality of development – including relevant exposure;
- Length of time and scale of demolition/construction phase;
- Likely increase in traffic levels from existing base (either through servicing or parking requirements);
- New industrial development (e.g., boiler plant/energy production/permitted installations/authorised processes);
- Size of development - residential/commercial floor space or number of units;
- Street canyons and stationary or queuing traffic;
- Increase in HDV movements (e.g., more than 20 per day), such as for lorry parks, depots, bus stations;
- New rail, road building and signalling, bridge, tunnel, port or airport developments;
- Waste handling activities.

Royal Borough of Kensington and Chelsea Supplementary Planning Guidance-05 Air Quality September 2003.

Circumstances where developers will normally be required to submit an Air Quality Assessment for an application where the impact on air quality is likely to be significant:

- proposals that will result in an increase in vehicle trip generation in the local area, which result in increases in traffic volumes (Annual Average Daily Traffic) of 5% or more on individual road links with more than 10,000 vehicles per day;
- proposals which may result in increased congestion and lower vehicle speeds than are present on the existing local road network;
- proposals which significantly alter the composition of traffic such that adverse air quality impacts may arise;
- proposals for new developments with 300 parking spaces or more or an increase in existing parking provision of 300 spaces or more;
- proposals for coach and lorry parks;
- any development likely to have an adverse impact on air quality, particularly in sensitive areas (for example where predicted air pollution levels already exceed air quality objective levels by 10% or more); or
- proposals that have the potential to result in significant emissions of pollutants from industrial activities.

Draft Supplementary Planning Guidance to the Hillingdon Unitary Development Plan Air Quality Planning & Transportation Services London Borough of Hillingdon (2002)

An air quality assessment would be normally expected for the following types of development proposal:-

- a)** proposals that will result in an increase in vehicle trip generation in the local area, and which result in increases in traffic volumes (AADT)² of 5% or more on individual road links with more than 10,000 vehicles per day³
- b)** Industrial development/commercial development with a floor space of more than 2500m²
- c)** Proposals which may result in increased congestion and lower vehicle speeds than is present on the existing local road network
- d)** Proposals which significantly alter the composition of traffic such that adverse air quality impacts may arise
- e)** Proposals for new developments with 300 parking spaces or more or an increase in existing parking provision of 300 spaces or more.
- f)** proposals for coach and lorry parks, distribution warehouses
- g)** Any major employment generators likely to have an adverse impact direct/indirect on air quality, particularly in sensitive areas. See exceedance areas on Fig 1. These include developments: -
 - i. Involving industrial activities with the potential to produce significant air emissions.
 - ii. With the potential to generate significant traffic. A detailed traffic impact assessment is normally required in these cases.
 - iii. Which is likely to lead to a significant increase in the emission of one or more of the prescribed pollutants as specified in the National Air Quality Strategy.

Source: Based on PPG13 [March 2001]; Circular 2/99

– Environmental Impact Assessment; Adopted Hillingdon UDP [Sept 1998]

Other developments may also warrant an air quality assessment as part of determining the planning application. Within areas where air quality objectives are unlikely to be met (e.g. in the vicinity of Heathrow Airport) it is likely that for many developments, air quality would be a material consideration and an assessment would be required. [See air quality exceedance map in Fig 1]

Haringey Council Supplementary Planning Guidance SPG 8i Air Quality (2003)

An air quality impact assessment should normally be undertaken in the following circumstances:

- Proposals that will result in an increase in vehicle trip generation in the local area, and which result in increases in traffic volumes (AADT)³ of 5% or more on individual road links with more than 10,000 vehicles per day⁴.
 - Proposals which may result in increased congestion and lower vehicle speeds than is present on the existing local road network.
 - Proposals which significantly alter the composition of traffic such that adverse air quality impacts arise.
 - Proposals for new developments with 300 parking spaces or more or an increase in existing parking provision of 300 spaces to more.
 - Proposals for coach and lorry parks.
 - Any developments likely to have an adverse impact on air quality, particularly in sensitive areas (e.g. where predicted air pollution levels already exceed air quality objective levels by 10% or more).
 - Proposals for industrial development / commercial development with a floor space of more than 2,500 m².
 - As part of an EIA where there will be an impact on air quality and as part of any traffic assessment (see SPG 8h: Environmental Impact Assessments and SPG7c: Transport Assessments).
- ³ Annual average daily traffic
⁴ roads with lower flows but higher percentage increases in flows may still require an assessment.

Ealing Borough Council Draft SPG 3 Air Quality and Pollution (undated).

Circumstances in which an air quality assessment will be required:

An air quality assessment would normally be expected for the following types of development:

- a) proposals that will result in an increase in vehicle trip generation in the local area, and which result in increases in traffic volumes (AADT) of 5% or more on individual road links with more than 10,000 vehicles per day¹.
- b) Industrial/commercial development with floor space in excess of 2500 sq. m.
- c) Proposals which may result in a significant increase in congestion, and lower vehicle speeds than currently experienced on the existing local road network.
- d) Proposals which significantly alter the composition of traffic, such that adverse air quality impacts may arise.
- e) Proposals for new developments with 300 parking spaces or more, or an increase in existing parking provision of 300 spaces or more.
- f) Proposals for coach and lorry parks, distribution warehouses.
- g) Proposals involving major employment generators which are likely to have an adverse impact both directly and indirectly on air quality, particularly in sensitive areas (i.e exceedance areas). These may include developments:
 - i) involving industrial activities with the potential to produce significant air emissions
 - ii) with the potential to generate significant traffic. A detailed impact assessment is normally required in these cases

¹ Roads with lower flows but higher percentage increases in flows may still require an environmental assessment

iii) which are likely to lead to a significant increase in the emissions of one or more of the prescribed pollutants as specified in the National Air Quality Strategy.

h) Proposals for new developments in areas of air quality exceedance, where people would be exposed for significant periods of the day.

In addition to the above, certain planning applications will need to be accompanied by an Environmental Statement (ES) under the requirements of the Town and Country Planning (Environmental Impact Assessment) Regulations 1999. Where air quality is considered a significant issue or where development is in or adjacent to an air quality management area, this EIA should include an air quality assessment.

London Borough of Croydon Air Quality Supplementary Planning Guidance No. 16.

Cases where an air quality assessment should normally be undertaken

- Proposals that will result in an increase in vehicle trip generation in the local area, and which will lead to increases in traffic volumes (AADT) of 5% or more on individual road links with existing flows of more than 10,000 vehicles per day.
- Proposals that may result in increased congestion and lower vehicle speeds than is present on the existing local road network.
- Proposals that significantly alter the composition of traffic such that adverse air quality impacts may arise.
- Proposals for new developments with 300 parking spaces or more or an increase in existing parking provision of 300 spaces or more.
- Proposals for coach and lorry parks.
- Any developments likely to have an adverse impact on air quality, particularly in sensitive areas (e.g. where predicted air pollution levels already exceed air quality objective levels by 10% or more).

NOTE: This list is not exhaustive, but is intended as a guide. The Council may require an air quality assessment to be undertaken in circumstances other than these, where it has particular concerns about the development or its proposed location.

London Borough of Croydon Air Quality Supplementary Planning Guidance No. 16

Portsmouth Local Development Framework Air Quality and Air Pollution Supplementary Planning Document Adopted March 2006.

Circumstances when air quality may be a material planning consideration for a development:

1. A national air quality objective or an EU Limit Value may be exceeded for the first time on a specific site if a development is permitted

This may arise where sensitive development is proposed outside existing AQMAs and close to existing sources of the identified air pollutants. In Portsmouth this is likely to include the following types of development:

- The introduction of residential, school, hospital, or library uses closer to busy roads than existing similar uses. This form of development may expose members of the public to pollutant concentrations above objective levels for nitrogen dioxide and PM10.
- The introduction of uses that allow public access closer to shipping lanes, ports, docks than existing similar uses. This form of development may expose members of the public to pollutant concentrations above objective levels for nitrogen dioxide, PM10 and sulphur dioxide.
- The introduction of residential, school, hospital or library uses close to petrol stations may expose members of the public to pollutant concentrations above objective levels for benzene.
- The introduction of new industrial or commercial uses that emit any of the identified pollutants in significant quantities. This is particularly applicable to processes prescribed under the Pollution Prevention and Control Regulations.
- The introduction of new sensitive uses closer to significant prescribed industrial processes than existing sensitive uses where the industrial premises is known to emit significant quantities of the identified pollutants.

2. The level of exceedance over a national air quality objective or an EU Limit Value will be made significantly worse if a development is permitted

This will mainly apply to polluting developments within existing AQMAs. In Portsmouth this is currently limited to developments that will add significantly to nitrogen dioxide concentrations within an AQMA such as:

- Developments, which will significantly increase traffic flow, change traffic composition or increase congestion within an AQMA.
- Developments which enclose streets and significantly reduce the dispersion of pollutants.

3. The concentration of an air pollutant for which a national air quality objective or an EU Limit value has been prescribed will approach an exceedance such that other developments in the area, particularly development plan allocations, might be prevented

This point refers to situations where development in an area takes place in a piecemeal fashion. Whilst each individual development might only have a minor impact on air quality, over time this could lead to progressive incremental increases in air pollution. This process might prejudice or result in more onerous requirements upon later developments to reduce the impact of air pollution. This could be particularly likely where air quality is already close to exceeding air quality objectives. A more holistic approach (whereby the net effect of all development in a particular area is considered) would be desirable but this would be difficult to implement, due to lack of foresight into which development sites are likely to come forward and indeed what affect these future developments may have on air quality objectives. In the main the local planning authority will consider the application of this principle in areas where significant development or regeneration is expected to

occur in several phases and some of these developments are polluting. In these instances the major development site may be the subject of an Area Action Plan (an area based planning policy document). If air quality levels in this area are close to exceeding objectives, a policy or consideration of air quality issues will be included in the Area Action Plan.

4. The number of people potentially exposed in sensitive uses to exceedances of national air quality objectives or EU Limit Values is increased if a development is permitted

By definition this will apply either where a polluting development may extend the area of an existing AQMA or where new sensitive development is proposed in areas where air quality exceeds objectives or limits but where an AQMA does not currently exist. It also applies where new sensitive development is proposed within an existing AQMA that would increase the population exposed above the objectives or limit.

Examples include:

- Introducing sensitive development for the first time into sites close to busy roads, which are currently exclusively or largely commercial or industrial in character and subject to air quality in excess of objectives.
- Introducing higher density development sites into areas subject to air quality in excess of objectives.

5. The likelihood of improving air quality in Air Quality Management Areas is significantly reduced if the development is permitted

This may apply to a range of potential developments if they were to prevent the City Council from carrying out actions to improve air quality. The measures that the City Council intends to take will be set out in the Local Transport Plan and the Air Quality Action Plan.

City of Derby Supplementary Planning Guidance Air Quality and New Development October 2003

An assessment of the air quality impact of proposals may need to be prepared for these types of development:

- proposals requiring a full Environmental Impact Assessment or Transport Assessment
- proposals that may result in increased congestion and lower vehicle speeds than is present on the existing local road network
- proposals that significantly alter the composition of traffic such that adverse air quality impacts may arise
- proposals for new developments with 300 parking spaces or more or an increase in existing parking provision of 300 spaces or more
- proposals for coach and lorry parks
- any other developments likely to have a significant adverse impact on air quality
- proposals for new residential development, or intensification of existing residential use, which would introduce new sensitive receptors* into an area of poor existing air quality, if this would result in the declaring a new AQMA or the amending of an existing one such that more people would be affected.

'Sensitive receptors' are defined in Appendix 2, according to the pollutant being considered, and the averaging period used.

APPENDIX 3

Renfrewshire Council triggers for consideration of air quality

Renfrewshire Council

Local air quality should be considered for the following developments where a single source is relevant. If more than one source is relevant to a particular development then more stringent criteria may be appropriate:

a) Sources

- 1) New roads and junctions with predicted traffic flows of greater than 10,000 vehicles per day in 2010.
- 2) New developments that are likely to generate over 1000 vehicles per day.
- 3) New developments that are likely to cause a high proportion of heavy vehicles, (eg buses or heavy goods vehicles) on local roads.
- 4) Any development that would lead to a road, with a traffic flow of greater than 10,000 vehicles per day, being bordered on both sides by buildings that are taller than the width of the road.
- 5) New Industrial Sources that could emit significant quantities of;
 - Carbon monoxide
 - Benzene,
 - 1,3-butadiene,
 - Lead,
 - nitrogen dioxide,
 - Sulphur dioxide, or
 - PM10.

These sources are likely to require Part A, Part B or IPC authorisations from SEPA.

- 6) Substantial developments at the following premises;
 - Mitsui Babcock, Porterfield Rd, Renfrew,
 - Ciba Specialty Chemicals, Hawkhead Rd, Paisley,
 - Highcraig Quarry, Johnstone,
 - Kilbarchan Quarry,
- 7) Changes to the boiler plant at Watson Grange, Napier St, Linwood
- 8) New boiler plants > 5 MWthermal
- 9) New railway developments within 15 metres of houses, schools and similar potential receptors.
- 10) New developments likely to significantly increase air traffic at Glasgow Airport.
- 11) New petrol stations within 10 metres of housing, schools and similar potential receptors.
- 12) New major petrol storage depots.

Receptors

New residential developments, schools, hospitals, libraries, hotels etc that would be close to;

- M8 motorway, M898 (Erskine Bridge) and A737 (within 50 metres of road edge)
- Roads and junctions with predicted traffic flows of greater than 10,000 vehicles per day.(within 30 metres of kerb)
- Railways and railway sidings (within 15 metres)
- Petrol stations (within 10 metres)
- Glasgow Airport (within 500 metres)
- Mitsui Babcock, Porterfield Rd, Renfrew (within 300 metres)
- Ciba Specialty Chemicals, Hawkhead Rd, Paisley (within 100 metres)
- Highcraig Quarry, Johnstone (within 500 metres)

Kilbarchan Quarry (within 250 metres)
Watson Grange, Napier St, Linwood (within 300 metres)

APPENDIX 4
List of consultees

Local authority consultation

Organisation	Contact Name	Job title
Aberdeen City	Andy Brown	Strategic Leadership
City of Edinburgh	Janet Brown	Environmental Health Officer
City of Glasgow	Dougie Veitch	Development Control Manager:
East Dunbartonshire	Maureen McGinley	Environmental health
Falkirk	Graeme Webster	Senior Environmental Health officer
North Lanarkshire	Jim Drummond	Air Quality Officer: Pollution Control
Renfrewshire	David Paris	Team Leader of Environmental Health Division
	John Smart	Development control manager
Dundee	Albert Oswald	Environmental health
Perth and Kinross	Ian Sleith	DC manager