AMBER VALLEY
BOROUGH COUNCIL

Environment Act 1995
Local Air Quality Management

UPDATING AND SCREENING ASSESSMENT

April 2006

Produced by Ian Shaw

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Executive Summary

This report is the second Updating and Screening Assessment which summarises the changes and developments that have taken place within the Borough since the last round of review and assessment of air quality for Amber Valley Borough Council which took place in 2003. It focuses on any significant changes to industrial, domestic and road transport sources within the past 12 months and evaluates the need for further investigation to determine whether the air quality standards and objectives are likely to be achieved or continue to be met if levels are currently below the standards.

Conclusions from the Progress Reports issued in 2004 and 2005 are listed in this document for reference and, together with the outcome of this report, consideration is given to the need for a detailed review for individual pollutants. The pollutants evaluated are:

- Carbon monoxide
- Benzene
- 1,3 Butadiene
- Lead
- Sulphur Dioxide
- Particulate matter (PM_{10})
- Nitrogen dioxide

There has again been little change since the Updating and Screening Assessment done for this Council in 2003 and the Progress Reports of 2004/05. The pollutants have been considered on an individual basis and a conclusion has been reached about the need for a detailed assessment in each case.

For all the pollutants listed above, previous reviews showed that the objectives were likely to be achieved in all areas and for all road links within the Borough. This Updating and Screening Assessment also shows that there is little likelihood of any air quality objectives being exceeded and it is not proposed therefore to proceed to a detailed assessment for any of the identified pollutants.

The Borough of Amber Valley

The borough of Amber Valley forms one of the nine Local Authority districts in Derbyshire. Located on the eastern side of Derbyshire, between Derby to the south, and Chesterfield to the north, the area gets its name from the River Amber, which flows, through it.

The area is comprised of four main towns; Alfreton, Belper, Heanor and Ripley, and is divided into twenty-five wards. Amber Valley covers just over 260 square kilometres and, apart from the towns, is largely rural in character. The present population, taken during 2004, is 118,200. The population structure is a product of the Industrial Revolution, when the country moved from an economy based on agriculture, to a manufacturing one. The physical resources and topography of the area made this a particularly significant event in the area.

Coal, limestone and sandstone provided the key natural resources, while the four rivers supplied valuable power sources. Water power on the Derwent allowed the textile industry to grow and prosper. The demand for iron, steel and coal grew in proportion and ensured the rapid development of Alfreton, Heanor and Ripley. The result of this industrial development is that the eastern part of Amber Valley has a distinctly urban character, whilst the west is rural, with a dispersed settlement pattern. The exploitation of natural resources has not only brought direct wealth, but provides a legacy upon which a thriving tourism industry is based.

The borough has almost 500 companies located within its 20 industrial estates, with a further 400 located on singular sites or within the urban areas. The gradual shift away from the two traditional industries of coal mining and textiles now means that the area is now well represented in a wide range of industrial sectors including instrument engineering, timber and furniture manufacture, hotels and catering, and business services; textiles and clothing is still a significant industry in Amber Valley.

Although based in the East Midlands, Amber Valley provides access to all parts of the country, including ports, airports and rail stations, without the major congestion problems of larger conurbations. Travel within the borough and local area is also

well provided for. Major roads, including the A38 and A6, run through the borough in a north-south direction. The A38 provides a busy link between Derby and junction 28 of the M1. The A609 and A610 also provide links to Ilkeston and Nottingham to the east. In addition, the A52 between Derby and Ashbourne cuts through the southern-most tip of the borough. The only rail stations in the area are at Belper, which is on the busy east coast mainline, and at Alfreton, with through trains to London, Manchester and the north. The River Derwent bisects the area from north to south, running parallel with the A6, Cromford Canal and the local rail line to Matlock.

The area can offer residents and visitors a wide variety of leisure facilities. A thriving tourist industry has developed with attractions such as the American Adventure World, National Tramway Museum, Midland Railway Centre, Kedleston Hall, Wingfield Manor, and numerous parks and gardens.

1 Introduction

Section 80 of the Environment Act 1995 required the production of a National Air Quality Strategy (NAQS). The approach to be adopted was set out in a Government policy paper in January 1995, *Air Quality: Meeting the Challenge*. This was followed in 1997 and the NAQS was accompanied by the Air Quality Regulations of the same year. Both these works have since been superseded by the Air Quality Strategy for England, Scotland, Wales And Northern Ireland 2000, and the Air Quality Regulations 2000, which sets down the framework for reducing air pollution at a national and local level, followed by the Air Quality (amendment) Regulations 2002.

The Environment Act 1995 also places an obligation on Local Authorities (L.A.'s) with s.82; this requires L.A.'s to review and assess the air quality of their areas against the statutory objectives set for seven of the pollutants in the Air Quality (England) Regulations 2000; disregarding ozone due to its transboundary nature (DETR, 2000). The 2000 regulations bring the legislation in line with the European Union Air Quality Daughter Directive 99/30/EC (see Table 1, Section 2 Air Quality Standards and Objectives), five of the Air Quality Objectives (AQO's) were tightened, two remained unchanged and one (PM_{10}) was relaxed due to uncertainty.

In February 2003 Government published an Addendum to the NAQS that proposed new Objectives for PM10 in 2010 whilst also setting down new Objectives for benzene and carbon monoxide. Provisional Objectives for PM10 have been set, which mark a significant tightening of the existing 2004 Objectives. For areas outside London in England and Wales a new annual mean objective of 20 µg/m3 is proposed, whilst the fixed 24-hour mean remains at the same level (50 µg/m3) but with only 7 allowable exceedence days (rather than 35). The new objectives have yet to be set in Regulations so do not currently require consideration, these objectives will not be reviewed in this report.

The system of L.A. involvement required by the Environment Act 1995 is termed Local Air Quality Management (LAQM). During periodic reviews the L.A. must assess their current and future air quality of their areas. If this process provides evidence of exceedences of the air quality objectives, the L.A. must designate an Air Quality Management Area (AQMA) for the area determined by the authority.

In Amber Valley this process started in 1999/2000 with the first Review and Assessment being undertaken. This was conducted in 3 stages and evaluated the likelihood of any of the air quality standards listed in the regulations being exceeded. The conclusions of that review are not reproduced within this report.

National and international policies are being implemented to bring about reductions in polluting emissions, particularly from road traffic and some industrial sectors. Local sources however, do have the potential to emit significant quantities of some pollutants and for this reason, review and assessment must be undertaken at the local level.

In order to ensure that the anticipated reductions in pollutant levels detailed in the previous reports occur as predicted and that the anticipated targets are still likely to be met, local authorities are required to conduct reviews on a 3 – yearly cycle. These consist of 3 parts: -

- An 'Updating and Screening Assessment' – this will be done in the form of a desk study to identify any changes that may have occurred since the last reports and evaluate whether these are likely to lead to improvement or worsening of pollutant levels and thereby determine any change to the risk of exceeding the standards and objectives. If this shows any increased risk then a 'Detailed Assessment will be required.
- A 'Detailed Assessment' – this will be a technical evaluation of current and future predicted pollutant levels by monitoring or modelling techniques.
- A Progress Report – this will be an interim desk study based report designed to highlight any potentially significant changes that may have

taken place in the intervening years between the Updating and Screening Assessments.

The guidance which sets the framework for the requirements of review and assessments, is provided in the form of the January 2003 DEFRA Revised Technical Guidance LAQM.TG(03) and Policy Guidance LAQM.PG(03), FAQs and updated LAQM tools; this includes revised modeled background concentration maps for NOX, NO2 and PM10, updated future year calculation tools and updates on specific sources (rail, shipping, poultry farms).

This report has been compiled in accordance with this guidance and presents the findings of the Updating and Screening Assessment 2006 for Amber Valley Borough Council.

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2 Air Quality Standards and Objectives

The standards and objectives proposed in the original Strategy released in 1997 were derived from recommendations made by the Expert Panel on Air Quality Standards and were based on scientific and medical evidence of the effects of a particular pollutant on human health. The standards were set at a level that was assumed would present minimum or no risk to health. A summary of the current standards and objectives is given in the table below.

Summary of objectives of the National Air Quality Strategy

Pollutant	Objective	Measured as	To be achieved by
Benzene	16.25 µg/m^3	Running Annual Mean	31 December 2003
	5 µg/m^3	Annual Mean	31 December 2010
1,3-Butadiene	2.25 µg/m^3	Running Annual Mean	31 December 2003
Carbon monoxide	10.0 mg/m^3	Maximum daily running 8 Hour Mean	31 December 2003
Lead	0.5 µg/m^3	Annual Mean	31 December 2004
	0.25 µg/m^3	Annual Mean	31 December 2008
Nitrogen dioxide[c]	200 µg/m^3 Not to be exceeded more than 18 times per year	1 Hour Mean	31 December 2005
	40 µg/m^3	Annual Mean	31 December 2005
Particles (PM_{10}) (gravimetric)[d] All authorities	50 µg/m^3 Not to be exceeded more than 35 times per year	24 Hour Mean	31 December 2004
	40 µg/m^3	Annual Mean	31 December 2004
Sulphur dioxide	266 µg/m^3 Not to be exceeded more than 35 times per year	15 Minute Mean	31 December 2005
	350 µg/m^3 Not to be exceeded more than 24 times per year	1 Hour Mean	31 December 2004
	125 µg/m^3 Not to be exceeded more than 3 times per year	24 Hour Mean	31 December 2004
Notes: µg/m^3 - micrograms per cubic metre mg/m^3 - milligrams per cubic metre			

New particle objectives for England, Wales, not included in Regulations

Region	Objective	Measured as	To be achieved by
Rest of England, Wales and Northern Ireland	50 µg/m^3 not to be exceeded more than 7 times per year	24-hour Mean	31 December 2010
Rest of England, Wales and Northern Ireland	20 µg/m^3	Annual Mean	31 December 2010

3 Consultation

As with the previous review and assessment reports, authorities are required to consult a number of bodies and organisations. Consultation will be undertaken in line with the guidance document.

Consultees for the Updating and Screening Assessment are:-

- The Secretary of State
- The Environment Agency
- Derbyshire County Council
- Neighbouring authorities

Copies of the Updating and Screening Assessment will be made available for public inspection at:-

- The Council offices
- Town Centre Bureaux
- Public libraries throughout the Borough
- The Council web site at http://www.ambervalley.gov.uk/

4 Aims of the Updating and Screening Assessment 2006

The purpose of the Updating and Screening Assessment is:

- To identify new or substantially changed emission sources since the last round of review and assessment which may lead to an air quality objective being exceeded.
- To consider the need for a detailed assessment, where a risk of exceeding an air quality objective at relevant exposure locations has been identified through the USA.

4 Conclusion of Progress Reports

The Progress Reports for 2004 and 2005 were prepared in accordance with the guidance given in LAQM.PRG(03). They addressed all the potential issues within the Borough that may impact on air quality but, since the area is semi-rural with four small towns as the main urban areas, no significant road links, no congestion problems or large industry, air quality is not considered to be a major concern for this Council. The following tables detail the conclusions for each individual pollutant for the years 2004 and 2005.

2004

Pollutant	Expected to achieve objective by prescribed date?	Progress to Detailed Assessment?
Carbon Monoxide	Yes	No
Benzene	Yes	No
1.3 Butadiene	Yes	No
Lead	Yes	No
Nitrogen Dioxide	Yes	No
Sulphur Dioxide	Yes	No
Fine Particulates	Yes	No

2005

Pollutant	Expected to achieve objective by prescribed date?	Progress to Detailed Assessment?
Carbon Monoxide	Yes	No
Benzene	Yes	No
1.3 Butadiene	Yes	No
Lead	Yes	No
Nitrogen Dioxide	Yes	No
Sulphur Dioxide	Yes	No
Fine Particulates	Yes	No

5 2006 Updating and Screening Assessment

5.1 Updating and Screening Assessment for Carbon Monoxide

The Updating and Screening Assessment was based on the guidance and checklists provided in the Revised Technical Guidance LAQM.TG(03), Policy Guidance LAQM.PG(03), and associated FAQs. The results are produced in Table 2 below.

Table 2

Data to be assessed	Work undertaken	Comments
Monitoring: (A) Monitoring data	Collate all CO monitoring data	No monitoring has been undertaken for CO.
Road Traffic (B) Very busy roads or junctions in built up areas	1. Identify 'very busy' roads and junctions in areas where the 2006 background is expected to be >1mg/m^3.	No road links within the Borough have daily average traffic flows (AADT) >80,000 for single carriageways, >120,000 for dual carriageways and there are no motorways within the Borough. Modelled background levels for the Borough are all < 1mg/m^3 (max = 0.406 mg/m^3).

Conclusion

Since the traffic flows and background concentrations of carbon monoxide are well below the criteria set in LAQM. TG(03) it is not necessary to proceed to a Detailed Assessment for carbon monoxide.

5.2 Updating and Screening Assessment for benzene

The Updating and Screening Assessment was based on the guidance and checklists provided in the Revised Technical Guidance LAQM.TG(03), Policy Guidance LAQM.PG(03), and associated FAQs. The results are produced in Table 3 below.

Table 3

Data to be assessed	Work undertaken	Comments
Monitoring: (A) Monitoring data outside AQMA	Collate all benzene monitoring data	No new data for this year. Monitoring results from 2004/05 max running averages < (0.46 ppb X 3.25 =) 1.495 ug/m^3
Monitoring: (B) Monitoring data inside AQMA		No AQMA Declared.

Road Traffic (C) Very busy roads or junctions in built up areas	1. Identify 'very busy' roads and junctions in areas where the 2010 background is expected to be >2ug/m^3.	No road links within the Borough have daily average traffic flows (AADT) >80,000 for single carriageways or >120,000 for dual carriageways. Modelled background levels for the Borough are all < 1 ug/m^3 (max = 0.486 ug/m^3).
Industrial Sources (D)New Industrial Sources	Check whether an air quality assessment has already been carried out for the new industrial source.	There are no new industrial sources in the Borough.
(E) Industrial Sources with substantially increased emissions, or new relevant exposure.	Determine whether any of the sources identified during previous rounds of review and assessment as potentially significant have substantially increased emissions. Also consider whether there is any new relevant exposure. You should also include sources in neighbouring authorities close to your boundary.	There were no sources identified during previous rounds of review and assessment as potentially significant. There is no new relevant exposure.
Other Sources (F) Petrol Stations	Identify petrol stations with a throughput in excess of 2000m^3 per annum with a 'busy' road nearby and relevant exposure within 10m.	One petrol station is located near to a road where AADT > 30,000 but no receptors located within 10m of pumps as site is on retail park.
Other Sources (G) Major petrol storage depots	Identify any major petrol storage depots	There are no major petrol storage depots in this area.

Conclusion

As there were no relevant road links, industrial processes or major petrol handling storage depots within this area as described in LAQM. TG(03) it was not necessary to proceed to a Detailed Assessment for benzene.

5.3 Updating and Screening Assessment for 1,3 - butadiene

The Updating and Screening Assessment was based on the guidance and checklists provided in the Revised Technical Guidance LAQM.TG(03), Policy Guidance LAQM.PG(03), and associated FAQs. The results are produced in Table 4 below.

Table 4

Data to be assessed	Work undertaken	Comments
Monitoring: (A) Monitoring data	Collate all 1,3-Butadiene monitoring data	No monitoring has been undertaken for either round 1 or round 2 reviews and assessments
Industrial Sources (B) New Industrial Sources	Check whether an air quality assessment has already been carried out for the new industrial source.	No new processes have been established in this area that use or emit 1,3-Butadiene.
(C) Industrial sources with substantially increased emissions.	Determine whether any of the sources identified during previous rounds of review and assessment as potentially significant have substantially increased emissions. Also consider whether there is any new relevant exposure. You should also include sources in neighbouring authorities close to your boundary.	No processes were identified in the first round or second rounds that emit significant quantities of 1,3-Butadiene. There is no new relevant exposure.

Conclusion

As there were no relevant industrial processes as described in LAQM. TG(03) it was not necessary to proceed to a Detailed Assessment for 1,3-Butadiene.

5.4 Updating and Screening Assessment for lead

The Updating and Screening Assessment was based on the guidance and checklists provided in the Revised Technical Guidance LAQM.TG(03), Policy Guidance LAQM.PG(03), and associated FAQs. The results are produced in Table 5 below.

Table 5

Data to be assessed	Work undertaken	Comments
Monitoring: (A) Monitoring data	Collate all lead monitoring data	Limited monitoring was undertaken for round 1 review, but data showed no likelihood of exceedences. No round 2 monitoring undertaken.

Industrial Sources (B) New Industrial Sources	Check whether an air quality assessment has already been carried out for the new industrial source.	No new process have been established in this area that use or emit lead.
(C) Industrial sources with substantially increased emissions.	Determine whether any of the sources identified during previous rounds as potentially significant have 'substantially' increased emissions.	No sites within the area have substantially increased emissions.
	Also consider whether there is any new relevant exposure. You should also include sources in neighbouring authorities close to your boundary.	There is no new relevant exposure.

Conclusion

As there were no relevant industrial processes as described in LAQM. TG(03) it was not necessary to proceed to a Detailed Assessment for lead.

5.5 Updating and Screening Assessment for Sulphur Dioxide

The Updating and Screening Assessment was based on the guidance and checklists provided in the Revised Technical Guidance LAQM.TG(03), Policy Guidance LAQM.PG(03), and associated FAQs. The results are produced in Table 6 below.

Table 6

Data to be assessed	Work undertaken	Comments
Monitoring: (A) Monitoring data	Collate all sulphur dioxide monitoring data	Previous monitoring data from an 8 – port bubbler (acidity) was used in round 1 review, but showed no likelihood of exceedences. Round 2 - monitoring undertaken again with 8 - port. Data for 2001 and 2002 show max daily mean to be 49*1.25= **61.25ug/m^3** (2001) 56*1.25= **70 ug/m^3** (2002). No further 8 – port monitoring has been undertaken.
(B) Monitoring within AQMA	No AQMA declared	
Industrial Sources (C) New Industrial Sources	Check whether an air quality assessment has already been carried	No new industrial sources likely to emit SO_2 have been identified.

	already been carried out for the new industrial source.	
(D) Industrial sources with substantially increased emissions.	Determine whether any of the sources identified during previous rounds as potentially significant have 'substantially' increased emissions. Also consider whether there is any new relevant exposure. You should also include sources in neighbouring authorities close to your boundary.	Sources identified in round 1 were found not to be likely to lead to exceedences. No processes have substantially increased emissions. The Part A2 process at Hanson Brickworks, Ripley has now ceased production.
(E) Domestic coal burning.	Identify areas where significant coal burning still takes place. Smokeless fuel has a similar sulphur content to coal so should be treated in the same way.	This was addressed in the 2003 Updating and Screening Assessment which concluded that detailed assessment was not required. The house condition survey conducted at the time showed coal burning to be declining in this area so further assessment is not necessary.
(F) Small boilers >5Mw.	Identify all boiler plant >5 MW (thermal) that burn coal or fuel oil.	No new boiler plant have been identified. Existing plant were assessed in the 2003 Updating and Screening Assessment.
(G) Shipping	N/A	N/A
(H) Railway locomotives	Identify locations where diesel or steam locomotives are regularly stationary for periods of 15 minutes or more.	No locations identified – transit stations only.

Conclusion

There were no relevant industrial processes as described in LAQM. TG(03). It is not necessary to proceed to a Detailed Assessment for sulphur dioxide.

5.6 Updating and Screening Assessment for PM_{10}

The Updating and Screening Assessment was based on the guidance and checklists provided in the Revised Technical Guidance LAQM.TG(03), Policy Guidance LAQM.PG(03), and associated FAQs. The results are produced in Table 7 below.

Table 7

Data to be assessed	Work undertaken	Comments
Monitoring: (A) Monitoring data outside an AQMA.	Collate all monitoring data.	Limited monitoring was undertaken for round 1 review, but data showed no likelihood of exceedences. No round 2 monitoring undertaken.
(B) Monitoring within AQMA.	No AQMA declared	
Road Traffic: (C) Junctions.	Identify 'busy' roads and junctions . It is only necessary to include busy roads or junctions not considered in previous review and assessment reports, where there has been a significant increase (>10% AADT) in traffic flows, or where there is new relevant exposure.	N/A – Scotland Only
(D) Junctions.	Identify 'busy' junctions.	All junctions with more then 10,000 vehicles per day were identified and assessed in Section 10.7 of the 2003 Updating and Screening Assessment. All relevant locations were predicted to be well below the 2004 objectives.
(E) Roads with high flows of buses and/or HGV's.	Identify all roads where AADT > 20% HGV.	No road links within area have AADT where HGV's >20%.
(F) New roads since last round of R&A.	Identify new road links.	No new roads have been constructed, or proposed.
(G) Roads with significantly changed traffic flows, or new relevant exposure.	Identify any roads with more than 10,000 vehicles per day (AADT) that have experienced 'large' increases in traffic. Also consider new relevant public exposure.	No roads with more then 10,000 vehicles per day have been identified that have been subject to 'large' increases in flow. No new relevant public exposure as no significant new developments adjacent to 'heavily trafficked' routes.
(H) Roads close to the objectives during the second round of R&A.	Identify any roads where between 25 and 35 days exceedence of the 24 hour objective were predicted at relevant locations.	In the 2003 USA, no road links or junctions were predicted to have more than 15 exceedences of the 2004 objectives. The revised background concentrations show a general decrease for PM_{10} but a further DMRB calculation has been done for the road link with the highest annual mean and number of exceedences. This is shown in the DMRB Table below. The annual mean for this link is still below 27 ug/m^3 and 17 exceedences are predicted.

Industrial Sources (I) New Industrial Sources	Identify any new processes likely to emit significant quantities of PM_{10}.	No new processes have been identified since the 2005 Progress Report and several industrial installations have now closed, including the A2 process at Hanson Brickworks.
(J) Industrial sources with substantially increased emissions.	Determine any sources identified in the first round that may have increased emissions.	No sources have been identified that have increased emissions.
Domestic Sources (K) Domestic coal burning.	Identify areas of significant coal burning.	The incidence of coal burning in the Borough was examined in the 2003 USA which concluded that detailed assessment was not required. The house condition survey conducted at the time showed coal burning to be declining in this area so further assessment is not necessary.
Other Sources (L) Quarries and Opencast Coal Sites.	Establish whether there is significant exposure 'near' to the dust sources.	There is currently only 1 quarry operating in the Borough and this has been considered in previous reports. All opencast sites and coal processing plant have now closed.
(M) Aircraft	Identify any relevant exposure.	There are no airports within 500m of this Borough.

Conclusion

There were no relevant industrial processes as described in LAQM. TG(03) apart from Crich Quarry which has been assessed in previous reports. The density of coal burning housing was also assessed in the 2003 USA which concluded that PM_{10} concentrations were well below the level likely to lead to exceedences and that coal usage was declining in the Borough. There are no significant changes to road traffic flows and the link with the highest predicted concentration has been re-assessed using DMRB and again found to be well below the criteria listed in the guidance. It was not necessary to proceed to a Detailed Assessment for PM_{10}.

DMRB Calculation

Current receptor			
Receptor Name	HEANOR	**Receptor number**	1
Assessment year	2006		

Results

Pollutant	Annual mean				For comparison with Air Quality Standards		
	Background concentration	Road traffic component	Total	Units	Metric	Value	Units
PM_{10}	24.2	2.64	26.84	$\mu g/m^3$	Annual mean	26.8	$\mu g/m^3$
					Days >50$\mu g/m^3$	17	Days

5.7 Updating and Screening Assessment for NO_2

The Updating and Screening Assessment was based on the guidance and checklists provided in the Revised Technical Guidance LAQM.TG(03), Policy Guidance LAQM.PG(03), and associated FAQs. The results are produced in Table 8 below.

Table 8

Data to be assessed	Work undertaken	Comments
Monitoring: (A) Monitoring data	Collate all monitoring data	Stage 3 report prepared for round 1 review included monitoring using chemiluminescent continuous analyser and bias adjusted diffusion tubes, but data showed no likelihood of exceedences on any road links. Further monitoring undertaken during 2004/05 which was reported in 2005 Progress Report. All road links currently well below objective.
(B) Monitoring within AQMA.	No AQMA declared.	N/A
(C) Narrow congested streets with properties located close to kerb.	Check whether these locations were considered in round 1 review.	Addressed in round 1 review (Stage 3 report) with continuous monitor and diffusion tubes. No likelihood of exceedences predicted. Checked again in Progress Report 2005.
(D) Junctions.	Check whether junctions were addressed in round 1.	The major junctions (Nottingham Road Ripley and Codnor Market Place) which have relevant exposure within 10m of the kerb were also addressed in round 1 (Stage 3 report). No exceedences likely. Again targeted in 2005 Progress Report
(E) Busy streets where people may spend 1-hour or more close to traffic.	Check whether relevant locations were assessed in round 1.	The only road link >10,000 vehicles per day with potential exposure for 1-hour is the A6 trunk road in Belper town centre. This was specifically targeted in round 1 (Stage 3 report) and Progress Report 2005.
(F) Roads with high flows of buses and/or HGV's.	Check whether road links with %HGV >25% were addressed in round 1 review.	No road links identified in traffic survey issued by Derbyshire County Council for this Borough that have HGV% > 25%.
(G) New or proposed roads since round 1 review.	Check for new roads.	No new or proposed roads since round 1.
(H) Roads close to objective in round 1.	Identify any roads where annual mean concentration above 36ug/m^3 but below 40um/m^3 at round 1.	All predicted levels validated by monitoring at round 1 (Stage 3 report) for relevant locations were < 36ug/m^3. Checked again in Progress Report 2005.

(I) Roads with significantly changed traffic flows.	Identify any roads with AADT > 10,000 that have experienced 'large' increases in traffic.	No road links identified in traffic survey issued by Derbyshire County Council for this Borough show 'large' increases in flow.
(J) Bus stations.	Identify any non-enclosed bus stations with relevant exposure within 10m where >1000 bus movements/day	Bus station in Belper is enclosed with no residential properties within 10m and <1000 movements/day. Bus station in Alfreton – no relevant exposure within 10m and <1000 movements/day.
Industrial Sources (K) New Industrial Sources	Identify any new processes likely to emit significant quantities of NO_X.	No new processes identified.
(L) Industrial sources with substantially increased emissions.	Determine any sources identified in round 1 that may have increased emissions.	No industrial sources were identified in round 1 review that were likely to cause exceedences.
(M) Aircraft.	Identify airports with emissions at <200m.	No airports in this Borough.

Conclusion

There were no relevant industrial processes as described in LAQM. TG(03). Monitoring results showed traffic emissions were still well below the objectives and it was not necessary to undertake a Detailed Assessment.

7 Local Air Quality Strategy

Since this authority has not declared any Air Quality Management Areas, no Local Air Quality Strategy has been produced. Previous reviews and assessments have shown that pollutant levels are likely to be comfortably below the targets by the appropriate dates and it was not considered necessary therefore to implement a local strategy. Actions will continue to be taken to reduce the impact of this Council on the environment (wherever possible) by individual departments rather than under the provisions of a local strategy.

8 Planning and Policies

No planning applications for new developments have been listed which have required air quality assessments.

There are no local planning policies directly relating to air quality. All relevant applications are considered on an individual basis for air quality implications and the Environmental Services Department has a direct input into the formulation of the Local Plan

9 Local Transport Plans

There are two Local Transport Plans in Derbyshire. The Derbyshire Local Transport Plan covers most of the County. The second Plan is the Derby Joint Local Transport Plan, which includes the whole of Derby and those parts of the County adjoining the city boundary. The quality of the Plans is currently being assessed by the Department for Transport with the results expected in December 2006.

This report will form part of the consultation response to provide input into the process.

10 Conclusion of Progress Report

This Updated Screening Assessment has been prepared considering the guidance issued by the Department for Environment, Food and Rural Affairs (DEFRA) that requires local authorities to carry out an Updating and Screening Assessments (USA) of local air quality by the end of April 2006 (LAQM.PG03). Further guidance considered was Frequently Asked Questions (FAQ's) on the LAQM helpdesk hosted by University of the West of England (UWE)[1]. This guidance is titled LAQM.TG(03) – Update: January 2006. The 2006 guidance was prepared to compliment the existing technical guidance LAQM.TG(03).

This assessment was intended to identify those aspects that have changed since the last round of review and assessment. The USA was also intended to indicate which pollutants and specific locations within the Borough require a Detailed Assessment (DA) that will have to be carried out by the end of April 2007.

[1] DEFRA LAQM helpdesk web-site http://www.uwe.ac.uk/aqm/review/index.html

This USA has addressed all the potential issues within the Borough that may impact on air quality but, since the area is semi-rural with four small towns as the main urban areas, no significant road links, no congestion problems or large industry, air quality is again not considered to be a major concern for this Council.

Previous monitoring exercises, from the first round of Review and Assessment, included stage 2 reports for sulphur dioxide, particulates and nitrogen dioxide and a stage 3 assessment of nitrogen dioxide. These indicated that all pollutant levels were either currently or anticipated to be well below the standards by the relevant objective dates. The monitoring results contained within this report confirm that

The results of the Updating and Screening Assessment completed in 2003 showed no change to these conclusions and the Progress Reports in 2004 and 2005 again showed no need for a 'Detailed Assessment'. The NO_2 diffusion tube survey conducted to inform the compilation of the Progress Report 2005 also indicated that the concentrations measured at all sampling locations are below the air quality standards.

As this USA has not identified any significant changes which may have impacted in the borough's air quality, it is not proposed to proceed to a detailed assessment for any of the pollutants listed.

Summary Table

Pollutant	**Detailed Assessment Required?**
Carbon Monoxide	No
Benzene	No
1.3 Butadiene	No
Lead	No
Nitrogen Dioxide	No
Sulphur Dioxide	No
Fine Particulates	No