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REVIEW OF ENVIRONMENTAL FACTORS

FOR PROPOSED RECONSTRUCTION AND WIDENING OF COWPASTURE ROAD 'WEEN NORTH LIVERPOOL ROAD, GREEN VALL AND ELIZABETH DRIVE, BONNYRIGG HEIGHTS

ENVIRONMENTAL PLANNING Pty Ltd

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August 2000

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Attachment 2 *Summary of Public Submissions*

Attachment 3 *Responses from Public Organisations*

Attachment 4 *Flora and Fauna Impact Assessments*, November 1997, G. Leonard

Attachment 5 *Acoustic Assessment for Reconstruction and Widening of Cowpasture Road from North Liverpool Road to Elizabeth Drive,* August 2000, Koikas Acoustics Pty Ltd.

SECTION A - PRELIMINARIES

1. Introduction

Cowpasture Road is a 12.8 km long arterial road that generally runs in a north-south direction between Bossley Park and Hoxton Park in the western region of metropolitan Sydney. Cowpasture Road has been classified as a State Road to reflect the important regional status it has gained through the continuing growth of the western region of Sydney. This section of Cowpasture Road is abutted by the rapidly developing residential areas of Bonnyrigg Heights and Cecil Hills located to the east and west of Cowpasture Road respectively. This land development and associated traffic generation has emphasised a need to improve the performance of Cowpasture Road which has been progressively reconstructed to four lanes north of Elizabeth Drive in recent years. The road functions as an inter-district primary road linking major growth and industrial areas and until the Western Sydney Orbital is open in 2007, Cowpasture Road will continue to provide for the north-south movements for this growing region of Sydney. The existing road serves local, commuter and business traffic including heavy vehicles with increasing traffic generation and delays.

The proposal is to reconstruct the 2.2 km section of Cowpasture Road from 200 metres south of North Liverpool Road, Green Valley to 300 metres north of Elizabeth Drive, Bonnyrigg Heights from an existing two lane undivided road to a four lane dual carriageway road in two stages. Stage 1 works would include upgrading the intersections of Cowpasture Road with Elizabeth Drive and Mount Street and reconstructing and widening Cowpasture Road for approximately 400 metres to just south of Mount Street. Stage 2 works would include upgrading the intersections with Gloucester Street and North Liverpool Road and reconstructing and widening Cowpasture Road from just south of Mount Street to south of North Liverpool Road. The proposal would improve traffic flow, safety and capacity for motorists, pedal cyclists and pedestrians along this section of Cowpasture Road. The Roads and Traffic Authority of NSW (RTA) is the proponent and it would be constructed by contractors.

2. Proposal Identification

Name of Proposal:	Reconstruction and Widening of Cowpasture Road from North Liverpool Road, Green Valley to Elizabeth Drive, Bonnyrigg Heights.
Directorate:	Sydney Operations.
Local Government Areas:	Fairfield City Council east side of Cowpasture Road. Liverpool City Council west side of Cowpasture Road and south of North Liverpool Road.
Construction Program:	Western Sydney Roads and Transport Programme.
Plan Registration Numbers	0648.156.CD.0008. 0648.156.CD.0009 for Stage 1.
Roadloc Co-ordinates:	Start R[0648 0060 A1 0.680] North Liverpool Road. Finish R[0648 0080 A1 2.080] Elizabeth Drive.

3. Proposal Description

3.1 Location

The proposal is located from 200 metres south of North Liverpool Road, Green Valley to 300 metres north of Elizabeth Drive, Bonnyrigg Heights in western Sydney as shown in Figure 1. Photograph 1 provides an aerial view of Cowpasture Road and the surrounding area although much residential development has been completed near Cowpasture Road since 1995 the date of the photograph.

3.2 General Features

The general features of the proposal are:

- reconstruction and widening of Elizabeth Drive for 2.2 km from a 2 lane undivided road to a 4 lane divided road (2 carriageways each of 2 through lanes plus turn bays) between 200 metres south of North Liverpool Road to 300 metres north of Elizabeth Drive. The reconstruction and widening would tie in with the adjoining existing 4 lane section north of Elizabeth Drive.
- widening of Elizabeth Drive to 6 lanes near the intersection with Cowpasture Road for about 250 metres on either side.
- use of the existing pavement as the southbound carriageway for the reconstruction and widening.
- provision for one 3.3 and one 3.8 metre wide dense grade asphalt pavement travel lanes in each direction separated by a 11.2 metre wide landscaped median (to allow for any future widening of Cowpasture Road to 6 lanes).
- installation of a 3 metre wide shared pedestrian and pedal cyclist way on the east side and 3.5 metre unpaved footway on the west side of Cowpasture Road.
- provision of left and right turning lanes from Cowpasture Road into North Liverpool Road/Frederick Road, Gloucester Street and Elizabeth Drive.
- replacement of the single lane roundabout on Cowpasture Road/Frederick Road with traffic signals at the widened intersection with North Liverpool Road.
- installation of traffic lights at the intersection of Gloucester Street with Cowpasture Road. In Stage 1 a temporary storage lane would be provided in Cowpasture Road to allow right hand turns into Gloucester Street.
- improving the intersection with Mount Street to limit all turns except for right turns (buses excepted) from Mount Street into Cowpasture Road.
- improving the signalised intersection with Elizabeth Drive to allow all turns.
- No Stopping restrictions would be imposed along both sides of Cowpasture Road.
- construction of noise attenuation measures of varying height along Cowpasture Road.
- relocation and adjustment of utilities and infrastructure under the footways to allow for a 6 lane road including placement of street lighting cables underground.
- provision of grassed swales and gross pollutant devices on all outlets to reduce pollutants in stormwater run-off from Cowpasture Road during operations.
- strip acquisition of publicly and privately owned land along Cowpasture Road, North Liverpool Road and Elizabeth Drive.

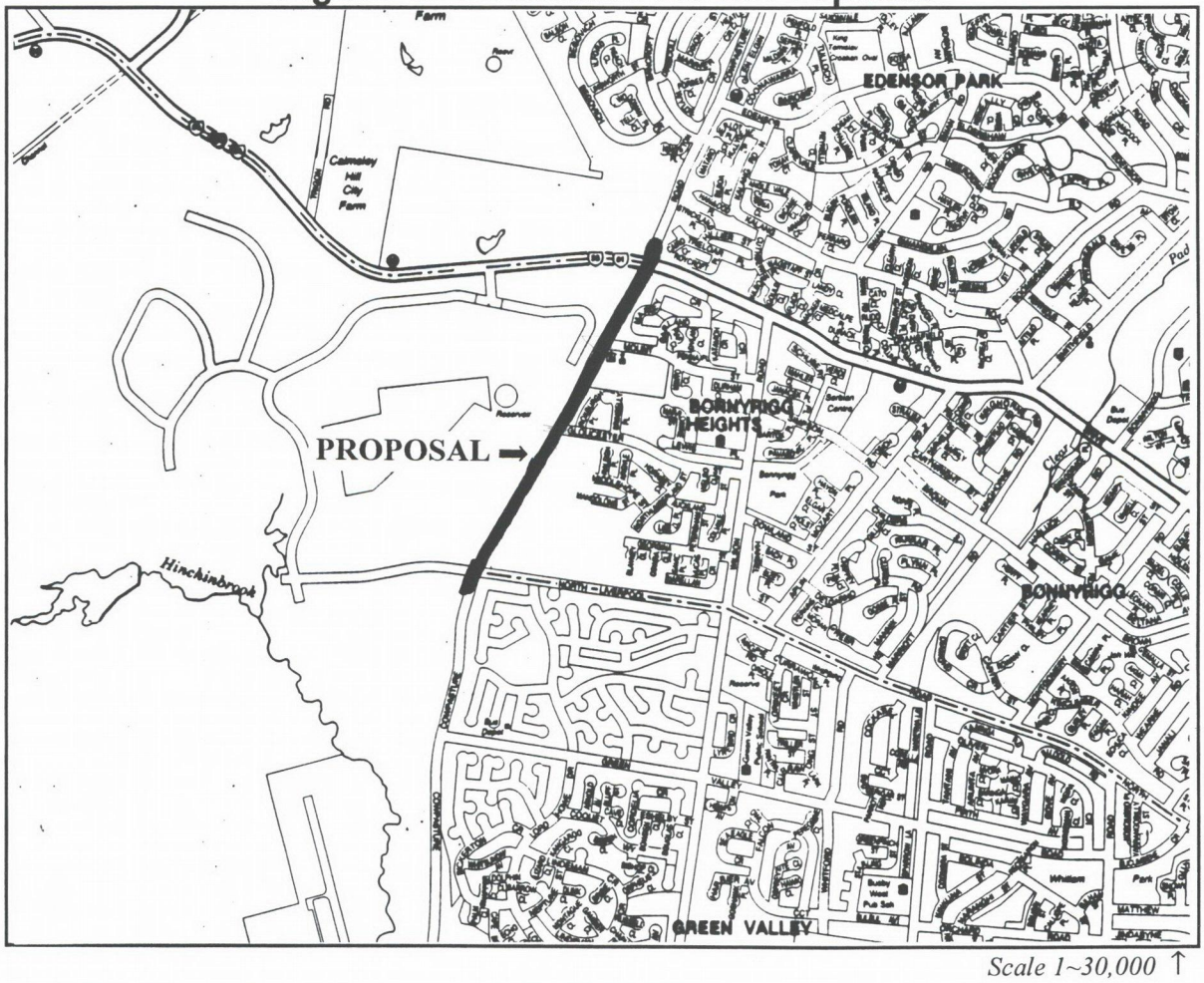
- creation of an easement to support the road batter on the west side of Cowpasture Road and north side of Elizabeth Drive.

The enclosed concept plans, typical cross sections and longitudinal sections in Figure 2 (the total length of works) and Figure 3 (Stage 1) show the existing and proposed road reconstruction and widening covering the 2.2 km length of works. Note that a pedestrian overbridge to be located south of Gloucester Street will be constructed by 2002 and is not part of the proposal.

3.3 Costs and Timing

The estimated cost for the concept development, environmental impact assessment, utilities adjustment, detailed design and construction of the proposal is approximately $12 million (in 2000 dollars) including project management and contingencies. Following favourable environmental assessment, determination of the proposal and detailed design it is anticipated that Stage 1 of construction would commence in February/March 2002 over a period of 12 months followed by commissioning in March 2003. Construction would include concurrent installation of noise attenuation measures as required. Due to funding constraints no timing has been set for completion of the remainder of the works between south of North Liverpool Road to south of Mount Street.

Figure 1. Location Plan of Proposal



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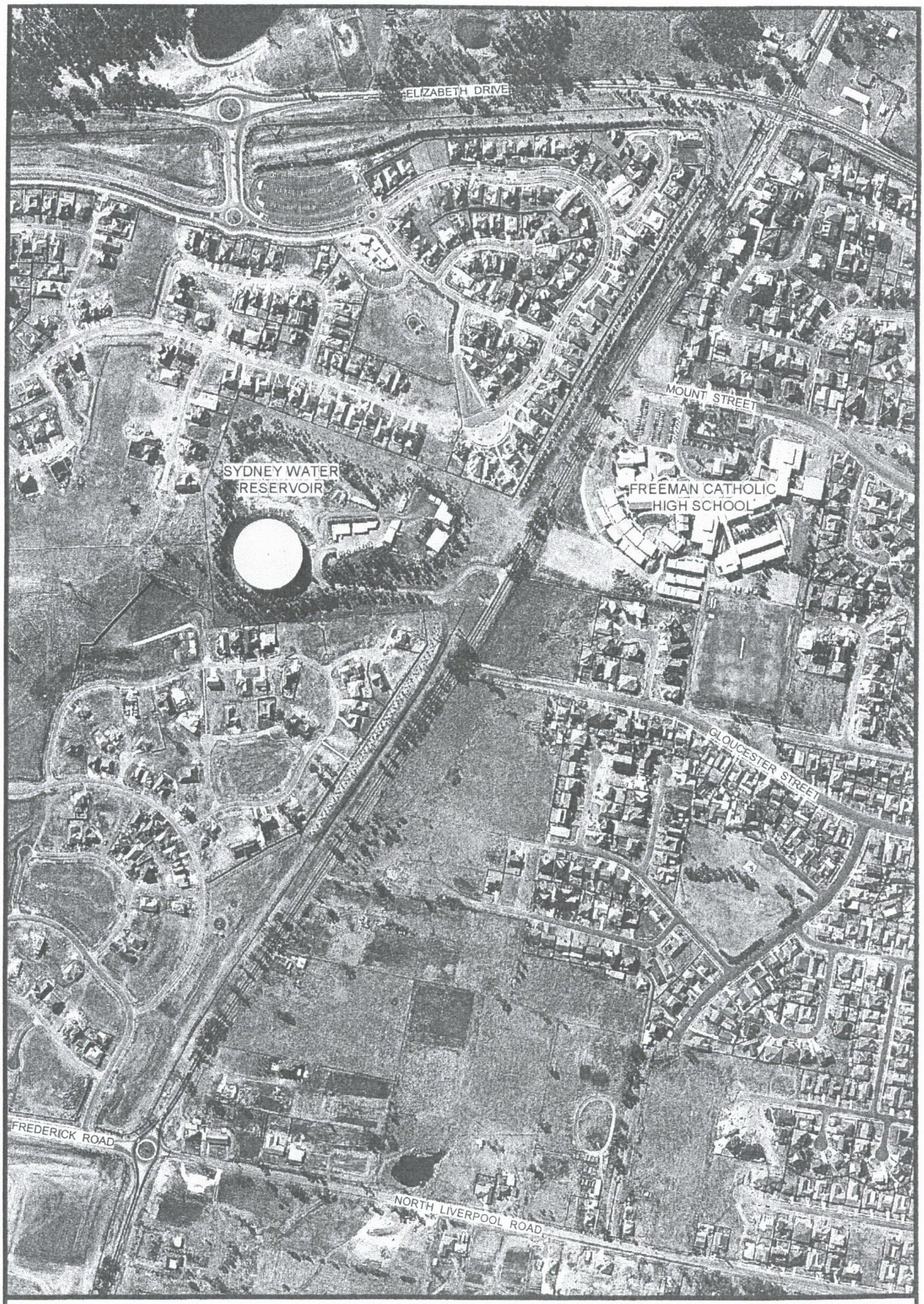


Photograph 1: Aerial View of Cowpasture Road and Environs

N

Photo date: circa 1995

Approximate Scale

0 100 200 300 400 500 m

RTA

COPYRIGHT

Ref: G352/98FBARM1

Figure 2. Plan, Typical Sections and Longitudinal Section of Proposal from North Liverpool Road to Elizabeth Drive

RTA Plan No.0648.156.CD.0008

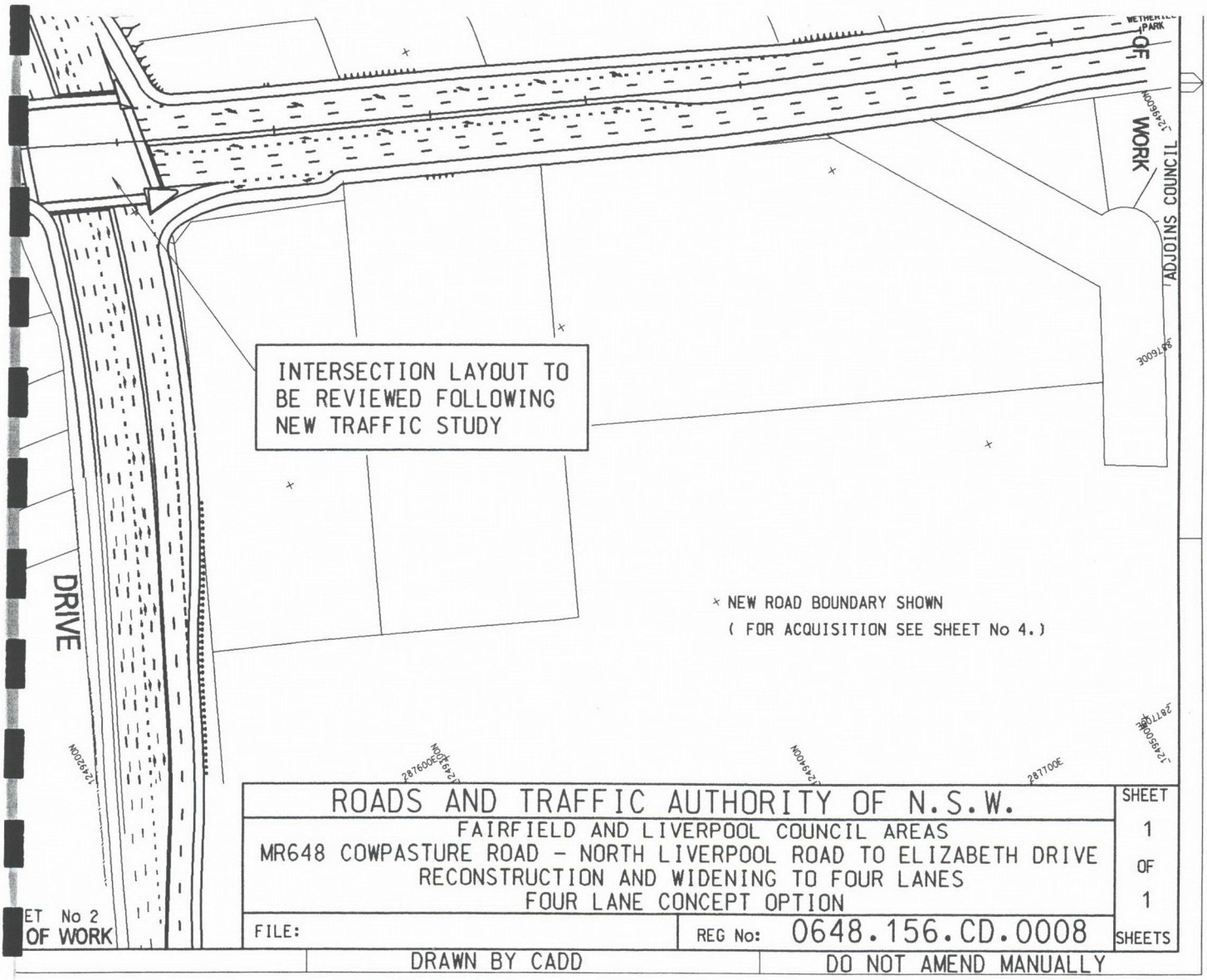
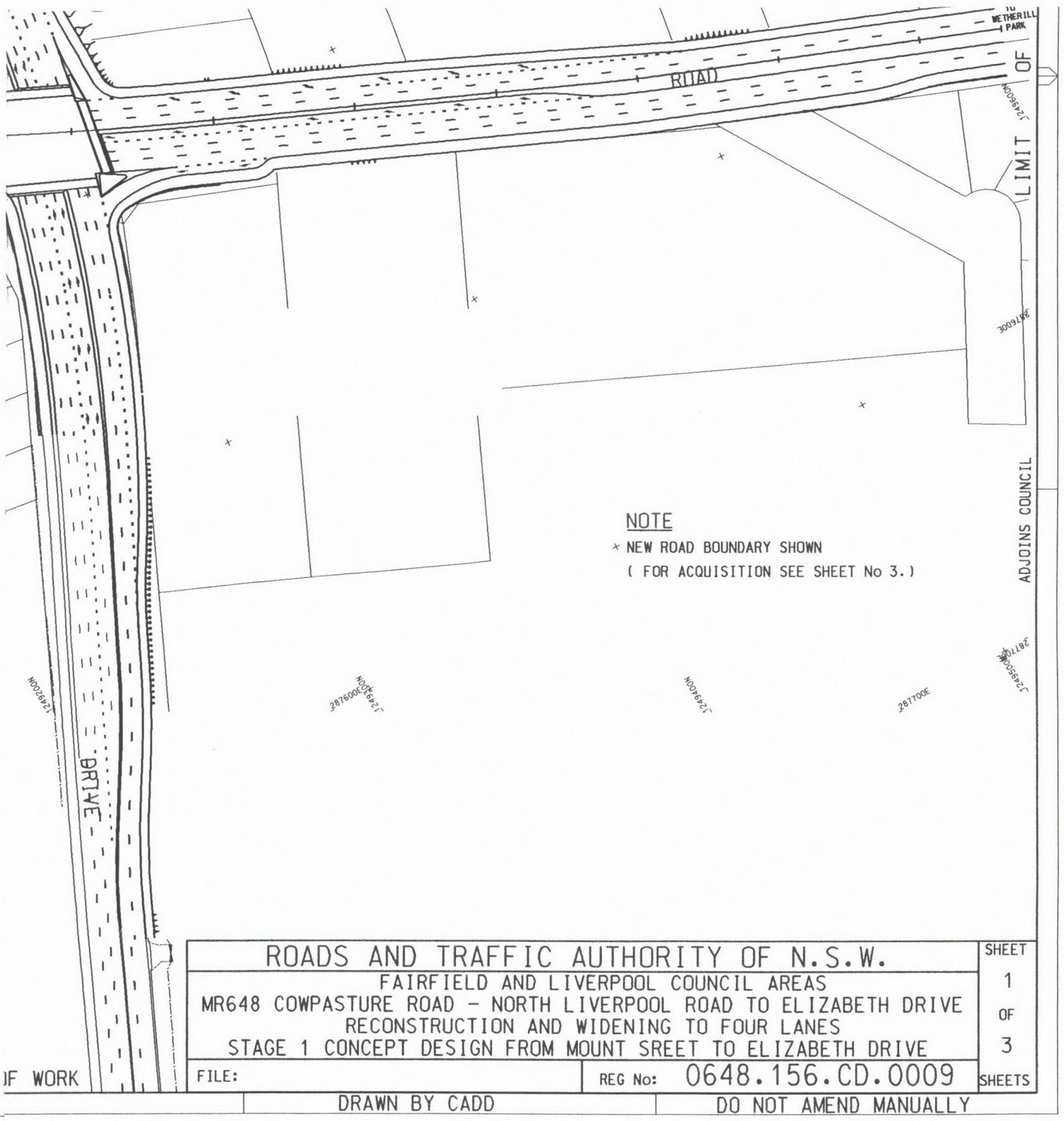


Figure 3. Plan, Typical Sections and Longitudinal Section for Stage 1 of Proposal from Elizabeth Drive to Mount Street

RTA Plan No.0648.156.CD.0009



4. Specialist Studies and Community Involvement

4.1 Specialist Studies

Traffic and civil engineering studies have been completed for the concept design of the reconstruction. Specialist environmental studies completed include noise measurements, predicted noise levels and identification of flora and fauna in the area of the reconstruction and widening. A safety audit has been completed for Stage 1 and another would be completed on the detailed design before construction of the proposal. The findings of the safety audit would be incorporated in the final design. A Value Management Study (discussed in Section 4.5) has been completed for the proposal. A Risk Management Study would be completed for the proposal before commissioning.

4.2 Display of the Proposal

The four lane dual carriageway concept design plans were put on public exhibition for two weeks from 2nd May to 16th May 2000 with an additional week for receipt of submissions at the following locations and times:

Wetherill Park Branch Library
Stocklands Town Centre
Polding Street
Wetherill Park
Monday, Tuesday, Thursday 9.30am to 8.00pm
Wednesday, Friday 9.30am to 5.00pm
Saturday 9.00am to Noon.

Wetherill Park RTA Motor Registry
Shop 1, Greenway Plaza
1183 The Horsley Drive
Wetherill Park
Monday to Friday 8.30am to 5.00pm.

Fairfield City Council
Fairfield Council Chambers
Avoca Road, Wakeley
Monday to Friday 8.30am to 4.30pm.
Saturday 9.00am to Noon.

In addition, a newsletter seeking comment on the proposal was available at the display locations and distributed to 2,500 households and businesses in the Cecil Hills and Bonnyrigg Heights areas near Cowpasture Road. A copy of the May 2000 Newsletter No. 1 is provided in Attachment 1. The NSW State Government Member for Cabramatta also issued a media release on the proposal in April 2000.

4.3 Summary of Public Submissions Received

Attachment 2 provides a summary of the 52 public submissions received by the RTA on the proposal and suggestions. Approximately 80% (41) of the submissions supported the proposal. Some of the respondents (11) did not support or were unsure of the proposal. Issues of concern and suggestions from the community ranged over a wide range of topics.

The main issues were the need to extend the reconstruction further along Cowpasture Road; improvements to intersections with Elizabeth Drive, Mount Street and North Liverpool Road; and installation of noise walls along the road. All of these suggestions have been incorporated within the proposal. A summary of the issues and suggestions from the community is also included in Attachment 2.

4.4 Community Involvement

A number of public organisations, utility and service providers and bus companies with a potential interest in the proposal were consulted in 1997 on an earlier scheme for the proposal and are listed below. Copies of the responses received (indicated by * in the listing) are provided in Attachment 3. In addition, Fairfield City Council, Liverpool City Council and John the Baptist Primary School and Freeman Catholic High School were consulted again on the revised proposal in July 2000. # denotes that representatives of the organisation attended the Value Management Study.

Fairfield City Council * #
Liverpool City Council #
Environment Protection Authority *
Department of Land and Water Conservation *
NSW National Parks and Wildlife Service *
Fairfield Police
Green Valley Police
Integral Energy *
Telstra
AGL Gas Companies (NSW) Limited
Sydney Water *
Optus Communications Pty Ltd *
Optus Vision Pty Ltd *
Bus and Coach Association * #
Busabout
Busways
Interline Bus and Coach Company
Bicycle New South Wales Inc./Camwest * #
Hoxton Park/West Hoxton/Prestons Progress Association
Central Precinct Committee of Liverpool City Council *
Green Valley Precinct Committee of Liverpool City Council
Horsley Park Protection Co-operative Progress Association
Bossley Park Progress Association
John the Baptist Primary School *
Freeman Catholic High School #.

The relevant and reasonable requirements of the public organisations, utility and service providers that have been consulted have been addressed in this Review of Environmental Factors (REF). A report which details the assessment of the REF and the final proposal will be available to the public for perusal at the Wetherill Park RTA Motor Registry and

PARLIAMENT OF NSW LEGISLATIVE ASSEMBLY

REBA MEAGHER M.P.
State Member for Cabramatta

Monday 17 April 2000

Upgrade Of Cowpasture Road From Elizabeth Drive To North Liverpool Road

Media Release

Local residents are being invited to comment on a State Government proposal to upgrade Cowpasture Road at Bonnyrigg Heights and Cecil Hills.

The Member for Cabramatta, Ms Reba Meagher, today unveiled a display for public comment featuring the proposed improvements, which include the widening of Cowpasture Road to a four-lane divided carriageway between Elizabeth Drive and North Liverpool Road.

"The upgrade would significantly improve traffic flow to cater for future growth in this developing area," Ms Meagher said.

"Access to the adjoining residential and industrial areas as well as safety for motorists, pedestrians and cyclists will be improved by the upgrade.

"This project will complement the $25 million upgrade of Cowpasture Road between Elizabeth Drive and The Horlsey Drive completed earlier this year.

"Cowpasture Road is a major north-south route in Western Sydney and provides access to the Wetherill Park and Smithfield industrial areas. A route strategy for Cowpasture Road and Camden Valley Way is currently being prepared. However the section of Cowpasture Road between Elizabeth Drive and North Liverpool Road has a high priority so planning has commenced ahead of the completion of the route strategy.

"The proposed improvements include a raised median separating north and south bound traffic and an off road pedestrian/cycleway along the eastern side.

"The cycleway will add to the expanding network of cycle facilities being provided by the State Government in the area, which include cycle paths already in place or currently under construction along Elizabeth Drive, Cowpasture Road and The Horsley Drive.

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48 Hill Street, Cabramatta
Email: ameagher@parliament.nsw.gov.au.

PO Box 605
Cabramatta, NSW 2166

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"The intersection of Cowpasture Road and Elizabeth Drive will be upgraded as part of the proposal, as will the intersection of Mount Street and Cowpasture Road.

"To improve traffic flow and safety traffic signals will be installed at the intersections of Glouceester Street and North Liverpool Road with Cowpasture Road.

"The proposed improvements will also include landscaping, improved treatment of stormwater run-off from the road, and noise walls or noise mounds as appropriate."

The proposal will be on display at Wetherill Park Motor Registry, Wetherill Park Branch Library and Fairfield Council Chambers from 2 May until 16 May 2000. A newsletter outlining the proposal will be delivered to local residents during the next two weeks.

Ms Meagher invited the community to view the proposal and provide written comments to the RTA.

"Following the display, comments received from the public will be assessed as part of a review of environmental factors to be undertaken by the RTA. Community input will be incorporated in the final design," Ms Meagher said.

For information Contact: Reba Meagher 9724 3381

ROADS AND TRAFFIC AUTHORITY

BRIEFING NOTE

ISSUE:

To provide an update on the privately funded pedestrian bridges project.

BACKGROUND

The RTA has put out to tender a first package of six pedestrian bridges to be constructed as part of the 26 pedestrian bridges project. One bridge at the Horsley Drive, Fairfield is currently under construction.

The second package of six bridges which is currently being developed, is anticipated to be tendered in October, 2001.

CURRENT POSITION

The attached table provides an update on each of the bridges in the program.

Only seven approvals have been received from Councils where development consent conditions have been agreed to and designs completed. Two additional approvals have been received from Councils where conditions have been agreed to and where designs are expected to be completed within the next four weeks.

Three additional bridges in the Parramatta/Hornsby area are subject to conditions which were unacceptable to the RTA. In addition, Hornsby Council has requested amendment to the design as the advertising did not meet the requirements of the new SEPP 64 (State Environmental Planning Policy No 64). This design has been amended and resubmitted to Council. The RTA is awaiting replies from both Parramatta and Hornsby Councils.

Bankstown Council has also advised that the design proposed for Hume Highway, Yagoona adjacent to Yagoona Primary School does not meet the requirements of the new SEPP. The development application was submitted to Bankstown Council in early February,2001, some five weeks prior to the release of the new SEPP. The RTA has written to the Department of Urban Affairs and Planning (DUAP) requesting that this design be reconsidered as acceptable and is currently awaiting advice from DUAP.

Five other bridge sites have been rejected, and these are:

1. Hume Highway, Bass Hill (rejection from Christ the King Primary School);
2. Appin Road, Ambarvale (rejection by Campelltown Council);
3. Beecroft Road, Cheltenham (rejection by Cheltenham Girls High School);
4. Victoria Road, Rozelle (rejection by Rozelle Primary School & Dept of Education);
5. Victoria Road, Parramatta (rejection by Parramatta City Council).

The RTA will continue to submit development applications and negotiate conditions with Councils for the remaining bridges from the package of 26 bridges in accordance with Strategies 2 and 3 below.

First package of bridges

On 8 May,2001 three shortlisted proponents were invited to submit a proposal for the construction, operation and maintenance of a package of six bridges (including advertising only on the seventh).

The six bridges to be built as part of the first package are:

1. Anzac Parade, Maroubra;
2. Cowpasture Road, Bossley Park;
3. Parramatta Road, Auburn;
4. Forest Road, Arncliffe;
5. Forest Way, Belrose;
6. King Georges Road, Wiley Park.

Submissions closed on 20 June 2001. One submission was received which was from Eye Corp Australia Limited (Boyd/Boyer).

Safetynet (comprising Leightons and Cody Outdoor) have formally declined to participate and have requested compensation from the RTA for costs incurred for the Bridges & VMS project. Following legal advice, the RTA has formally denied liability to the Safetynet consortium.

Manboom also have formally advised that they would not submit a tender based on the time limitations imposed in the tender documents.

The submission from Eye Corp is currently under assessment.

WAY FORWARD

Strategy 1 – Open Tender Packages

As only one proponent now remains from the previous three shortlisted proponents who is prepared to submit an offer, it is considered inappropriate on probity grounds for future packages of bridges to be offered to that proponent. Accordingly it is recommended that for future packages of pedestrian bridges, tenders be invited from the open market through an appropriate pre-registration process.

There have been two recent requests from potential new consortia expressing interest in constructing pedestrian bridges through limited rights to advertising.

The second package of bridges currently being developed includes the following six bridges:

1. Carlingford Road, Epping;
2. Pennant Hills Road, Carlingford;
3. Silverwater Road, Ermington;
4. Princes Highway, Blakehurst;
5. Cowpasture Road, Bonnyrigg;
6. The Boulevarde, Strathfield.

It is anticipated that approvals will be received from Councils, conditions agreed to and designs completed by late September 2001.

Strategy 2 – Allow advertising on existing structures to add commercial viability to the program

The RTA has many existing bridges and structures around the Sydney road network that would be suitable to attach advertising and where the sites meet RTA guidelines and SEPP 64. Some of the RTA's road reserves will also be suitable.

Utilising such structures would allow packages to be developed such that Councils that are co-operative can approve the additional advertising in their area at the same time they are approving the bridge with advertising. Packages would be more commercially viable and there is less cross reliance on other Council approvals.

Strategy 3 – Continue with a process of managing the program on a Local Government area basis not a site basis

A program of meetings with Councils at a very high level has commenced. Meetings have been held with the Mayor and General Manager of various Councils including Strathfield, Parramatta and Gosford where the needs and solutions in that Local Government area were discussed. Meetings are also being arranged with Camden, Bankstown and Wyong Councils.

In the Strathfield Council area agreement has been reached with Council to build a pedestrian bridge without advertising on the bridge with the advertising required to fund the bridge being located at two alternative locations.

Where possible and practical a strategy for the particular Local Government area is being developed with the Council and recommended for implementation. This strategy includes a mechanism for taking forward new issues/needs.

Where individual high priority sites arise these will either be dealt with under the strategy already agreed with Council, or taken forward on a one off basis.

Detailed discussions are continuing with Gosford City Council.

Wollongong Council have shown an interest in discussing a strategy for Wollongong.

POSITION SUMMARY

- It is expected the RTA will be in a position to let the first package of work by late September 2001 subject to satisfactory negotiation with the sole tender Eye Corp.
- The next package of bridges will be available to go to the market in October 2001.
- The RTA will continue to negotiate solutions on a Council By Council basis.

Contact: David Stuart-Watt
Director, Client Services

Telephone No: 9831 0970

M01/4798

SCS/RS&RUM

the RTA Parramatta and Blacktown offices. The final outcomes of the proposal will also be advertised in the *Fairfield Advance, Fairfield Champion, Liverpool Champion* and *Liverpool Leader*.

4.5 Value Management Study

The Value Management Study held on 27th July 2000 addressed the concept design of the proposal, traffic engineering, environmental and community concerns. The study confirmed the concept design for the proposal subject to the RTA:

- meeting with Westbus to discuss their needs as well as options and implications that may allow the closure of the median at the Mount Street intersection.
- meeting with Fairfield City Council to determine the need for any treatment of the Mount Street and Wilson Road intersection.
- meeting with representatives from John the Baptist Primary School, Freeman Catholic High School, Fairfield and Liverpool City Councils to discuss the extent and type of noise attenuation measures to be provided.
- discuss with Fairfield and Liverpool City Councils their future development requirements for North Liverpool Road and Frederick Road in order to size the intersection appropriately.
- review the need for retention of existing vegetation including trees in the median while considering road safety.
- investigate staging options and review the Stage 1 elements to see if a "do minimum" signalised treatment is possible at the North Liverpool Road intersection.

SECTION B - ENVIRONMENTAL IMPACT ASSESSMENT

5. Strategic Stage

5.1 General

No suitable high volume north-south transport routes presently traverse the western Sydney region. Cowpasture Road serves local, commuter and business traffic and functions as a main road linking major residential and industrial growth areas. Until the Western Sydney Orbital is open in 2007, Cowpasture Road will continue to provide for the main north-south movements for the growing region of western Sydney. With expected residential and employment generating development in western Sydney over the next decade, existing roads such as Cowpasture Road will become more heavily trafficked. Without the proposal, local communities in the areas immediately surrounding Cowpasture Road would suffer a reduction in traffic safety, increased inconvenience and adverse environmental impacts from higher traffic flows. The efficiency of the road based public transport system would also decline.

Cowpasture Road is classified as State Road 648 which fulfils a role as a vital link in the metropolitan Sydney main road network as well as catering for the needs of the surrounding local communities. Cowpasture Road provides the main access between the industrial area of Wetherill Park and the residential areas of Bossley Park, Edensor Park and Abbotsbury to the north; and the residential and industrial areas west of Liverpool, such as Green Valley, Hichinbrook, Hoxton Park, Carnes Hill and Prestons to the south. As part of the on-going development programme in western Sydney, Cowpasture Road is being upgraded in stages by the RTA to meet traffic needs in the area. The section of Cowpasture Road between Elizabeth Drive and The Horsley Drive was reconstructed and widened to four lanes in the late 1990s. An extensive safety and traffic management programme and measures to improve traffic flow and safety is being implemented along the rest of the road. The RTA's operational strategy for the main road network including links such as Cowpasture Road is to:

- provide a high standard link between urban centres.
- develop and implement a safety strategy for the main road.
- promote safe travel by providing continuity of standard along the main road.
- adopt measures to reduce accident potential and improve traffic flow.

The result including the proposal would be improved safety, amenity and access for travellers, pedestrians and cyclists; and a higher level of service, traffic flow and capacity for future growth along Cowpasture Road. It would also draw traffic from less appropriate local road routes and improve amenity along these roads.

The RTA's strategy for Cowpasture Road is consistent with the various strategies developed under the NSW whole of government approach as outlined over.

Sydney Ports into the 21st Century.
A key component of the ports transport strategy is support for improved road and rail access to the ports and to intermodal freight terminals.

Cities for the 21st Century, Department of Urban Affairs and Planning, 1995.
The Department's strategy is to integrate the transport infrastructure with land use to improve access to jobs, housing, and services, thus creating more compact cities. The main principles of their strategy involve:

- minimising travel demand,
- promoting efficiency and equity,
- containing linear expansion along transport corridors, and
- relating areas of job concentration to transport infrastructure.

Action for Transport 2010 - An Integrated Transport Plan for NSW, 1999, Department of Transport provides a long-term vision for meeting the land based transport needs of NSW. The Plan contains a construction program for the expansion of the rail and bus network and major roads. The Sydney plan includes completion of the Liverpool to Parramatta rapid bus transitway by 2003 and the Western Sydney Orbital by 2007. The companion document *Bike Plan 2010* makes provision for bicycles in all new major road infrastructure projects with a strong preference for off-road cycling.

State Road Network Strategy, Roads and Traffic Authority, 1994.
The draft *State Road Network Strategy* was released by the RTA in January 1995 and set out a framework for planning and managing the NSW road network over the next 20 to 30 years. The draft *Strategy* is based on analyses of population growth and distribution, urban growth, economic change, development opportunities, environmental constraints and the total transport needs of passengers and freight - all within a framework of ecologically sustainable development objectives. The main themes of the draft *Strategy* are to facilitate and support State and regional economic development; moderate traffic growth, rather than strive to satisfy unrestrained demand for travel; and progress towards the achievement of ecologically sustainable development objectives. This involves the linkage of major nodes, such as transport interchanges, major land uses and major regional and sub-regional centres.

5.2 Planning and Environmental Background

The Cumberland Highway located east of Cowpasture Road presently serves as part of the interim National Highway. The Western Sydney Orbital proposal will ultimately become the National Highway and will intersect with Cowpasture Road at West Hoxton as part of a larger program of transport improvements for the Sydney region and has three main functions. Firstly, it is recognised as an important component of Sydney's road network, completing a high standard orbital road linking major employment and residential areas of Sydney; secondly, it would link the northern and southern sections of the National Highway system through Sydney; and thirdly, it would form an integral part of the main road connection to Sydney's Second Airport to be located at Badgerys Creek. The importance of the link has been recognised by Sydney's metropolitan strategy, *Cities for*

the Twenty-First Century, and supporting documents *Action for Transport 2010 - An Integrated Transport Plan for NSW* and the draft *State Road Network Strategy*.

The Western Sydney Orbital is needed to facilitate public transport and freight movements in western Sydney, support the employment generating activities which would be attracted to Sydney's second airport and to support other development in western Sydney. It would also assist in linking emerging residential and employment areas by establishing one part of an efficient orbital road network while providing people in western Sydney with more equitable access to significant employment opportunities. Cowpasture Road would form an important link to the southern end of the Western Sydney Orbital.

Cowpasture Road would also form an important link to the Liverpool to Parramatta rapid bus transitway by helping provide access to Parramatta from the south-west including Bonnyrigg and Cecil Park.

The *Urban Infrastructure Management Plan* aims to improve NSW Government infrastructure management in the greater metropolitan region of Sydney, the Central Coast, Wollongong and Newcastle. Infrastructure decisions need to better reflect the Government's commitments and strategies for social justice, economic development and sustainable employment, environment protection and financial responsibility. The aims of the Plan are:

- strengthening the links between existing urban management strategies, and between these strategies and infrastructure management.
- identifying priority projects, issues and opportunities for new investment over the next five years.
- recommending processes to be used or issues to be addressed that improve delivery of infrastructure on the ground.
- identifying opportunities for improved integration in infrastructure planning.
- analysing and displaying the geographic distribution of major infrastructure expenditure across the greater metropolitan region and within the Government's policy areas.

The Plan has a five-year outlook and an annual series. The Plan helps State agencies such as the RTA to work together more effectively to deliver projects that meet the Government's urban management commitments. It does this by presenting a whole-of-Government overview of current infrastructure investment on a regional basis and by policy areas. The Plan also encourages integration by identifying important issues and projects. One of the projects identified is improvement to Cowpasture Road between Leppington and Bossley Park by 2003 at a cost of $40 million.

The NSW Government's vision for the future of the greater metropolitan region is outlined in a series of strategy documents, such as *Cities for the 21st Century*, and in its policies, goals and legislation. In addition, the NSW Government's four key commitments are the foundations of the Plan. These are:

- integrating environment protection into all activities.
- encouraging economic development and sustainable employment.

- achieving greater social justice for all members of the community.
- delivering more financially responsible programs that reduce public debt and unfunded liabilities.

Transport and social justice projects and issues were identified in the Plan as among the most critical for immediate action. Improved equity of access to employment centres throughout the greater metropolitan region is critical for social justice. The Greater Western Sydney Public Transport Strategy, for example, will improve public transport in the region. To implement the Strategy and the integrated transport plan, the Government will consider a five year funding program for public transport.

Transport is a critical element in economic development and sustainable employment growth in the greater metropolitan region. Efficient transport systems and routes across the greater metropolitan region for people and freight must be identified and delivered.

The NSW Government's air quality management plan *Action for Air* links public transport options with improved air quality in the greater metropolitan region. The Plan highlights transport infrastructure initiatives which will reduce growth in the total vehicle kilometres travelled in the greater metropolitan region.

The RTA's February 1995 *Roadside Environment Strategic Plan* forms part of the commitment expressed in the RTA's Environmental Vision being *a roads and traffic system in harmony with the natural and social environment, while meeting community mobility needs.* In addition the Roadside Environment Policy states *in partnership with local government, other agencies and the community, the RTA will work to improve the management and enhancement of the roadside environment.*

The *Roadside Environment Strategic Plan* has a number of ecological, social and economic functions, environmental factors and environmental management components that would apply to the proposal including:

- establishment and maintenance of indigenous vegetation.
- controlling weeds in the road corridor.
- soil conservation during planning, construction and maintenance.
- to protect watercourses and their associated habitats.
- recognising scenic values in roadside corridor management and maintenance.
- consideration of safety issues and roadside corridor management.
- planning and design of roadside structures.
- development of appropriate land uses adjacent to the road corridor which complement roadside values.
- permit limited and appropriate commercial activities within the roadside corridor.
- need for community involvement.
- pollution control and management.
- to provide for public utility services.

5.3 Strategic Justification and Needs Definition

The reconstruction and widening of Cowpasture Road will play an increasingly important role in the main road network in serving the existing and impending residential and industrial developments in the surrounding area. Road based transport and local traffic needs will increase dramatically in the Hoxton Park and Wetherill Park areas with rapid residential and industrial development respectively. For example the Sydney Urban Development Program forecasts production of nearly 6,000 residential lots (around 17% of the total Urban Development Program lot production in the Sydney region) in the Fairfield (South Abbotsbury and South Bonnyrigg) and Liverpool (mainly Carnes Hill and Prestons) local government areas in the next five years. Some of this residential development will take place in release areas with indirect access to Cowpasture Road. Each of these dwellings is expected to generate approximately 9 daily vehicle trips or 54,000 additional trips a day on the local road network. In addition Fairfield and Liverpool have over 300 hectares of developable employment land for future industrial land uses.

A study was undertaken (*Cowpasture Road Traffic Study*, May 2000, Sinclair Knight Merz Pty Ltd) to review the requirement for upgrading Cowpasture Road from 2 lanes to 4 lanes between North Liverpool Road and Elizabeth Drive. The analyses involved the use of modelled traffic projections for the existing conditions (2000) and future (2016) scenarios and considered a number of studies in the area, greater Sydney and construction of the Western Sydney Orbital. The conclusions of the study were that:

- Two through lanes are required on the North Liverpool Road and Frederick Road approaches to Cowpasture Road.
- At the Cowpasture Road and Elizabeth Drive intersection only one right turn bay is required on the west and east approaches while a normal left turn bay is required on the east approach.
- Three through lanes are required on Cowpasture Road with a toll on the Western Sydney Orbital.

Benefits of the Proposal

The RTA in accordance with their *Economic Analysis Manual* carried out an economic analysis of the proposal. The total vehicle travel times and the total travel distances for the existing and the improved road networks were derived from traffic modelling. The results indicate that substantial benefits would be derived in terms of travel time savings and vehicle operating costs in the road network. Table 1 lists these benefits (accrued over the next 30 years and discounted at 7% to present value) and other economic indicators for the proposal.

Table 1 Benefits of the Proposal

Parameter	Result
Discounted Benefits	$50 million?
Discounted Capital Costs	$10 million?
Nett Present Value	$25 million?
First Year Rate of Return	40%?
Benefit Cost Ratio	3.0?

Source: RTA

Benefits derived from the proposal are:

- Facilitating economic growth in the area by improved traffic flow and level of service for road based transport.
- Reduced number of accidents.
- Improved safety and amenity for pedestrians and cyclists by providing a continuous shared footway/cycleway and incorporating separate facilities for their needs at the major intersections.
- Provision of noise walls and landscaping to enhance the amenity of residential areas.
- Facilities to reduce pollutants in stormwater runoff from the road.

Cowpasture Road is a key link in the local road and main road network. Reconstruction and widening of Cowpasture Road is essential to meet the future transport needs of the surrounding residential and industrial areas as well as meeting the functions of a main road. The existing two lane road would not meet these future local traffic needs and main road functions with the large expected increases in traffic. In summary, the reconstruction and widening of Cowpasture Road is essential to cater for future traffic volumes.

6. Concept Stage

6.1 Objectives

The six objectives of the draft *State Road Network Strategy* for the road network are:

- moderated demand for roads and balanced use of transport.
- a road network promoting economic development and meeting community needs.
- a road network maintained in acceptable condition at minimum long-term cost.
- reduced transport costs and improved vehicle efficiency.
- road safety with fewer road deaths and serious injuries.
- care for the environment during road planning, construction, maintenance and use.

The regional and local objectives of the RTA's forward strategy for the area are:

- provide increased capacity for the western Sydney area.
- maximise community benefits to ensure value for money for expenditure of funds.
- improve pavement condition to provide safer and trafficable travel for the community and reduce long term maintenance costs.
- improve network efficiency by reducing congestion across the network.
- improve road safety by reducing congestion across the network.
- protect the existing environment.
- improve pedestrian and cyclist safety for the local community.
- reduce accidents.
- achieve continued community support for the project.

The objectives of the proposal decided by the Value Management Study are as follows:

- Improve safety for all road users including pedestrians and cyclists;
- Provide safe and efficient access to large adjoining residential developments;

- Improve infrastructure capacity to support the State Government's urban development programme.
- Reduce road transport costs by reducing delays and improving traffic efficiency;
- Provide improved bus facilities;
- Improve the vertical sight distance to minimum of 70 km/hour;
- Improve bicycle facilities with provision of a separate bicycle lane;
- Improve water quality by treating discharge from the road pavement;
- Improve the existing pavement and provide new pavement suitable for 20 years at a minimum whole of life cost.
- To achieve community acceptance.
- To satisfy environmental requirements where cost effective and practical.

The above objectives for the proposal are in accord with the draft *State Road Network Strategy* and the RTA's strategy for the area and environmental policy which states *the RTA is committed to using best practical environmental technology, planning and management techniques in all its activities.*

6.2 Options

There are a limited number of options for the arrangement and treatment of the Cowpasture Road reconstruction and widening taking into account the constraints imposed by the existing alignment, adjacent improvements and the relatively narrow width of the road reserve which needs to be widened. The Value Management Study (Section 4.5) explored and recommended a number of options for the proposal. Given the need to resolve traffic delays, improve safety and cater for the large traffic growth expected along the road in future, the 'do nothing' or 'do minimum' option was not considered acceptable. Alternative transport modes such as upgrading public transport systems are considered in documents such as *Action for Transport 2010 - An Integrated Transport Plan for NSW* and are beyond the scope of the REF.

Two major options were considered. Option 1 (the proposal) would be a four lane divided road with a wide 4.6 metre median to incorporate right turns at the intersections and traffic lights at Gloucester Street. Option 2 would be a four lane divided road with a narrow 1.6 metre median, with right turns banned at Gloucester Street and Mount Street. In both options the existing Cowpasture Road pavement would be retained as the south bound carriageway and traffic lights would be provided at North Liverpool Road.

6.3 Proposal Selection

A number of criteria were used for selection of the proposal including:

- consideration of the objectives for the area and proposal.
- minimising costs and maximising benefits (the benefit cost ratio is >2 for the proposal).
- reducing potential environmental impacts wherever possible.
- providing route consistency (that is, a need for 4 lanes all along Cowpasture Road).
- reducing any impact on utilities where possible.

- improved operational performance by considering forecast traffic demands relevant to the reconstruction and widening arrangements within reasonable cost and services influences.

Concept road design determined that Option 2 with a narrow median was not feasible because the distance between each intersection along Cowpasture Road was not long enough to allow changes in the horizontal alignment. Hence taking into account the above factors Option 1 is the preferred option with an additional advantage of a cross section that matches the design standard of Cowpasture Road north of Elizabeth Drive. The preferred option would require the RTA to use the proposed road widening on the eastern side for noise attenuation measures and acquire another strip of public land on the western side to accommodate the four lane carriageway. Additional land acquisition would be required for corner splays at North Liverpool Road, Gloucester Street, Mount Street and Elizabeth Drive to allow four lanes and bus turning movements.

The reconstruction and widening proposal provides the most suitable and appropriate scheme for the treatment of Cowpasture Road. It would be consistent with other sections of Cowpasture Road north of Elizabeth Drive and would have environmental impacts no greater than any other four lane options. The proposal meets the immediate and recognised needs for Cowpasture Road while considering the economic and engineering constraints and can be generally constructed safely within a widened road reserve with minor land acquisition. The Level of Service [1] would improve from D to C, Degree of Saturation[2] reduce and average vehicle delay in seconds per vehicle reduce for travel along Cowpasture Road with the proposal. The proposal would meet community and RTA objectives and can be justified on strategic, environmental, engineering and community grounds. In addition the proposal is in accord with some of the principles of ecologically sustainable development.

Having selected a feasible reconstruction and widening alignment and form there are also numerous alternatives available with regard to design elements such as materials, roadside furniture, finishes, noise attenuation measures and landscaping. These elements would be refined in the detailed design. The design elements to be selected would be compatible with and match materials in the surrounding roadside and urban environments.

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[1] *In accordance with AUSTROADS 2 - Level of Service A is a condition of free flow with high speeds and low traffic volumes. Level of Service B is stable flow where drivers have reasonable freedom to select their speed. Level of Service C also has stable flow but most drivers have restricted freedom to select their speed, change lanes and overtake. Level of Service D approaches unstable flow with nearly all drivers restricted corresponding to tolerable capacity. Level of Service E is for traffic volumes at or near capacity with unstable flow and momentary stoppages. Level of Service F is forced flow operation at low speeds caused by demand exceeding capacity.*

[2] *Degree of Saturation is a measure of the operational performance of the reconstruction. For travel controlled by traffic signals both queue length and delay increase rapidly as the Degree of Saturation approaches 1 and it is usual to attempt to keep the value to less than 0.9 to prevent queues and delays.*

6.4 Statutory Planning

6.4.1 Zoning

The eastern side of Cowpasture Road is located within Fairfield City Council area and the western side and south of North Liverpool Road is located within Liverpool City Council area. The eastern side of Cowpasture Road and the associated road reserve are zoned Special Uses 5(c) Sub-arterial Road and Sub-arterial Road Widening under the provisions of Fairfield Local Environmental Plan 1994. The objective of the zone is to identify existing sub-arterial roads and land required for proposed sub-arterial roads and for the widening of existing sub-arterial roads. Drainage, roads and associated works are permitted without development consent in the Special Uses 5(c) zone.

The eastern side of Cowpasture Road and the associated road reserve within Liverpool City Council area are zoned Special Uses 5(c) Arterial Road under the provisions of Liverpool Local Environmental Plan 1997. The objective of the zone is to identify land required for existing or proposed arterial roads, including the widening of existing arterial roads. Roads are permitted without development consent in the Special Uses 5(c) zone. Drainage and landfill works normally require the consent of Liverpool City Council in the Special Uses 5(c) zone.

Most of the land located on the eastern side of the Cowpasture Road road reserve between North Liverpool Road and Elizabeth Drive is presently zoned Residential 2(a) under the Fairfield Local Environmental Plan 1994 except for areas of Recreation 6(a) Existing and Proposed Open Space located north of Mount Street and Special Uses 5(a) north of Gloucester Street to allow use of the land as a fire station.

All of the land located on the western side of the Cowpasture Road road reserve between North Liverpool Road and Elizabeth Drive is presently zoned Recreation Public 6(a) under the Liverpool Local Environmental Plan 1997. Under Clause 11(1) of the Liverpool Local Environmental Plan 1997 roads, drainage works and landfill associated with the reconstruction do not require the consent of Liverpool City Council in the Recreation Public 6(a) zone.

6.4.2 State Environmental Planning Policies

The provisions of State Environmental Planning Policy No.4 *Development Without Consent* enables the RTA to construct any components of the proposal that are outside the road reserve without the need for consent from Fairfield City Council or Liverpool City Council. There are no other provisions of any other State Environmental Planning Policies that directly apply to the proposal.

6.4.3 Regional Environmental Planning Policies

Sydney Regional Environmental Plan No. 18 *Public Transport Corridors* is designed to make provision for improved access by public transport into Parramatta from the rapidly developing suburbs on the north-western and south-western fringe of the metropolitan

area. The objective is to reserve a corridor from Hoxton Park to Baulkham Hills via the Parramatta city centre. The corridor is reserved to the east of the proposal.

Sydney Regional Environmental Plan No. 31 *Regional Parklands* provides controls for western Sydney regional parklands of over 5400 hectares including Western Sydney Regional Park near Cowpasture Road.

Neither of the Sydney Regional Environmental Plans directly affects the proposal.

6.4.4 Legislation

The requirements of the following legislation and associated regulations apply to the proposal and would be complied with.

Fire Brigades Act, 1989
Contaminated Land Management Act, 1997
Dangerous Goods Act, 1975
Environmental Planning and Assessment Act, 1979
Environmentally Hazardous Chemicals Act, 1985
Heritage Act, 1977
Land Acquisition (Just Terms Compensation Act) 1991
Local Government Act, 1993
National Parks and Wildlife Act, 1974
Noxious Weeds Act, 1993
Protection of the Environment Operations Act, 1997
Roads Act, 1993
Soil Conservation Act, 1938
Threatened Species Conservation Act, 1995
Waste Minimisation and Management Act, 1995.

6.4.5 Power to Construct the Proposal

Of particular note is the definition of *road work* in the *Roads Act, 1993* which "includes any kind of work, building or structure that is constructed or installed on or in the vicinity of a road for the purpose of facilitating the use of the road as a road...." In turn *carry out road work* " includes carry out any activity in connection with the construction, erection, installation, maintenance, repair, removal or replacement of a road work". The proposal is considered as part of *carrying out road work* and ancillary to the operations of Cowpasture Road.

Both Fairfield and Liverpool City Councils have Tree Preservation Orders under the provisions of their respective Local Environmental Plans. Section 88 of the *Roads Act* allows the RTA to remove trees from the road reserve for the purpose of carrying out road works.

7. Detailed Assessment Stage

7.1 Design Considerations

7.1.1 Existing Road

Cowpasture Road between North Liverpool Road and Elizabeth Drive is a two lane undivided road (except for a low concrete median near the intersection with Elizabeth Drive to allow right hand turns) in reasonably sound condition. The road pavement is dense grade asphalt and a 70 km/hour speed limit applies along the length of the road. Average traffic speeds are generally near the statutory speed limit. The road has good horizontal alignment and adequate sight distance, but the southern approach to Elizabeth Drive has a crest curve with 55 km/hour sight distance which needs improving. The intersection of Cowpasture Road and Elizabeth Drive is subject to traffic congestion and delays. The summit curve close to the intersection is a safety hazard considering the average design speed along the route.

Traffic control devices along this section of Cowpasture Road include traffic signals at the intersection with Elizabeth Drive and a single lane roundabout at the intersection with North Liverpool Road. A low concrete median is also provided along Cowpasture Road near these two intersections. There are two unsignalised T-intersections at Mount Street and Gloucester Street. No passing lines have been painted along the northern portion of the road. There are two bus stops provided on both sides of the road near Mount Street. Pedestrian and pedal cyclist facilities are sub-standard and the unsealed roadside shoulder presently serves their needs. Mature vegetation generally lines the western side of Cowpasture Road. Surface drainage is into a series of roadside grass swales located on the west side of the road.

Mount Street provides access to two schools, Freeman Catholic High School and John the Baptist Primary School. Currently the Mount Street intersection and adjoining area is congested at times during pick-up and drop-off of school children, with vehicles parking and making U-turns on Cowpasture Road. Both schools have a policy for the use of Gloucester Street for pedestrian and vehicular access and Mount Street for the two bus services.

7.1.2 Existing and Forecast Traffic

Traffic counts were obtained along Cowpasture Road in August/September 1997 and April 2000. In 1997 the Annual Average Daily Traffic (AADT) flows north of North Liverpool Road were 17,833 and 19,204 north of Mount Street. In 2000 the AADT had increased to over 20,000 between Gloucester Street and Elizabeth Drive. The 2000 AADT flows, 85th percentile speeds, % heavy vehicles and forecast traffic volume 10 years after opening in 2013 are shown in Table 2. Traffic growth along Cowpasture Road is anticipated to be approximately 5% compound growth per year until 2016 due to continuing residential and industrial development in the western Sydney region.

Table 2. Existing and Forecast Traffic

Direction of Travel Along Cowpasture Road	2000 Average Annual Daily Traffic	2000 85th Percentile Speed km/hour	2000 % Heavy Vehicles	Traffic Volume in 2013
Southbound	10,412	70	14.2	17,500
Northbound	9936	69	15.5	17,500
Both Directions	20,348	69/70	14.8	35,000

There are a relatively high percentage of heavy vehicles along Cowpasture Road due to the proximity of Wetherill Park industrial area to the north. A feature of the existing traffic flows not shown in Table 2 is that there are predominant weekday morning peak flows for northbound traffic flows and weekday afternoon peak flows for southbound traffic. The assessed future heavy vehicle composition of the total traffic flows is expected to be similar to existing heavy vehicle flows of 15%.

Four intersection counts were also conducted in March 2000 (*Cowpasture Road Traffic Study*, May 2000, Sinclair Knight Merz Pty Ltd). In summary the existing conditions results of the study show:

- over 1200 vehicles in peak hour along sections of Cowpasture Road.
- the intersection with North Liverpool Road operates at capacity in afternoon peak hours with Level of Service E.
- the intersection with Gloucester Street operates at a satisfactory level.
- the intersection with Mount Street operates near capacity with Level of Service D in the morning peak.
- the intersection with Elizabeth Drive operates at congested conditions with Level of Service F.

Accident statistics for the 5 year period from 1993 to 1998 show 15 accidents along this section of Cowpasture Road with 6 resulting in injuries and no fatalities.

There is negligible pedestrian and pedal cyclist activity along Cowpasture Road at present although this is anticipated to increase with the provision of suitable facilities with the proposal.

When the Western Sydney Orbital is complete in 2007 it is anticipated that traffic along Cowpasture Road could decrease by 30-35% if the orbital road is untolled and increase by a similar amount if it is tolled. If the Western Sydney Orbital were tolled then this proposal for widening Cowpasture Road to four lanes would have insufficient capacity by 2016 for the forecast traffic flows. Full use of the widened road reserve and narrowing the median in the proposal would enable six travel lanes to be provided along Cowpasture Road under this scenario sometime after 2020.

With no toll on the Western Sydney Orbital in 2016 the traffic volume on Cowpasture Road would increase by approximately 50% compared to 2000. With a toll on the Western Sydney Orbital in 2016 the traffic volume on Cowpasture Road would increase by approximately 95% northbound and 50% southbound for the morning peaks, and 40% northbound and 100% southbound for the afternoon peaks compared to 2000.

7.1.3 Design Parameters

The design criteria for the proposal are a design speed of 70 km/hour with a maximum grade of 8.0%, 3.3 metres minimum width for travel lanes and 3 metres minimum width for the shared pedestrian and bicycle path. All RTA road design criteria would be meet for the proposal. The design criteria would ensure adequate capacity and safety for all vehicles, pedestrians and cyclists. The existing speed limit of 70 km/hour would be retained. The proposal would be designed in detail in accordance with RTA criteria, other specifications including requirements of this document and:

- Roads and Traffic Authority Road Design Guide
- AUSTROADS Guides
- Australian Rainfall and Run-off 1987
- Roads and Traffic Authority Environment Manual
- Australian Standard 1742.3 (for traffic management).

There are no major constraints to the design of the reconstruction apart from the need to tie in with the existing sections of road, complete the reconstruction and widening under traffic and provide for widening to 6 lanes in future. Some utilities including electricity, water, telecommunications and gas services and lines would need adjustment, relocation and/or being put underground. Land acquisition would be required for the proposal. The capacity of the reconstruction and widening works would be sufficient to meet expected traffic growth for the next 20 years including highway traffic loadings.

The detailed design would provide for:

- economy in construction costs.
- geometric design including horizontal and vertical alignment to 80 km/hour standard.
- balanced earthworks where possible with some import of selected fill.
- structural adequacy.
- pavement, pavement area, materials and wearing surface.
- line marking, sign posting, sign structures and lighting.
- adjustments to location of utilities as required.
- implementation of safeguards specified in an Environmental Management Plan[3].

[3] *An Environmental Management Plan is a document prepared to ensure that all environmental requirements of a project arising from environmental impact assessments considered by the Review of Environmental Factors and Decision Report, RTA policies and all relevant legislative requirements are implemented during development of the project.*

7.1.4 Construction Activities

If approval is given to the proposal and following completion of detailed design Stage 1 would be constructed over a period of 12 months to be ready for commissioning in 2003. The RTA would supervise construction. A construction compound would be located adjacent to the western side of the road reserve on Sydney Water and RTA land nearby the reservoir and Gloucester Street. It would be security fenced and include amenities sheds, portable toilets, plant and equipment storage areas, bunded areas for storage of petroleum, distillate and other chemicals to comply with Environment Protection Authority (EPA) and WorkCover Authority requirements. Any material stockpiles would be located in or adjacent to the road reserve and protected from possible erosion.

Construction hours would generally be from 7 am to 6 pm Monday to Friday and 7 am to 1 pm on Saturdays. From 7 am to 8 am on Saturdays only inaudible work would be allowed. Work would not be permitted on Sundays and public holidays unless authorised by the RTA and EPA where required. However night work may be necessary for some activities to minimise inconvenience to road users at peak travel times. Any night work would follow the existing procedure used by the RTA Sydney Operations Directorate and endorsed by the EPA with regard to night time road works noise. An estimated 5,000 cubic metres of excavation and 3,000 cubic metres of selected fill material would be required for the proposal.

Construction equipment expected to be used on-site includes the following mobile plant and equipment as required:

- front end loaders
- excavation plant
- back hoes
- trenching machines
- chain saws
- jack hammers
- dump trucks
- bulldozers
- low loader transporters
- graders
- vibrating rollers
- concrete agitator trucks
- concrete and asphaltic paving machines
- water tanker
- road sweeper
- line marking vehicles
- trucks delivering construction materials
- light commercial and passenger vehicles.

Construction would follow normal road works procedures including the following general sequence of activities:

- acquisition of land required for the proposal.
- installation of temporary erosion, sedimentation and drainage controls.
- removal of vegetation for recycling.
- relocation and/or adjustment of all affected utilities, services and signage to suit construction programme requirements.
- drainage lines excavated by backhoe or excavator.
- topsoil stripped and stockpiled on-site by bulldozers, graders, loaders and trucks.
- surface preparation by graders.

- recycling of suitable excavated material and incorporation of unsuitable material in earthworks within the road reserve.
- import of select material for earthworks for the reconstruction and widening.
- compaction by rollers and vibrating compactors with trimming by graders.
- batched concrete and asphalt placed on-site by pavers, autograde machines and graders and compacted by rollers.
- application of asphaltic concrete wearing surface by pavers and rollers.
- installation of noise attenuation measures.
- landscaping along the reconstruction.
- installation of line marking, lighting, sign structures, traffic lights and sign posting.
- site clean up and disposal of all surplus waste materials.
- commissioning.

The RTA would be responsible for the overall implementation of the proposal. Construction would conform to Quality Assurance in accordance with AS/NZS ISO 9001-1994 and RTA specification Part Q *Quality System Requirements*. The safeguards in this REF would be implemented by the RTA and contractor(s) throughout the sequence of activities described above.

No blasting or on-site batching of concrete or asphaltic concrete would be permitted. The construction site would be maintained in a clean and tidy state at all times. Construction equipment would be maintained to meet EPA requirements. No vehicle maintenance would be permitted outside the construction compound except in emergencies. Cleaning out of batched concrete mixing plant would only be permitted in designated areas or off-site at approved facilities.

Construction would be carried out under traffic although a side track would be required above the cut to be constructed approximately 100 to 300 metres south of Elizabeth Drive. Professional and diligent traffic management would be required to construct the proposal and avoid disruption to traffic. Two lanes on Cowpasture Road would be available for traffic at all times. Traffic arrangements would be subject to RTA approval. Disruption of access to properties would be minimised and prior arrangement would be made with affected owners in the event of any short term disruption.

7.1.5 Waste Disposal

Any surplus waste material would be disposed of in a legal manner. Construction works would include clearing of introduced and native vegetation from the road reserve. The number of trees to be removed would be the minimum necessary for the safe excavation and construction operations. Trees with limbs overhanging Cowpasture Road would not be removed unless absolutely necessary for safety reasons. Any overhanging limbs would be cut back where possible. Any suitable vegetation would be provided to community groups as firewood as a first priority and then disposed of at a nearby legally operating recycling facility (for example, the Waste Service NSW depot at Eastern Creek) for reuse as mulch. The native vegetation, leaf litter and soil cleared for the construction works would be reused in the landscaping of the disturbed areas. Any exotic vegetation that

cannot be mulched or noxious weeds would be disposed of at a nearby legally operating waste disposal site.

Any excavated or excess pavement material and concrete would be incorporated in the earthworks for the reconstruction as a first priority or transported off-site to Fairfield City Council's depot at Hassall Street, Wetherill Park for recycling. If any contaminated material was encountered it would be disposed of at the direction of the EPA.

All other waste generated during construction (for example, unsuitable spoil, domestic waste and surplus unsuitable construction material) would be removed from the site for disposal at a nearby legally operating waste disposal site. Workmen would use a portable toilet facility located within the construction compound. No waste would be buried or burnt on-site.

7.1.6 Demand Upon Resources

In addition to labour, plant, equipment and energy inputs the proposal would require concrete, steel, select fill material and asphaltic concrete. Any prefabricated construction components, metalwork and signs required would be transported to the site by heavy vehicles. The off-site batched concrete and asphaltic concrete would be sourced from commercial outlets in or near Liverpool or Wetherill Park. Import of these resources would mainly involve a number of heavy vehicle loads to be transported along Cowpasture Road with minimal impact. The fill would be sourced from legally operating quarries located in the western Sydney metropolitan area. Actual quantities and number of loads may vary depending on the detail design for the reconstruction and widening. The proposal would not affect any resources in short supply. In addition, some areas of pavement within the Stage 1 works would be milled and re-sheeted to conserve resources rather use of new pavement.

7.2 Description of Site and Surroundings

Cowpasture Road is located on the metropolitan fringe which is undergoing a rapid transition from rural to urban land uses and in particular low density residential development. Photographs 2 and 3 show the reconstruction and widening area with views north and south along Cowpasture Road. The road reserve is variable in width but generally 33 metres wide and partially occupied by the existing road pavement area. Adjacent stretches of introduced and native vegetation including mature trees line the roadside especially on the west side. Cowpasture Road has a number of utilities in the road reserve and is lit with standard lighting poles on the east side. Overhead low voltage and 33kV electricity cables also line the east side of Cowpasture Road.

The adjacent land uses include the developing residential areas of Bonnyrigg Heights, Cecil Park and Green Valley. The southern portion of Bonnyrigg Heights and Green Valley are undergoing rapid residential development with Bonnyrigg Heights near completion. About 130 existing and potential residential properties have direct views of the area of reconstruction and widening. None of the residential properties (except for two properties near Elizabeth Drive to be totally acquired) have direct access to Cowpasture Road and

this would be retained with the proposal. A strip of open space also used as a drainage swale generally occupies the west side of the road and separates the residential areas from the roadside environment.

A service station and fast food restaurant is located on the north-east corner of the Cowpasture Road and North Liverpool Road intersection. Sydney Water has a reservoir and vacant land located near the crest of Cowpasture Road on the western side. A fire station is under construction on the east side of Cowpasture Road north of Gloucester Street. John the Baptist Primary School and Freeman Catholic High School are located on Mount Street near Cowpasture Road. The primary school has about 820 students and the high school about 1200 students; 30% of the students travel by bus and two bus companies service the schools.

The noise environment is dominated by traffic noise from Cowpasture Road. There has been a high degree of physical and chemical disturbance along this section of Cowpasture Road and adjacent road reserve. Chemical disturbance is likely to include herbicides and pesticides from weed and pest control, hydrocarbons and heavy metals from road runoff. The proposal is located near the top of the Hinchinbrook Creek catchment which drains to the Georges River.

Photograph 2. View of Cowpasture Road Looking North

Photograph 3. View of Cowpasture Road Looking South

7.3 Environmental Impacts

7.3.1 Landforms

The topography of Cowpasture Road is moderately sloping with a 40 metre rise from south of North Liverpool Road to the north and a crest located approximately 200 metres south of Elizabeth Drive followed by a slight drop of 4.5 metres to the intersection. Existing slopes are generally under 6% and this would be maintained with the proposal except for an area of fill up to 3 metres high and 200 metres long located near the crest where slopes would be a maximum of 7.2%. Batters would be relatively flat with a slope of 2 horizontal to 1 vertical.

Due to the proposal following the existing moderate relief there would be potential minor adverse environmental impacts with land form during construction requiring appropriate safeguards to be implemented. These safeguards include the protection of earthworks including fill batters during the reconstruction and widening, landscaping of exposed earthworks areas to avoid erosion and consequent changes to land form.

7.3.2 Geology and Soils

The proposal is located within the Blacktown and Luddenham soil landscape groupings. The Luddenham soil landscape occurs along the majority of this section of Cowpasture Road except for the southern 300 metres. This soil landscape is characterised by rolling low hills on Wianamatta Group shales often associated with Minchinbury Sandstone. The podzolic soils and massive earthy clays are shallow on crests with moderately deep yellow podzolic soils and prairie soils on lower slopes. Limitations of the Luddenham soil landscape are high erosion hazard, localised impermeable highly plastic sub-soil and moderately reactive soils.

The Blacktown soil landscape occurs around and 300 metres north of North Liverpool Road. This soil landscape has gently undulating rises and slopes on Wianamatta Group shales. Local relief is up to 35 metres with broad rounded crests and slopes and gently inclined slopes. Soils are shallow to moderately deep hardsetting mottled texture red and brown podzolic contrast soils on crests grading to yellow podzolic soils on lower slopes and drainage lines. Limitations are moderately reactive highly plastic subsoil, low soil fertility and poor soil drainage.

Observations of the area suggest that the predominant soils are clays. A composite soil sample from both sides of the road reserve between North Liverpool Road and Elizabeth Drive was tested. The results show the composite soil sample to have a fine sandy clay loam texture with a medium structure. The Emerson Aggregate Test class was 6 indicating aggregates in the soil are moderately stable and resist dispersion. Erosion risk is moderate as the soil is only moderately well structured, but reduced due to the resistance to dispersion. The soil conditions within the area of the proposal would require erosion and sedimentation control safeguards during construction.

There are no known commercial mineral deposits within the area of the proposal or road reserve.

7.3.3 Climate

Climatic factors would not constrain construction of the proposal except adverse weather conditions such as heavy rain or very high winds. Heavy and prolonged rainfall in the Hinchinbrook Creek catchment would not affect the reconstruction and widening provided appropriate safeguards to avoid erosion and sedimentation were installed around any excavated or exposed earthworks areas. The proposal would be in the same location as the existing road, the operations of which are not constrained by climatic factors. It is unlikely climatic factors would impact on operations of the proposal provided motorists took due care during adverse weather conditions.

7.3.4 Land Form Stability and Erosion Hazard

Components of the physical environment include a combination of moderate landform and slopes, some high erosion hazard soils, moderately reactive soils, localised impermeable highly plastic sub-soils and possible adverse weather conditions leading to potential soil erosion during construction of the proposal. These conditions would require installation of a number of safeguards during construction including selected temporary sedimentation controls such as catch drains, diversion drains and banks, sedimentation basins, geofabric silt fences at the base of all earth works, geofabric covered hay or straw bales or sand bags secured around all storm water inlets and soil stabilisation measures along the construction areas to be documented in a Soil and Water Management Plan. The controls to prevent potential soil erosion and impacts on local watercourses would include the following:

- provision of silt fences and barriers to prevent sediment laden runoff from leaving the construction area;
- drainage structures to protect exposed embankment slopes during construction;
- progressive landscaping for all exposed earthworks areas not required for the proposal;
- prevention of erosion on any topsoil stockpiles;
- provision of catch drains or cut-off drains to prevent clean surface runoff entering the construction areas;
- provision of sediment traps at existing drain inlets and catch drains along Cowpasture Road for the construction periods;
- the provision of scour protection measures at drain outlets.

During construction of the roadworks, a Soil and Water Management Plan would be implemented referencing the NSW Department of Housing's *Managing Urban Stormwater: Soils and Construction* publication. The Soil and Water Management Plan would detail surface water control, storm water drainage, landscaping, and erosion sediment control measures required during construction to minimise off-site sedimentation impacts. The sedimentation controls would need to be maintained in a functioning condition until all construction activities were completed over the construction period and the site was stabilised. Regular monitoring and maintenance of the sedimentation controls would be required to ensure they perform in a fully functioning condition at all times. The

construction drawings would contain a sheet showing the location of permanent and temporary control measures required during construction.

Installation of the selected sedimentation controls and landscaping of exposed earthworks areas would minimise adverse impacts both during construction and operations of the proposal. The moderate climate and growing season in the area would enhance the growth of landscaped areas over time.

7.3.5 Air Quality

Local air quality and neighbourhood amenity could be affected at the construction stages by dusts, construction vehicle emissions and odours and at the operational stage by vehicle emissions. Construction vehicle and dust emissions would be the main source of air pollutants during construction. There would be increases in the local incidence of dusts due to use of heavy plant and machinery. These adverse impacts would be short term and localised. The maximum annual average in dust levels would be the EPA criteria of 4 grams/square metre/month. Dust would be suppressed by a dedicated water tanker when required. No blasting would be undertaken at the construction site. Any odour from construction equipment and activities is not expected to have an adverse environmental impact. All construction vehicles would comply with EPA emission standards and dust emissions from stockpiles, access tracks and construction areas would be minimised by adoption of appropriate dust suppression techniques. These would include:

- covering of loads during transport;
- watering stockpiles;
- watering or stabilising access tracks or side tracks;
- spraying construction areas to minimise dust emission during grading and dozing operations.

Additional adverse impact on air quality is expected from vehicular sources travelling along Cowpasture Road during operations due to localised vehicle emissions from the forecast large increase in traffic. Although the main pollutants emitted by road traffic of concern to environmental, health and planning organisations are carbon monoxide, nitrogen dioxide, particulates, benzene and lead, improved traffic flows can also have a beneficial effect on emissions. The operations of the proposal would result in the more efficient transport of a greater number of vehicles along Cowpasture Road and for distribution to other roads compared to the existing situation. The greater number of vehicles would run more efficiently with lower emission rates due to less accelerating and decelerating. However as traffic flows increase over the years there would be a reduction in local air quality due to increased volume of emissions.

Sydney's location, topography and size favour the development of poor air quality under certain meteorological conditions. Continuing development particularly in the western part of the Sydney basin has the potential to have serious impacts on air quality and health throughout the region. In the Sydney region motor vehicles are a major source of carbon monoxide, reactive organic compounds, oxides of nitrogen, lead, particulate matter and air toxics such as benzene and diesel soot. The RTA is implementing the *Plan for Reducing*

Vehicle Emissions to help reduce greenhouse and other motor vehicle emissions and continues to engage in approaches to encourage the tightening of vehicle emissions standards. Strategies and approaches to reduce vehicle emissions include:

- working with the EPA to implement the State's Motor Vehicle Maintenance Program for lowering emissions;
- making RTA fleet vehicles available to pilot test new technology with potential to reduce vehicle emissions; and
- continuing its role on the Advisory Committee on Vehicle Emissions and Noise to encourage the early implementation of more stringent Australian Design Rules, including the new standard for tightening current light vehicle emission standards.

Greenhouse Issues

Australia is signatory to the *International Framework Convention on Climate Change* (Rio Convention), which commits Australia to programs of monitoring and reporting on greenhouse gas emissions. A target of the Rio Convention is that signatory countries should attempt to reduce greenhouse gas emissions to the levels that applied in 1990. At the 1997 Kyoto meeting the convention agreed that Australia would be allowed to increase their emissions to 5% above the 1990 level by 2012.

The RTA is committed to ensuring that its environmental goals and policies are consistent with those outlined in the 1992 *Intergovernmental Agreement on the Environment*. This agreement addresses a number of globally important environmental issues including the greenhouse effect. This commitment is facilitated through the RTA's environmental vision which addresses greenhouse gas emissions and also energy consumption.

Approximately 20% of NSW's total carbon dioxide emissions are estimated to come from the transport sector. At a broad level, the RTA has been involved in and implemented several strategic initiatives to address the issue of road transport related greenhouse gas emissions. These are:

National Greenhouse Response Strategy

This strategy was adopted by the Council of Australian Governments in 1992 and aims to contribute to the national commitment to the National Strategy for Ecologically Sustainable Development. The RTA contributed to the development of this strategy and is the NSW representative on the Transport Working Group for the development of a greenhouse gas emissions inventory. With respect to transport, the response strategies include reducing fuel consumption in motorised transport; improving the technical and economic efficiency of operation of the road network and traffic management; and to encourage the use of bicycles. This proposal contributes to these initiatives.

RTA Greenhouse Reduction Plan

The RTA has prepared a plan at a strategic level to address and provide policy in relation to greenhouse gas emissions resulting from its activities. A greenhouse emissions inventory of RTA activities has been carried out and the findings incorporated into the RTA Greenhouse Inventory. In terms of the construction of the proposal it is likely to result in better traffic flow and hence better fuel economy and therefore reduced greenhouse emissions.

7.3.6 Hydrology and Water Quality

The detailed drainage design for the reconstruction and widening would be calculated for a 1 in 100 year Average Recurrence Interval flood event and a 1 in 10 year flow for piped drainage. Flows less than the 1 in 10 year flow and all other minor surface water flows would discharge into the kerbside gutters, sub-surface and cross road drainage to be installed under the road for discharge to the 25 metre wide grass swales that already exist along the western side of Cowpasture Road. A new pipe would be installed under the crest of Cowpasture Road between the drainage swales on the western side. Gross pollutant devices would be installed on each outlet before discharge to the grass swales. The grass swale flows would then discharge into the existing large detention basin located on the south side of Frederick Road and eventually into local waterways including Hinchinbrook Creek. On the eastern side stormwater would be piped directly under Cowpasture Road from pits into the grass swales. The swales would be graded to capture low flow behind low embankments with a small relieving pipe through each mound. The final size, specifications and location of the sub-surface, cross road and grass swale drainage system would be determined during detailed design.

Liverpool City Council would be responsible for maintaining the grass swales. Of concern to Fairfield City Council the kerb levels and on-site stormwater detention system near the service station located on the corner of Cowpasture Road and North Liverpool Road would not be changed with the proposal. Localised flooding near the intersection with Mount Street would be reduced with the proposal.

All stormwater collected on the reconstruction and widening would be discharged to the existing and proposed grass swales on the western side of Cowpasture Road which in turn flow into constructed and natural waterways in the area. There would be increased flows as a result of more roadspace. The reconstruction drainage would not have any adverse impact except for a minor decrease in water quality due to increased leakages of fuel, lubricants, hydraulic fluids, coolants and particulate matter (tyre rubber, brake and clutch linings) being washed off as runoff from increased traffic flows in the future. The hydrology and water quality impacts would be similar for the existing situation and the proposal.

Studies completed by CSIRO for the RTA concluded that road runoff from roads with less than 30,000 vehicles per day exhibited minimal impact on receiving waters although it is desirable that discharges be kept as clean as possible. Although work on this issue is limited in Australia, the United States of America has undertaken a considerable amount of work and their experience suggests that water quality problems associated with road runoff are primarily related to lead from leaded petrol, zinc from vehicle tyres, and copper from vehicle brakes. Lead levels in leaded petrol have been reduced. Pollutants in water such as lead, zinc and copper often attach to fine particles of dirt and sediments. Control of sediment, especially dispersed clay particles, is the most effective way of reducing pollution by nutrients and heavy metals. Therefore by effectively controlling sedimentation, lead, zinc and copper as well as tyre rubber, dirt and other particles from

storm water runoff, water quality in the receiving waters of Hinchinbrook Creek is not expected to be further affected by the reconstruction.

Works in relation to sediment control would conform to the system of environment protection licences as required by the EPA in the *Protection of the Environment Operations Act, 1997*. The Soil and Water Management Plan would also address storm water quality controls and include the location of existing natural and constructed drainage channels in relation to the proposed work.

Aquatic ecosystems in Hinchinbrook Creek are not expected to be adversely affected by the proposal. No water would be drawn from Hinchinbrook Creek for construction purposes.

7.3.7 Flora and Fauna

A general flora and fauna habitat survey of the area around the proposal was carried out by Mr G. Leonard in August 1997. Stands of remnant native vegetation were searched in order to confirm the presence or absence of four nationally listed threatened plant species which have been previously recorded in the region. The potential habitat value of the native vegetation was also considered, although no fauna species of national conservation significance have been recorded in the area. The results of the surveys and impact assessments are summarised below and more detail is provided in Attachment 4. The species lists in the August 1997 report (Attachment 4) have been checked against the updated *Threatened Species Conservation Act, 1995* to confirm that no new threatened species would be affected by the proposal.

Flora

Original vegetation in the study area would have consisted mainly of Cumberland Plain Woodlands. Vegetation along the proposed reconstruction mainly consists of cleared paddocks, although small remnant stands of grey box woodland and Spotted Gum Forest are located adjacent to Cowpasture Road on the western side. In most sections, understorey consists of introduced grass and shrub species, with occasional occurrences of native plant species.

Searches were carried out for individuals of the threatened plant species *Acacia pubescens*, *Pultenaea parviflora, Persoonia nutans* and *Pimelea spicata*, but no individuals of these species were recorded during the survey. Stands of the plant species of regional conservation significance spotted gum *Corymbia maculata* were recorded on the western side of Cowpasture Road at the intersection with Elizabeth Drive.

Clearing for the proposal would require the removal of a number of established native trees. The Cumberland Plain Woodland is an Endangered Ecological Community in the *Threatened Species Conservation Act, 1995* and is considered to be the plant community occurring on shale soils of the Cumberland Plain. The final determination for Cumberland Plain Woodland includes an assemblage of plant species which constitute this vegetation type. Twenty-eight of these species were recorded in the study area. An 'eight part test' under Section 5A of the *Environmental Planning and Assessment Act, 1979* was conducted

and it concluded that no Species Impact Statement is required for the removal of the Cumberland Plain Woodland remnants.

Fauna

Fauna habitat is limited because of the disturbed nature of the site. No extensive, complete stands of native vegetation occur in the proposed reconstruction area, nor does the vegetation that occurs on the site connect with any adjacent vegetation stands. Because most of the trees in the road reserve are juvenile to established, there are very few hollows, although up to five dead trees occur in the road reserve.

No fauna species of national conservation significance have been recorded in the proposed reconstruction area although two bat species (the Large-eared Pied Bat and Common Bentwing-bat) and two owl species (the Sooty Owl and Masked Owl) in the area are of conservation significance as listed under the *Threatened Species Conservation Act, 1995*. As both species of bat and both species of owl require tree hollows for nesting it is unlikely that the site is visited by any of these species.

Recommendations

Where possible existing established trees would be retained. As a number of mature and established spotted gums, grey boxes and forest redgums would require removal, a new planting of these three species would be carried out where space and visibility allow, in order to provide a link with existing trees that are to be retained on the road reserve as well as in adjacent areas. Tree seedlings would be propagated from locally collected seed.

Trees to be retained near the reconstruction area would be fenced during the construction periods. No parking of vehicles or storage of materials would be permitted beneath the canopy of trees located near the reconstruction area.

Any landscaping works in the road reserve would include a weed control programme. Species currently occurring in the proposed construction area which are listed as noxious plants are Prickly Pear, Lantana and Blackberry species aggregate. These species would benefit from disturbance so all propagules would be removed from the proposed construction area. A buffer of fast-growing native shrub species would be planted along the road reserve boundaries. Suggested species include *Acacia decurrens, Acacia falcata, Acacia implexa, Acacia parramattensis, Kunzea ambigua, Ozothamnus diosmifolius* and *Hakea sericea.*

7.3.8 Landscape and Visual Considerations

The existing trees currently lining parts of Cowpasture Road, especially on the west side, create a positive visual impact and form part of the cultural landscape, which is typically associated with older roads on the metropolitan fringe. Some of these trees and associated undergrowth in the road reserve would be removed during construction of the proposal and replaced with more roadspace. However landscaping of the remaining area of roadside reserve would endeavour to reinforce the former natural landscape of the area. Landscaping techniques would be employed to provide the reconstruction with

recognisable elements which are in scale with the reconstruction and the greater landscape and to improve the amenity of the area through measures that respond to the environment and the user.

Responsible environmental management practices would be used in the design and implementation of the landscape proposal. Practises proposed include the following in a landscape plan to be implemented by the RTA:

- maximising environmental resources by retention of existing vegetation and resources wherever possible. Most of the trees would be retained in the new median between North Liverpool Road and Gloucester Street.
- the reuse of environmental resources such as stockpiling and reuse of site topsoil.
- vegetation removed in construction would be chipped and reused as mulch in landscape works.
- minimising the impact of loss of native vegetation by replacing locally indigenous species in the landscape works.
- where possible trees would be propagated with locally collected seed so as to provide a link with existing trees in the road reserve to conserve the floral diversity of the region.
- any acoustic attenuation mounding would be planted with a combination of native trees, shrubs and groundcovers.
- a limited amount of median planting is proposed that would be in the form of low shrubs and/or groundcovers to 0.75 metres.
- to maintain clear sight lines and for ease of maintenance a mown grass drainage swale is proposed on the western side of Cowpasture Road.

Construction of the noise attenuation measures would affect the visual amenity of some residents and users of the adjacent passive open space. Safety and security in the Bonnyrigg Heights and Cecil Hills areas would be enhanced with the proposal as the noise attenuation measures would restrict views from Cowpasture Road into the closest dwellings and open space. There would be no loss of privacy, security, sunlight or increased shadowing for residents of nearby dwellings due to the noise attenuation measures. Overtime as the landscaping matures near the noise attenuation measures any tunnel effect produced by the walls and/or mounds would be softened. Residents' views of the noise attenuation measures would be partially screened as the landscaping works matured. The landscaping would also help reduce dirt and dust from traffic.

The surrounding residential development, sloping topography and vegetation pattern of the area provides a localised landscape of moderate scenic quality. The reconstruction and widening would increase the built form of the area with increased roadspace and loss of roadside vegetation. All exposed earthworks areas would be landscaped with appropriate local native shrubs and ground cover which would improve scenic quality for road users, nearby residents and open space users and help integrate the reconstruction into the adjacent environment. The landscaping would soften this and the construction would partly blend into and become part of the landscape over time. Overall the surrounding landscape character would remain largely intact and similar to the existing road corridor except for the greater built form of the reconstruction and widening intruding in the

landscape. In addition the street lighting along Cowpasture Road would be put underground to improve the landscape and visual amenity of the area.

7.3.9 Socio-economic Considerations

The residents, construction workers and visitors to the residential areas near the proposal would be likely to experience some adverse impacts due to elevated levels of dust, noise, traffic generation and general disruption during the two periods of construction. Cowpasture Road travellers through the area and local residents would be involved in short term inconvenience to travel during the Stage 1 construction period of up to 12 months and the unknown construction period for completion of Stage 2. Some utilities would require relocation and undergrounding during construction with possible minor inconvenience for nearby dwellings. There would be no property severance as a result of the proposal. Local access to dwellings would not be affected except for some disruption at intersections along North Liverpool Road during construction which would be minimised as far as possible. There would be no significant changes to existing land use apart from the conversion of some residential land and passive open space to road space and road reserve. The proposal would not affect local businesses following completion of construction except for improved safety, access and capacity. Economic pursuits in the area would able to be maintained during construction and operations of the proposal. There would be no change to the existing access arrangements for the service station and restaurant located on the intersection with North Liverpool Road.

Land would need to be acquired from 26 residential properties, one business and passive open space in order to implement the proposal. Approximately 2.23 hectares of land would need to be acquired from publicly and privately owned properties abutting Cowpasture Road and North Liverpool Road for the proposal. The majority of the land required would be the strip acquisition of existing passive local open space owned by Liverpool City Council along the western side of Cowpasture Road to enable the widening of the road. All of the land on the east side of Cowpasture Road to be acquired is already in public ownership and within the road reserve. The land required would represent a small portion of the total property areas except for two properties to be totally acquired near Elizabeth Drive. After construction of the proposal access could not be obtained for these two properties either from Cowpasture Road or any other road. The RTA would offer them to Fairfield City Council as a first priority then the open market.

Land would be acquired in accordance with the RTA's Land Acquisitions Policy Statement. The RTA endeavours to purchase land by negotiation. The offer of compensation would be assessed in accordance with the *Land Acquisition (Just Terms Compensation) Act 1991.*

An easement for support of batters on the road would also need to be created on 8 properties covering 5585 square metres along the west side of Cowpasture Road and mostly within public open space. In addition the RTA would complete a land exchange with Sydney Water on the reservoir land to provide an area for the construction compound and a buffer zone from the road after completion of construction. Of concern to Fairfield

City Council the deceleration lane for the service station located on the corner of Cowpasture Road and North Liverpool Road would not be deleted with the proposal.

Table 3 provides a listing of the 29 properties affected by the proposal and land use and area to be acquired or required for an easement based on the concept design.

Table 3 - Proposed Property Acquisition and Easements for the Reconstruction and Widening

Reference and Location of Property to be Acquired	Lot and Deposited Plan Number	Owner-ship	Land Use	Area to be Acquired (square metres)	Area for Easement (square metres)
1. Cowpasture Road	?	Private	Residential	0	5
2. Cowpasture Road	2/535713	Private	Residential	0	60
3. Cowpasture Road	1/812601	Public	Residential	260	40
4. Cowpasture Road	2/812601	Private	Residential	70	80
5. Elizabeth Drive	1/358794	Private	Residential	0	315
6. Elizabeth Drive	2/812601	Private	Residential	925	140
7. Cowpasture Road	307/746993	Private	Residential	1515*	0
8. Cowpasture Road	A/366218	Private	Residential	725*	0
9. Cowpasture Road	830610	Council	Open Space	2930	1315
10. Cowpasture Road	547/739761	Council	Open Space	19	0
11. Cowpasture Road	13/237889	Council	Road Reserve	400	0
12. Cowpasture Road	12/237889	Public	Fire Station	780	0
13. Cowpasture Road	3175 and 3176/839661	Council	Open Space	11,150	3630
14. Cowpasture Road	8/237889	Council	Road Reserve	130	0
15. Cowpasture Road	6/237889	Council	Road Reserve	490	0
16. Nth Liverpool Rd	1	Private	Service Station	166	0
17. Nth Liverpool Rd	3	Private	Residential	9	0
18. Nth Liverpool Rd	1	Private	Residential	27	0
19. Nth Liverpool Rd	2	Private	Residential	6	0
20. Nth Liverpool Rd	1	Private	Residential	26	0
21. Nth Liverpool Rd	3	Private	Residential	13	0
22. Nth Liverpool Rd	1001/1004102	Private	Residential	77	0
23. Nth Liverpool Rd	1002/1004102	Private	Residential	70	0
24. Nth Liverpool Rd	1003/1004102	Private	Residential	49	0
25. Nth Liverpool Rd	1004/1004102	Private	Residential	49	0
26. Nth Liverpool Rd	1005/1004102	Private	Residential	37	0
27. Nth Liverpool Rd	1006/1004102	Private	Residential	3	0
28. Cowpasture Road	7000/851917	Council	Road Reserve and Open Space	1140	0
29. Cowpasture Road	852378	Council	Road Reserve and Open Space	1230	0
Total Area Required	-	-	-	**22,296**	**5585**

** Total acquisition of two properties required because access to the site would not be possible through or around the noise wall or via another road other than Cowpasture Road.*

During construction of the proposal the procedures for the installation and operation of traffic control devices established in AS 1742.3-1996 *Manual of Uniform Traffic Control Devices Part 3: Traffic Control Devices for Works on Roads* would be followed wherever possible. Only the minimum practicable length and width of Cowpasture Road would be affected by construction at any one time to minimise disruption and inconvenience to road users.

As a result of the strip acquisition and easement Cowpasture Road traffic would be closer to the occupants of around 130 dwellings, users of open space, two schools and one service station/restaurant with impacts of minor loss of amenity, increased noise and air pollution. There are approximately 110 existing dwellings and 20 potential dwellings (located in Green Valley on the east side) that have property boundaries facing Cowpasture Road and North Liverpool Road. Due to the existing restrictions on local access onto Cowpasture Road the majority of these properties have (or would have) backyards, rather than frontages, facing the road. The occupants of these dwellings (approximately 400 people) with views of the reconstruction and widening would suffer a possible minor decline in visual quality, loss of amenity and privacy, increased noise and air pollution during construction of the proposal. Similarly the users of the open space, primary and high schools located in Mount Street and users of the open space located on the west side of Cowpasture Road may suffer a minor decline in amenity, visual, air and acoustic quality during construction.

Socio-economic benefits of the proposal include a large improvement in the quality of the noise environment due to traffic noise reduction for approximately 400 people and some school students; increased safety and better access to and from Cowpasture Road; improved pedestrian and pedal cyclist safety and amenity; better bus operations along Cowpasture Road; and improved local amenity with provision of roadside landscaping and placement of street lighting underground. However new parking and access restrictions would be enforced along Cowpasture Road. Following completion of the proposal the residents, visitors to the area and travellers along Cowpasture Road would have improved access to destinations within and outside the region.

7.3.10 Pedestrian and Cyclist Impacts

During construction the status quo would be maintained for pedestrians and pedal cyclists with a relative lack of facilities for these users provided along Cowpasture Road. During operation of the reconstruction and widening there would be improved pedestrian and pedal cyclist safety with the new facilities. There would be a shared pedestrian and cyclist path 3 metres wide on the eastern side and an unpaved 3.5 metre wide footway on the western side of Cowpasture Road. Pedestrian crossings would be added at the signalised intersections with North Liverpool Road and Gloucester Street. However, pedestrians and pedal cyclists would have greater difficulty crossing the busier and wider road at Mount Street and Elizabeth Drive although the median could act as a pedestrian refuge.

7.3.11 Traffic Impacts

During Construction

Construction impacts would have a marked effect on the operation of traffic flow along the highway over the two construction periods. It is foreseen that there would be one lane in operation in each direction through the construction area at most times of the day. Traffic should not experience severe delays for extended periods. However the control of traffic during construction would require the partial closure of a traffic lane at times, resulting in temporary traffic delays. Where practical these partial closures would be confined to less busy periods. This is required despite the large volume of traffic travelling along Cowpasture Road to aid in the safety of construction activities and the workforce.

Construction activities would require traffic control measures, such as signposting, cones, and traffic control personnel. During construction of the proposal the procedures for the installation and operation of traffic control devices established in AS 1742.3-1996 *Manual of Uniform Traffic Control Devices Part 3: Traffic Control Devices for Works on Roads* would be followed wherever possible. Only the minimum practicable length and width of Cowpasture Road would be affected by construction at any one time to minimise disruption and inconvenience to road users. Construction traffic would be directed wherever possible to use main roads rather than local roads for site access.

Operation of the Road

A summary of the works that would impact on traffic flow along Cowpasture Road during operations includes:

- provision of 4 lanes with dual carriageway along the road.
- upgraded signalised intersections along the road at North Liverpool Road and Gloucester Street and an improved intersection at Mount Street (including a right turn ban except for buses).
- an improved intersection treatment and extra lanes near Elizabeth Drive to allow better turns.
- improved turning movements at intersections for buses and heavy vehicles.
- parking restrictions along the road with *No Standing* at all times.
- the performance of the intersections with Elizabeth Drive, Mount Street, Gloucester Street and North Liverpool Road would all improve with the proposal whether in Stage 1 or Stage 2 as shown in Table 4.

Table 4 Existing and Future Level of Service at Intersections

Intersection with Cowpasture Road	Existing Level of Service		Future Level of Service	
	AM Peak	PM Peak	AM Peak	PM Peak
North Liverpool Road	D	E	D	D
Gloucester Street	B	C	A	A
Mount Street	D	C	B	B
Elizabeth Drive	F	F	D	D

The traffic impacts on residents in the adjacent residential areas and for travellers along the road resulting from the proposal would be as follows:

- an increase in traffic volumes on Cowpasture Road in peak hours as traffic is drawn from alternate routes.
- compared to the existing situation greater potential for stop/start driving because of the increased number of signalised intersections.
- greater restrictions on turning movements onto and off the road including a median that would limit "U" turns and increase travel to some local facilities compared to the existing 2 lane undivided road.
- no opportunity for visitors and residents in the area and travellers along the road to park and stop along the road.
- due to a right turn ban at Mount Street increased traffic diversion onto Gloucester Road (which has the capacity to accommodate the increased flows).
- better heavy vehicle and bus operations along the road.

With the proposal both bus companies providing services to John the Baptist Primary School and Freeman Catholic High School would continue to use the school bus zone in Mount Street as the main drop-off and pick-up point. Right turns would be permitted from Mount Street into Cowpasture Road for buses only.

Following completion of the proposal residents and visitors to the area and travellers along Cowpasture Road would have improved access to destinations within and outside the region. However, when the Western Sydney Orbital (if untolled) and the Liverpool to Parramatta Transitway proceed, then the number of vehicle trips along this section of Cowpasture Road would decrease slightly.

7.3.12 European Heritage

The proposal would be constructed within areas already disturbed. There are no items of environmental heritage listed in the Fairfield or Liverpool Local Environmental Plans within or near the proposed works area. However it is possible due to past development in the area that relics greater than 50 years old may be unearthed during construction. If this event occurred then the Heritage Council of NSW would be contacted for advice and/or a permit to remove or destroy the item.

7.3.13 Aboriginal Heritage

NSW National Parks and Wildlife Service has advised that a search of the NSW Aboriginal Sites Register has revealed five recorded open camp sites north of the area. Four of the sites are located in the Abbotsbury area and one site near Orphan School Creek outside the Cowpasture Road road reserve. If any archaeological sites or relics were found during construction then the NSW National Parks and Wildlife Service and the RTA's Environmental Services Branch, Aboriginal Liaison Officer would be contacted immediately for further advice and action.

7.3.14 Noise and Vibration Effects

The EPA's *Environmental Criteria for Road Traffic Noise* specifies the criteria to be used for redevelopment of arterial roads such as Cowpasture Road. The road traffic noise criteria for day time from 7am to 10pm is $L_{Aeq(15\ hours)}$ 60dB(A) and for night time from 10pm to 7am is $L_{Aeq(9\ hours)}$ 55dB(A). There are also road traffic noise criteria for sensitive land uses such as existing schools with a day time criteria of $L_{Aeq(1\ hour)}$ 45dB(A) (internal); and passive recreation areas and school playgrounds of $L_{Aeq(15\ hours)}$ 55dB(A).

The EPA's policy states:

> "In all cases the redevelopment should be designed so as not to increase existing noise levels by more than 2 dB. Where feasible and reasonable, noise levels from existing roads should be reduced to meet the noise criteria. In many instances this may be achievable only through long-term strategies such as improved planning, design and construction of adjoining land use developments; reduced vehicle emission levels through new vehicle standards and regulation of in-service vehicles; greater use of public transport; and alternative methods of freight haulage".

Traffic Noise Assessment

An acoustic and vibration assessment was completed by Koikas Acoustics Pty Ltd for the proposal in accordance with the EPA's *Environmental Criteria for Road Traffic Noise* and relevant Australian Standards. A summary of the assessments is provided below and full details are included in Attachment 5 *Acoustic Assessment for Reconstruction and Widening of Cowpasture Road from North Liverpool Road to Elizabeth Drive*. The assessments took into consideration that the maximum statutory travel speed would be 70 km/hour for the reconstruction and widening (although the existing average speed is higher than this) and provided:

- traffic noise measurements at six dwellings and one primary school in the vicinity of Cowpasture Road.
- calculations of predicted $L_{Aeq(15\ hours)}$ and $L_{Aeq(9\ hours)}$ noise levels using forecast traffic growth along Cowpasture Road.
- a sensitivity analysis based on noise barrier heights of 2, 3, 4 and 5 metres placed along Cowpasture Road. This was to facilitate a cost-benefit analysis for which the RTA would then determine whether traffic noise barriers would be erected to meet the EPA's criteria for the reconstruction and widening.
- an assessment of construction noise.
- an assessment of ground vibration levels.

Traffic noise levels were calculated using a traffic noise prediction model called the Environmental Noise Model supplemented by the 1988 version of the United Kingdom, Department of Transport, Calculation Of Road Traffic Noise. Tables 4 and 5 are summaries of the predicted traffic noise level results for daytime and night time for the six dwellings, primary school and passive open space near the proposal with varying barrier heights. The results shown in Tables 5 and 6 both assume completion of a 3.4 metre high noise wall for 160 metres along the east side of Cowpasture Road near Marley Crescent under the RTA's Noise Abatement Program.

To meet the EPA policy of $L_{Aeq(15\ hours)}$ 60dB(A) daytime and $L_{Aeq(9\ hours)}$ 55dB(A) night time such that noise levels do not increase by more than 2 dB(A) above ambient traffic noise levels in 2003, then noise attenuation measures would be required as shown in Figure 4. The primary school's portable buildings located on Mount Street would also require retrofitting to meet the EPA criteria of $L_{Aeq(1\ hour)}$ 45dB(A) (internal). The noise attenuation measures could take various forms including wood and concrete panels or a barrier on top of a vegetated mound which is Liverpool City Council's stated preference.

Table 5 Predicted Traffic Noise Levels in Daytime for 2003 and 2013 Using Varying Barrier Heights

Predicted LAeq (15 hours) in dB(A)Traffic Noise Levels for Dwellings Near the Proposal *(1)*						
Year	**2003**	**2013**	**2013**	**2013**	**2013**	**2013**
Barrier Height	Existing Road	New Road No Barrier	2 metres	3 metres	4 metres	5 metres
17 Barila Place, Bonnyrigg Heights						
54 Davina Crescent, Cecil Hills						
75 Helena Road, Cecil Hills						
31 Marley Crescent, Bonnyrigg Heights						
11 Jane Place, Cecil Hills (see Note 3)						
North Liverpool Road, Green Valley						
John the Baptist Primary School Classroom	No barriers considered as they would be ineffective - retrofitting in lieu. See *Note 2.*					
John the Baptist Primary School Playground						
Passive Open Space Near Mount Street						

Note 1 2.5 dB(A) was added to the predicted noise levels to allow for facade reflections.

Note 2 John the Baptist primary school located in Mount Street was assessed for internal noise levels. The existing portable buildings provide about 10 to 14 dB(A) reduction in traffic noise. The maximum recorded $L_{eq\ 1\ hour}$ between 8.30 am and 4.30 pm was 46 dB(A) for the store room. The classroom located next to the store room would require a 5 dB(A) reduction in noise which would be achieved by retrofitting the portable buildings. The school church currently provides a 15 dB(A) noise reduction and no additional reduction would be required to meet the EPA policy of $L_{eq\ 1\ hour}$ 40 dB(A) for daytime and night time.

Note 3 These levels have been adjusted to account for the slower traffic speeds when approaching the Elizabeth Drive intersection.

Table 6 Predicted Traffic Noise Levels in Night Time for 2003 and 2013 Using Varying Barrier Heights

Predicted LAeq (9 hours) in dB(A)Traffic Noise Levels for Dwellings Near the Proposal *(1)*						
Year	**2003**	**2013**	**2013**	**2013**	**2013**	**2013**
Barrier Height	Existing Road	New Road No Barrier	2 metres	3 metres	4 metres	5 metres
17 Barila Place, Bonnyrigg Heights						
54 Davina Crescent, Cecil Hills						
75 Helena Road, Cecil Hills						
31 Marley Crescent, Bonnyrigg Heights						
11 Jane Place, Cecil Hills (see Note 3)						
North Liverpool Road, Green Valley						
John the Baptist Primary School Classroom	No barriers considered as they would be ineffective - retrofitting in lieu. See *Note 2.*					
John the Baptist Primary School Playground						
Passive Open Space Near Mount Street						

Note 1 2.5 dB(A) was added to the predicted noise levels to allow for facade reflections.

Note 2 John the Baptist primary school located in Mount Street was assessed for internal noise levels. The existing portable buildings provide about 10 to 14 dB(A) reduction in traffic noise. The maximum recorded $L_{eq\ 1\ hour}$ between 8.30 am and 4.30 pm was 46 dB(A) for the store room. The classroom located next to the store room would require a 5 dB(A) reduction in noise which would be achieved by retrofitting the portable buildings. The school church currently provides a 15 dB(A) noise reduction and no additional reduction would be required to meet the EPA policy of $L_{eq\ 1\ hour}$ 40 dB(A) for daytime and night time.

Note 3 These levels have been adjusted to account for the slower traffic speeds when approaching the Elizabeth Drive intersection.

The noise barriers shown in Figure 4 and retrofitting of the John the Baptist primary school portable building classrooms were subject to an economic evaluation in accordance with the RTA's *Economic Analysis Manual*. The results show the noise attenuation measures are warranted as they would be feasible and reasonable while considering the need for property access and maintenance of sight lines for motorists safety. The calculated average benefit cost ratio for achieving the EPA criteria with the recommended noise barriers shown in Figure 4 was 1.4? The calculated average benefit cost ratios for barriers of different heights were between 0.8 and 1.3? The calculated average benefit cost ratio for retrofitting the primary school classrooms was 1.2?

Alternative mitigation measures were also investigated such as the use of quieter road surfaces (for example, open grade asphaltic concrete) and retrofitting of dwellings to meet EPA criteria with sound attenuating building materials. The calculated average benefit cost ratios for quieter road surfaces and retrofitting of dwellings were 0.4 and 0.5 respectively?

Figure 4. Location and Height of Noise Attenuation Measures to Meet the EPA's Criteria

Construction Noise Assessment

Construction noise can cause a variety of problems for residents, such as interference with speech communication, disturbance of work or leisure, disturbance of sleep and possible effects of physical and mental health. The level of disturbance depends on the following:

- the difference between the intrusive nature of the noise source and the existing background noise level;
- the distance between the noise source to the receiver;
- the duration of the noise; and
- the nature of the noise.

The EPA recognises that construction and demolition operations are typically noisy. The EPA criterion for construction noise for the proposal with a construction period of greater than 26 weeks would be that the L10 (15 minutes) levels must not be exceeded by more than 5 dB(A).

Construction noise EPA criteria are rarely met as in most cases the character of noise emitted from various plant and equipment during construction activities cannot always be shielded by practical means. The maximum permissible construction noise level for the site would be exceeded at the closest dwellings due to the use of jackhammers, vibratory rollers and other noisy equipment. The loudest construction noise level is expected to be over 80 dB(A) L10 (15 minutes) and occur from jackhammers.

It is likely that some construction activities would exceed the background levels by more than 5 dB(A) over the construction period. A noise barrier at least 1 metre higher than the exhaust stack of any earth moving plant would need to be erected along the property boundary lines prior to the roadworks to ensure the EPA criterion for construction noise is not exceeded. The barrier should be constructed from solid materials capable of attenuating noise levels by at least 15 dB(A) at frequencies in the 125 Hertz 1/1 octave band. For those instances where noisy plant and equipment are used it is recommended that they be operated during specific daytime periods corresponding to the highest background noise level periods between 8 to 9 am and 5 to 6 pm. It is also recommended that residents be warned in advance of noisy construction periods so that they can plan their daily work and leisure periods accordingly.

Vibration Assessment

In the absence of Australian Standards, British Standard 6472 provides guidance on potential disturbance to persons exposed to building vibration in the frequency range of 8 to 80 Hertz, most applicable to excavation equipment and road traffic. In dwellings, adverse comment may arise during day time as a result of continuous floor vibration levels in the order of 0.3 to 0.6 mm/second. At night time the residential criterion is equivalent to a vertical peak vibration level of 0.2 mm/second. However, significantly higher levels of short term vibration can be tolerated by many people for construction projects.

German Standard DIN 4150-Part 3 1986 provides guideline levels of vibration velocity for evaluating the effects of vibration in structures. The minimum "safe limit" of peak vibration velocity at low frequencies for dwellings is 5 mm/second. Over the frequency

range typical vibration in buildings from excavation and construction equipment, the threshold for visible movement of susceptible building contents (for example, plants and hanging pictures) is approximately 0.5 mm/second.

The potential sources of ground vibration for construction of the reconstruction are vibratory rollers and bulldozers. The vibration levels from operation of construction plant and equipment should be limited to the levels set out in British Standard 6472 which would be consistent with recommended guidelines set out in Chapter 174 of the EPA's *Environmental Noise Control Manual.*

It is not expected that construction activities would exceed ground vibration level limits. This is primarily due to the type of plant and equipment proposed for use on the project and the distance (generally greater than 30 metres) between the plant and equipment and most dwellings. If normal road construction activities are undertaken then vibration monitoring is not generally required inside the dwellings near the proposal, either before or during construction work. However a survey may be required when heavier construction equipment is proposed for dwellings located closer than 30 metres. Typical vibration levels are included in Table 7.

Table 7 Typical Vibration Levels

Description of Construction Activities	Vibration Levels [mm/s]	Distance [m]
Heavy trucks passing over normal road surface, measured at the footings of building	0.01 to 0.2	10 to 20
Bulldozers operating 5 metres from the dwelling	1.0 to 2.0	5
Vibratory rollers (vibratory settings unknown)	1.0 to 3.0	25
Vibratory roller (25 Hertz, low)	0.6 to 2	20 to 30

Levels of ground vibration caused by a heavy duty (over 7 tonne) vibratory roller 30 metres from a dwelling is not likely to exceed the maximum recommended structural damage criterion level. No discomfort to humans or damage to buildings is expected to occur provided all safeguards are implemented during construction. These safeguards would include a limit on any rollers operating within 30 metres of any dwelling and copies of condition surveys being provided to all owners of dwellings with a common boundary with the Cowpasture Road road reserve.

7.4 Cumulative Environmental Impacts

The cumulative impacts of the proposal would be beneficial in the long term with enhanced accessibility to the existing and developing residential and industrial areas in Fairfield, Liverpool and south-west Sydney metropolitan area; improved safety including better traffic flow and reduced number of accidents; and greater amenity and capacity for pedestrians, pedal cyclists, buses and other motorists along Cowpasture Road. Since economic development in the south-west metropolitan area would progress regardless of the construction of the proposal the cumulative impact for the proposal would be relatively minor. However, the proposal together with other nearby road improvements including reconstruction of adjoining sections of Cowpasture Road to the north between Elizabeth Drive and The Horsley Drive, development of the Western Sydney Orbital and Liverpool to Parramatta transitway would contribute towards the enhancement of the road network in the south-west Sydney metropolitan area. In addition the assessed bio-physical impact of the proposal is limited since most of the proposal is on ecologically degraded land and existing roadspace but with retention of most of the existing trees.

Cumulative impacts of the proposal include:

- enhanced accessibility to Fairfield, Liverpool and south-western Sydney.
- improved traffic flow, capacity, safety and level of service along Cowpasture Road for pedestrians, pedal cyclists, buses and other motorists.
- increased traffic on Cowpasture Road.
- land acquisition areas generally being converted from open space to roadspace areas.
- visual impact of the reconstruction and widening and loss of some native vegetation.
- increased traffic noise impact near the reconstruction and widening.
- a decline in localised air quality.
- reduced accidents, travel times and vehicle operating costs.

Based on the concept design and provided the safeguards are implemented it is considered that the cumulative environmental impacts of the proposal are generally positive and outweigh the adverse impacts.

7.5 Ecologically Sustainable Development

Use of modern transport is an important part of the quality of life in Australia including privately owned motor cars, which provide great freedom and mobility. However, much of our current use of vehicular transport is inconsistent with the principles of ecologically sustainable development (ESD). Motor vehicles rapidly consume non-renewable resources and are a major contributor to the greenhouse effect and air pollution in Sydney. To achieve ESD in transport it will be necessary to develop motor vehicles that are much less polluting and more energy-efficient than those used today and also decrease our use of privately owned cars.

The principles of ecologically sustainable development as detailed in the *Environmental Planning and Assessment Act* and a response in relation to the proposal follow.

(a) The precautionary principle - namely, that if there are threats of serious or irreversible environmental damage, lack of full scientific certainty should not be used as a reason for postponing measures to prevent environmental degradation.

There are no known threats of serious or irreversible environmental damage associated with the proposal; hence lack of full scientific certainty has not been used as a reason for postponing any of the proposed safeguard measures outlined in Section 8.1 to prevent environmental degradation. The proposal has followed the precautionary principle by ensuring that the environmental risks associated with the proposal have been considered and that relevant safeguards would be implemented to reduce any uncertainties and to avoid serious or irreversible damage to the environment.

(b) Inter-generational equity - namely, that the present generation should ensure that the health, diversity and productivity of the environment is maintained or enhanced for the benefit of future generations.

The proposal has been designed for future needs including provision for widening to 6 lanes and has the capacity to meet expected traffic growth for at least the next 20 years. While this does not provide for the next generation, it is highly likely that Cowpasture Road would be maintained to provide a high level of service to cater for all road users in the foreseeable future. The health, diversity and productivity of the road reserve environment would be maintained for the benefit of future generations provided the safeguards associated with the proposal are implemented.

(c) Conservation of biological diversity and ecological integrity.

The proposal would conserve biological diversity and ecological integrity with a weed control programme, using seed collected from local trees and locally indigenous species in landscaping of the road reserve. Existing trees would be retained wherever possible in the median and roadside. Other safeguards would be implemented to minimise any adverse impacts on soils, water and air quality; flora and fauna; landscape and visual qualities; the nearby residential communities; and the surrounding road network.

(d) Improved valuation and pricing of environmental resources.

The cumulative impacts of the proposal, as discussed in Section 7.4, would be beneficial in the long term. However, while prices for natural resources should be set to recover the full social and environmental costs for their use, many environmental values cannot be set in monetary terms. Nevertheless, the proposal and the community would make greater use of the road corridor reflected in the benefit cost ratio of ? (which excludes some externalities such as the cost of noise and air pollution) calculated over 20 years. The value of the Cowpasture Road reconstruction and widening would increase with the proposal despite the relatively high price of construction. In addition the ultimate disposal of all waste has been considered for the proposal in an ecologically responsible manner.

In summary, the proposal is generally in accord with the principles of ESD. Cowpasture Road is an integral part of the metropolitan Sydney main road network and the proposal would provide a more efficient means for the transport of people and goods than at present. The reconstruction and widening would provide a sustainable balance between environmental and economic objectives and compliments the use of other forms of transport including provision for pedestrians, pedal cyclists and buses.

8. Implementation Stage

8.1 Summary of Proposed Safeguards

There would be some short term, localised and adverse impacts associated with the proposal particularly during construction requiring safeguards. Any adverse impacts of constructing the proposal would be outweighed by the long term beneficial effects of the proposal. In summary the safeguards that would be implemented for the proposal are listed below and would be included in an Environmental Management Plan.

- ◊ Inconvenience to Cowpasture Road travellers and nearby residential communities would be minimised through best construction and traffic management practices.
- ◊ Use of current and best available design criteria to ensure the proposal is correctly constructed, maintained and operated with adequate safety and capacity to meet all reasonable traffic needs for the next 20 years.
- ◊ Implementation of environmental protection requirements of the RTA's Contract Manual and guidelines which includes the following specifications as a minimum:
  - Part G1 Job Specific Requirements
  - Part G2 General Requirements
  - Part G3 Occupational Health and Safety Requirements
  - Part G36 Environmental Protection Requirements
  - Part G10 Control of Traffic
  - Part R1 Erosion and Sedimentation Control (Permanent and Temporary)
  - Part R11 Stormwater Drainage (General)
  - Part R13 Drainage Structures
  - Part R41 Clearing and Grubbing
  - Part R43 Earthworks (Cut, Fill and Imported Fill)
  - Part R50 Stabilisation of Earthworks
  - Part RG92 Batter Protection Treatment
  - Part RG93 Retaining Structures
  - Part R162 Vegetation
  - Part Q7 Quality System.
- ◊ A safety audit of the detailed design of the proposal would be completed before construction of the proposal and any findings implemented.
- ◊ Traffic during construction would be managed in accordance with the requirements of Australian Standard 1742.3 - 1996 *Manual of Uniform Traffic Control Devices Part 3: Traffic Control Devices for Works on Roads.*
- ◊ Two lanes on Cowpasture Road would be available for traffic at all times.
- ◊ Traffic arrangements during construction would be subject to RTA approval.
- ◊ All land acquisition and requirements for easements would be by negotiation under the terms of the *Land Acquisition (Just Terms Compensation) Act.*
- ◊ Disruption of access to properties would be minimised and prior arrangements made with affected owners in the event of any short term disruption.
- ◊ Construction areas for the proposal would be maintained in a clean and tidy state at all times.
- ◊ Regular road sweeping of the Cowpasture Road travel lanes adjacent to the reconstruction works to ensure a clean and safe pavement.
- ◊ Sedimentation potential from construction works requiring installation of selected temporary sedimentation controls (for example, catch drains, diversion drains and banks, sedimentation basins, geofabric silt fences at the base of all earth works,

geofabric covered hay or straw bales secured around all storm water inlets and soil stabilisation measures) along and around the construction areas and to be documented in a Soil and Water Management Plan.

- ◊ The Soil and Water Management Plan would also detail surface water control, storm water drainage, landscaping and erosion and sediment control measures required during construction to minimise sedimentation impacts.
- ◊ Regular monitoring and maintenance of the sedimentation controls to ensure they perform in a fully functioning condition at all times.
- ◊ Sediments and pollutants would be removed from temporary sedimentation basins on a regular basis and the contents disposed of in accordance with the requirements of the EPA.
- ◊ Any material stockpiles would be located in or adjacent to the road reserve and protected from possible erosion.
- ◊ A construction compound would be located adjacent to the western side of the road reserve on Sydney Water and RTA land nearby the reservoir and Gloucester Street.
- ◊ The construction compound would be security fenced and lit at night and include amenities sheds, portable toilets, plant and equipment storage areas, bunded areas for storage of petroleum, distillate and other chemicals to comply with EPA and WorkCover Authority requirements.
- ◊ On-site domestic waste and sullage facilities would be provided in the construction compound.
- ◊ Construction hours would generally be from 7 am to 6 pm Monday to Friday and 7 am to 1 pm on Saturdays.
- ◊ From 7 am to 8 am on Saturdays only inaudible work would be allowed.
- ◊ Work would not be permitted on Sundays and public holidays or at night unless authorised by the RTA and EPA where required.
- ◊ Any night work would follow the existing procedure used by the RTA Sydney Operations Directorate and endorsed by the EPA with regard to night time road works noise.
- ◊ A temporary earth bund would encompass any area where washing out of trucks or containers may occur. This area would be regraded to match surrounding landform and landscaped at completion of construction.
- ◊ No blasting would be permitted during construction.
- ◊ Exposed earthworks areas would be stabilised as quickly as possible.
- ◊ Materials transported in trucks travelling on public roads would be covered.
- ◊ Tailgates of all vehicles transporting materials on public roads would be securely fixed, sealed and loads covered.
- ◊ No contaminated material would be used in any earthworks.
- ◊ Construction work would be regularly monitored and a dedicated water cart would suppress dust as required.
- ◊ Any dust fall-out generated by the reconstruction works would not exceed an annual average of 2 grams/square metre/month above background levels.
- ◊ Any excavated or excess pavement material and concrete would be incorporated in the earthworks for the proposal as a first priority or transported off-site for recycling.
- ◊ No burning or burying of wastes would be permitted on-site.

- ◊ All non-recyclable waste would be disposed of at legally operating waste disposal sites.
- ◊ All internal combustion motors would not be permitted to emit continuous visible smoke for greater than 10 seconds on public lands.
- ◊ No vibratory rollers would be permitted to operate within 30 metres of any dwelling.
- ◊ A condition survey of all dwellings with a common boundary with the Cowpasture Road road reserve would be completed by the RTA and a copy provided to every owner before construction commences.
- ◊ A landscape plan would be implemented by the RTA and/or contractors.
- ◊ Environmental resources would be maximised by retention of existing vegetation and resources where possible.
- ◊ The number of trees to be removed would be the minimum necessary for the safe excavation and construction operations.
- ◊ Site topsoil would be reused on site in landscaping works.
- ◊ Native vegetation removed in construction would be chipped and reused as mulch in landscape works.
- ◊ A weed control programme would be included in the landscape works.
- ◊ Any exotic vegetation, noxious weeds, associated leaf litter and soil cleared for the construction works would not be used in the landscaping of the disturbed areas.
- ◊ Propagules of all noxious weeds would be removed from the construction area for disposal at a legally operating disposal site.
- ◊ Locally indigenous species would be used in the landscape works and in particular spotted gums, grey boxes and forest redgums.
- ◊ Where possible seed would be collected from local trees and propagated for the landscape works.
- ◊ Any acoustic attenuation mounding would be planted with a combination of native trees, shrubs and groundcovers.
- ◊ Any suitable vegetation would be provided to community groups as firewood as a first priority and then disposed of at a nearby legally operating waste disposal site.
- ◊ Trees with limbs overhanging Cowpasture Road would not be removed unless absolutely necessary for safety or construction reasons. Any overhanging limbs would be cut back where possible.
- ◊ The boundary of the area to be cleared and the native trees to be retained would be clearly delineated and fenced by 'Paraweb' or similar fencing to prevent damage from workers and machinery.
- ◊ Parking of vehicles or storage of materials would not be permitted beneath the canopy of trees to be retained.
- ◊ Exposed earthworks construction areas would be progressively landscaped with native species as soon as possible following completion of stages of construction.
- ◊ A buffer of fast growing native shrub species would be planted along the road reserve boundaries except for the grassed swale areas on the western side of Cowpasture Road.
- ◊ Landscaped areas would be maintained for at least 12 months with 3 monthly inspections following completion of construction.
- ◊ Utilities and infrastructure would be relocated as required by the providers.
- ◊ Street lighting along Cowpasture Road would be put underground as part of the proposal.

- ◊ Road drainage requirements would be determined in conjunction with Liverpool and Fairfield City Councils.
- ◊ Gross pollutant devices would be installed on each drainage outlet into the grassed drainage swales.
- ◊ Construction equipment would be maintained to meet EPA requirements.
- ◊ No vehicle maintenance would be permitted outside the construction compound except in emergencies.
- ◊ Mufflers would be fitted to all construction plant and equipment to meet EPA requirements.
- ◊ Heavy vehicle traffic generation during construction would be confined to Cowpasture Road and other main roads wherever possible.
- ◊ Concrete and asphaltic concrete would be transported from legally operating established batching plants located near the proposal.
- ◊ No batching plant would be permitted on-site.
- ◊ Cleaning out of batched concrete mixing plant would be at approved areas within the road reserve for drying out and incorporation in the earthworks.
- ◊ Construction 'hold points' would be enforced where irreversible environmental damage may occur; European relics, Aboriginal sites or contaminated material were encountered.
- ◊ If any Aboriginal archaeological sites or artefacts were found during construction then work would cease within 50 metres of the site and the NSW National Parks and Wildlife Service and RTA's Environmental Services Branch, Aboriginal Liaison Officer would be contacted promptly for further advice and action.
- ◊ If European relics were unearthed during construction then the Heritage Council of NSW would be contacted for advice and/or a permit to remove or destroy the item.
- ◊ Construction noise would be limited to EPA requirements as far as practicable.
- ◊ Noisy construction plant and equipment (eg. use of jack hammers and vibrating rollers) would only be used during specific day time periods corresponding to the highest background noise levels from 8 to 9 am and 5 to 6 pm and outside school hours.
- ◊ For periods where noise activities are likely to take more than 4 weeks, temporary barriers would be erected as close as practically possible to the earth moving plant prior to the roadworks commencing. Barriers would be at least 1 metre above the exhaust stack of such plant. Barriers should be constructed from solid materials capable of attenuating noise levels by 15 dB(A) at frequencies in the 125 Hertz 1/1 octave band.
- ◊ Nearby residents would be warned in advance of noisy construction periods.
- ◊ The contractor would use the best available techniques not entailing excessive cost with the L_{10} (15 minutes) level measured at dwellings near Cowpasture Road not to exceed 5 dB(A) above background noise levels.
- ◊ Noise attenuation measures would be installed as per Figure 3 of the REF subject to further assessment being undertaken by the RTA on whether the recommended measures are cost effective and practical.
- ◊ Any traffic noise barriers required would be erected on the road reserve/property boundary lines as soon as practically possible.
- ◊ Any permanent noise amelioration measures would be finalised in consultation with Liverpool and Fairfield City Councils.

- ◊ Traffic noise would be monitored within one year of commissioning of the proposal to determine whether any installed noise control measures are effective.
- ◊ If the actual noise levels one year after opening exceed those predicted for the tenth year after opening in 2013, then further remedial measures would be undertaken subject to being cost effective and practical.
- ◊ The requirements of all relevant legislation relating to air quality, water quality and noise would be met.
- ◊ All approvals and licences needed to construct the proposal including any air, noise and water pollution licences from the EPA would be obtained.
- ◊ Nearby residents would be informed by letter box drop of the proposal before construction commences.
- ◊ Nearby residents of Cowpasture Road would be informed of any night time construction work at least three days in advance.
- ◊ The EPA's Hotline on 131 555 would be informed of any night construction works and the name of the project or site manager to contact in an emergency.
- ◊ Procedures for monitoring community comments and taking appropriate actions would be implemented.
- ◊ The RTA would obtain agreement with Liverpool and Fairfield City Councils concerning on-going maintenance of landscaped areas including the grass drainage swales and gross pollutant devices.
- ◊ All the safeguards would be incorporated in an Environmental Management Plan to be prepared by the contractor(s) and/or RTA before construction commences to minimise adverse environmental impacts. The Environmental Management Plan would include provision for hold points where environmental damage may occur, regular reports and audits on the environmental management of the project, details of nonconformances, verification activities and emergency responses.

The above list of safeguards is a minimum for implementation and may not be exhaustive and change as a result of public authorities requirements, changes in legislation, community consultation and detailed design development.

8.2 Implementation Process

The safeguards include all measures that might reasonably be taken to minimise adverse environmental impacts. The safeguards for construction and operation of the proposal would be included in an Environmental Management Plan and contract documents for implementation and monitored to minimise adverse environmental impacts. Construction would commence after the environmental assessment process is complete and tenders have been let, evaluated and awarded. Construction 'hold points' would be enforced where irreversible environmental damage may occur; relics or Aboriginal sites were exposed; or contaminated material was encountered.

The successful tenderer(s) for the construction of the proposal would be required as part of the contract to meet the specifications and safeguards detailed in this REF and RTA Assessment Report. The safeguards include all measures that might reasonably be taken to minimise adverse environmental impacts during construction and operations of the

proposal. Specifically all activities must comply with the environmental provisions set out in this REF and Assessment Report for the proposal and project specifications. The collective safeguards would be included in an Environmental Management Plan and/or contractor(s) Environmental Control Plans to be prepared by the contractor before construction commences for acceptance by the RTA for implementation and monitoring. In addition, all activities carried out on site must comply with the relevant provisions of all legislation including regulations relating to construction, operations and maintenance of the project.

SECTION C - FINALISATION

9. Summary of Key Issues

9.1 Major Beneficial Effects

The major beneficial effects of the Cowpasture Road reconstruction and widening would be enhanced accessibility to the main road network, south-western Sydney and the Sydney metropolitan area; improved safety, level of service and traffic flow for motorists, buses, pedestrians and pedal cyclists along the reconstruction; reduced number of accidents and travel times; improved amenity and roadside landscaping. Other benefits of the proposal include:

- provides new infrastructure at a satisfactory Level of Service for forecast traffic volumes.
- reduced vehicle operating costs.
- provides consistency of travel along Cowpasture Road between The Horsley Drive and North Liverpool Road.
- reduced conflicting traffic movements through traffic segregation along the divided carriageway and signalised intersections.
- provides some attenuation for noise generated by vehicles along Cowpasture Road.

9.2 Major Adverse Effects

The major adverse effects of the proposal include possible delays to motorists along Cowpasture Road during construction, strip land acquisition of open space and removal of native vegetation from the road reserve. Local residents would also have increased levels of noise, dusts, vibration, traffic generation and general disruption to daily activities during construction. Noise levels would increase and air quality would decline with increased traffic flows in future. There would be also a medium term loss of visual amenity for some nearby residents until landscaped areas matured. Other adverse effects of the proposal include additional road surface, noise attenuation measures, drainage controls, signs and markings to maintain.

9.3 Characteristics

The characteristics of the proposal would be similar to the section of Cowpasture Road north of Elizabeth Drive with increased road safety, capacity and better landscaping. The reconstruction and widening would be of modern design and similar appearance to the recently upgraded sections of Cowpasture Road north of Elizabeth Drive. The interactions between the proposal and the affected roadside environment would be localised except for Cowpasture Road travellers inconvenienced during construction.

9.4 The Extent of the Impacts

The impacts during construction would be medium-term over a 12 month period in Stage 1, adverse and localised except for the inconvenience caused to Cowpasture Road travellers. The main construction impacts include land acquisition, construction noise, dusts under windy conditions, loss of introduced and native vegetation, disruption to traffic and traffic generation. The extent of the positive impacts during operations would be long-term, beneficial and cumulative on a regional scale and include improved accessibility to the south-west Sydney metropolitan area, improved safety, better traffic flow and level of service along the landscaped Cowpasture Road reconstruction and widening. It is considered the long-term local and regional benefits of the proposal outweigh the medium-term localised and acceptable environmental impacts, provided the safeguards are implemented.

9.5 The Nature of the Impacts

Based on construction experience of similar reconstruction projects the level of confidence in the prediction of environmental impacts is relatively high. It is anticipated that the affected environment would have the resilience to cope with the predicted environmental impacts. With the safeguards implemented during construction it is considered the environmental impacts are manageable although irreversible.

Construction and operations of the proposal would comply with all relevant standards, plans, policies and legislation. The extent of public interest in the proposal is likely to be moderate due to the increasing number of Cowpasture Road travellers. The environmental impacts are likely to be acceptable to the public with implementation of the safeguards.

10. Consideration of Clause 82 Checklist

In assessing the impact of the proposal for the purposes of Part 5 of the *Environmental Planning and Assessment Act* the following Clause 82 factors for consideration of likely impact of an activity on the environment are summarised.

(a) any environmental impact on a community;
There would be adverse and beneficial environmental impacts on the adjacent residential communities during construction and operations of the proposal.

(b) any transformation of a locality;
There would be a long term transformation of approximately 6 hectares of vegetated road reserve and open space to pavement area and roadside landscaped area, which would change the views and appearance in the locality.

(c) any environmental impact on the ecosystems of the locality;
There would be minor environmental impact on local ecosystems due to the modified nature and managed land uses in the locality.

(d) any reduction of the aesthetic, recreational, scientific or other environmental quality or value of a locality;

There would be no known reduction in the scientific or other environmental quality or value of the locality due to the proposal except for removal of portions of remnants of Cumberland Plain Woodland. There would be a reduction in the aesthetic quality of the locality with construction of the proposal, increased signage and traffic control measures creating a larger and more visible road presence. There would be a loss of approximately 2 hectares of passive open area with the proposal.

(e) any effect on a locality, place or building having aesthetic, anthropological, archaeological, architectural, cultural, historical, scientific or social significance or other special value for present or future generations;

There would be no known adverse impacts on a locality, place or building of significance for present or future generations.

(f) any impact on the habitat of any protected or endangered fauna (within the meaning of the National Parks and Wildlife Act 1974);

With respect to the above Act and Section 5A of the *Environmental Planning and Assessment Act, 1979*, there would be no threat to any protected or endangered fauna, given the modified nature of the locality not providing suitable habitat for protected or endangered fauna.

(g) any endangering of any species of animal, plant or other form of life, whether living on land, in water or in the air;

No known endangering of any species as a consequence of the proposal is anticipated.

(h) any long-term effects on the environment;

There would be long term effects on the environment including the visual impact of the reconstruction and a decline in local noise and air quality with increasing traffic flows along Cowpasture Road.

(i) any degradation of the quality of the environment;

No degradation of the quality of the environment would occur except for loss in acoustic and visual amenity for residents and visitors to the nearby residential areas due to construction and operations of the proposal and increased traffic flows in future.

(j) any risk to the safety of the environment;

There would be increased risks to the safety of the environment during construction associated with increased potential for traffic accidents along Cowpasture Road. Appropriate construction and traffic management safeguards would be implemented to minimise these risks.

(k) any reduction in the range of beneficial uses of the environment;

There would be no change to any beneficial use of the environment apart from the approximately 6 hectares of vegetated road reserve and open space changing to road works area.

(l) any pollution of the environment;

Additional pollution would be generated by the proposal including increased air and noise emissions from increased traffic flows along Cowpasture Road in future.

(m) any environmental problems associated with the disposal of waste;

All generated wastes except introduced vegetation would be recycled as a first priority, otherwise contained and removed from the construction site for safe disposal at a legally operating waste disposal site according to statutory requirements. Any contaminated material would be disposed of according to EPA requirements. No environmental problems are anticipated with the disposal of waste.

(n) any increased demands on resources (natural or otherwise) that are, or are likely to become in short supply;

No increased demands would be made on the use of resources which are, or are likely to become in short supply.

(o) any cumulative environmental effect with other existing or likely future activities;

The cumulative environmental effects of the proposal together with the construction of other proposed road improvements in the area would positively contribute towards the development of the road network in the south-west Sydney metropolitan area. Appropriate safeguards would need to be implemented to reduce the extent and nature of any adverse environmental impacts.

11. Declarations

This Review of Environmental Factors provides a true and fair review of the proposal in relation to its potential effects on the environment. It addresses to the fullest extent possible all matters affecting or likely to affect the environment as a result of the proposal.

Signed : _____ Date: August 2000.
Environmental Planning Pty Ltd

Signed : _____ Date: August 2000.
Project Manager,
Sydney Technical Services
Roads and Traffic Authority of NSW.

References

Action for Transport 2010 - An Integrated Transport Plan for NSW, Department of Transport, 1999.

Environmental Criteria for Road Traffic Noise, May 1999, Environment Protection Authority.

Cowpasture Road Traffic Study, May 2000, Sinclair Knight Merz Pty Ltd.

Soil Landscapes of the Penrith 1:100,000 Map Sheet, Bannerman S and Hazelton P, 1990, Soil Conservation Service of NSW, Sydney.

ATTACHMENT 1

Newsletter No. 1 May 2000

YOUR OPPORTUNITY TO HAVE YOUR SAY

Written comment on the proposal is invited on the accompanying "Have Your Say" form, or by letter. Submissions should be mailed to:

Mr Siva Satchi
Sydney Client Services
PO Box 558
BLACKTOWN

Comments will accepted up to 23 May 2000

If you have any further questions or would like to talk to an RTA officer about the project please contact: -

Mr Doug Darlington	(02) 9848 2870
Mr Siva Satchi	(02) 9831 0019

NEXT STEP

All submissions will be considered prior to any final decision being made on whether to proceed with the proposal as displayed or modify the proposal as a result of community suggestions.

The final outcomes will be advertised in the **"Fairfield Advance", Fairfield Champion", "Liverpool Champion" and "Liverpool Leader"**. A report which details the assessment of the Review of Environmental Factors (REF) and the final proposal will be available to the public for perusal at the RTA Wetherill Park Motor Registry, and at the RTA Parramatta and Blacktown offices. This is expected to be completed by December 2000.

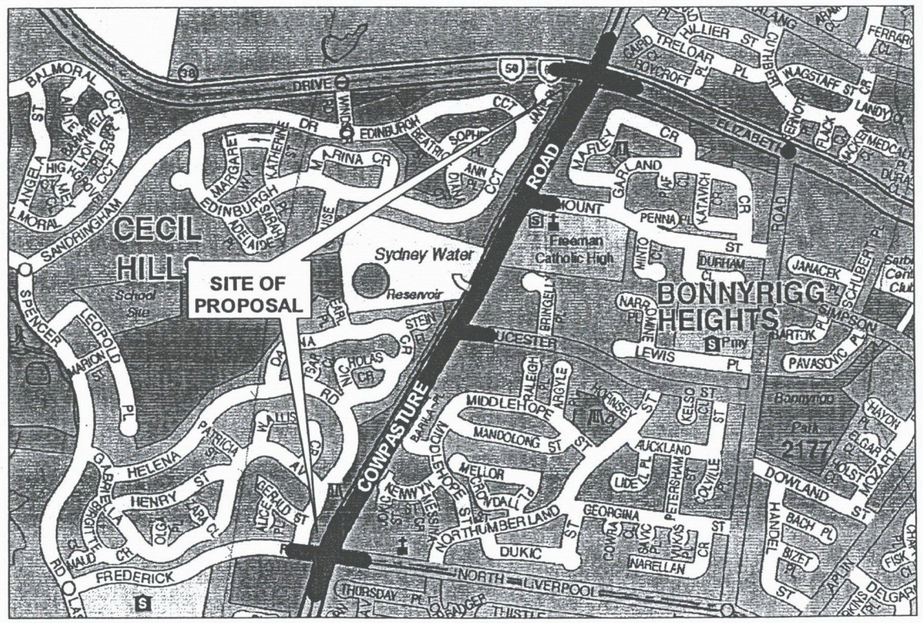
RTA

www.rta.nsw.gov.au

Proposed Upgrade of

Cowpasture Road

from
Elizabeth Drive
to
North Liverpool Road



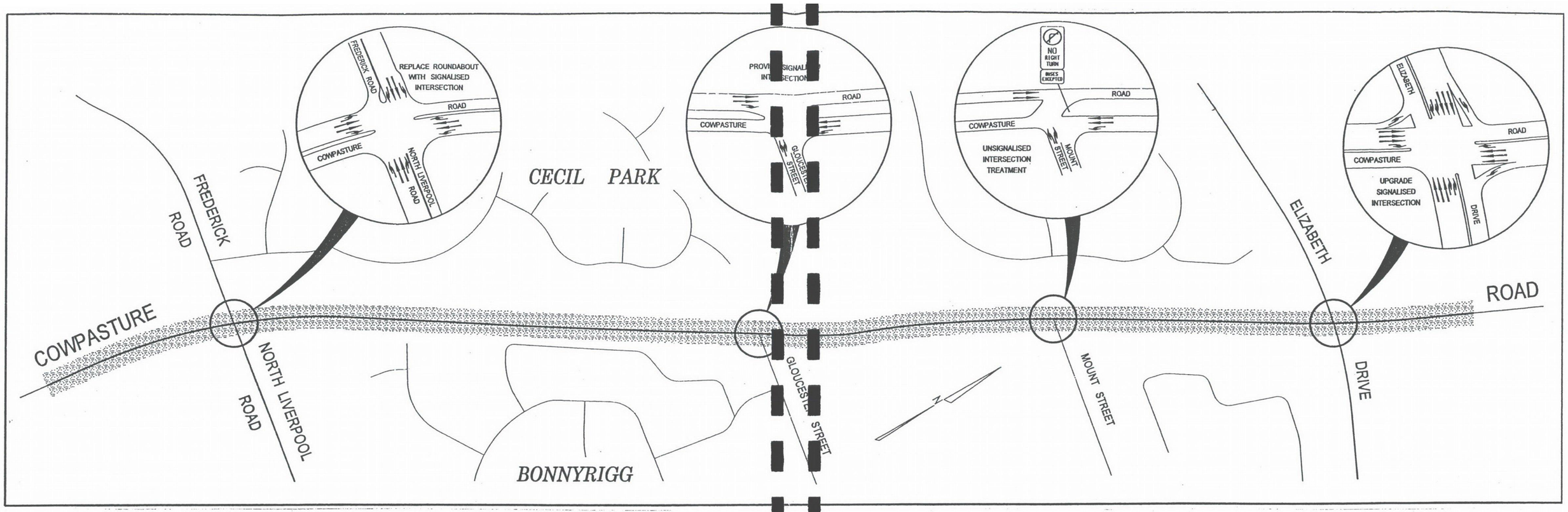
Locality Sketch

PUBLIC DISPLAY

2 May to 16 May

RTA

www.rta.nsw.gov.au



BACKGROUND

The Roads and Traffic Authority (RTA) has developed a proposal to widen and reconstruct Cowpasture Road from Elizabeth Drive to North Liverpool Road, to improve safety and traffic flow. The project could be implemented in two stages. Stage 1 works include the intersection of Cowpasture Road / Elizabeth Drive and upgrading Cowpasture Road to just south of Mount Street.

The proposed work will be of the same standard as the recently constructed section north of Elizabeth Drive. The existing 2-lane undivided road will be widened to provide 4 lane divided road (two carriageways, each of 2 through lanes plus turn bays).

Major Features of the Proposal

- Dual carriageways from Elizabeth Drive to North Liverpool Road.
- An upgraded intersection with Elizabeth Drive.
- Off-road Pedestrian/Cycleway along the eastern side.
- Traffic Signals at Gloucester Street and North Liverpool Road Intersections.
- Improved facilities for pedestrians and buses.

Benefits

As well as improving traffic flow, the proposal would:

- Reduce accidents
- Improve pedestrian safety and amenity
- Improve bicycle safety and amenity
- Improve the local amenity with landscaping, tree planting.
- Facilities to reduce pollutants in stormwater runoff from the road.
- Noise walls or mounds as appropriate.

ENVIRONMENTAL ASSESSMENT

An environmental assessment in the form of a Review of Environmental Factors (REF) is being undertaken.

Noise monitoring will be undertaken as part of the environmental assessment. Noise attenuation measures would be provided in accordance with State Government Policy.

PUBLIC DISPLAY

To provide you with the opportunity to better understand the proposal the concept plans will be on display from 2 May to 16 May 2000 at the following locations and times:

Wetherill Park Branch Library
Stocklands Town Centre
Polding Street
Wetherill Park
Monday, Tuesday, Thursday 9.30am – 8.00pm
Wednesday, Friday 9.30am –5.00pm
Saturday 9.15am – 12.00 noon

Wetherill Park Motor Registry
Shop 1 – Greenway Plaza
1183 The Horsley Drive
Wetherill Park
Monday to Friday 8.30am – 5.00pm
Saturday 9.00am – 12.30pm

Fairfield Council Chambers
Avoca Road
Wakely
Monday to Friday 8.30am – 4.30pm

ATTACHMENT 2

Summary of Public Submissions

52 submissions were received by the RTA as a result of the public display and they have been summarised below plus a summary of community issues and suggestions.

HAVE YOUR SAY RESPONSE

Total number of HYR (Have Your Say Response)	52
Number of Respondents for the project	41
Number of Respondents against the project	5
Number of Respondents unsure about the benefits against impacts	5
Number of Respondents not indicating any opinion	1

NUMBER OF SUGGESTIONS FOR CATEGORISED BY THE SUBJECT OF ISSUES

Air Pollution	2
Alternate Access to Houses adjoining Mount street	2
Alternatives to the project	3
Cycleway	1
Disruption during construction	1
Extending the road upgrade further	13
Improvement to Cowpasture Road	1
Improvements to Elizabeth Street/Mount Street Intersection	4
Improvements to Mount Street Cowpasture Road Intersection	8
Improvements to Gloucester Street/Cowpasture Road Intersection	2
Improvements to North Liverpool/Cowpasture Road Intersection	2
Landscape & Tree Planting	2
Noise Pollution	3
Noise-walls	8
Parking facilities at Mount Street Near School	1
Pedestrian Crossings	4
Traffic Lights	1
Signal Timing	1
Warning Sign	1
Traffic Restrictions	2
Re-routing Traffic	1

HYS Returns Support Reason, Suggestions and Further Comments

ID	Support	Reason	Suggestions	Respondent's Further Comments
1	Yes	1 "Good for all Residents"	0 None	No comments
2	Yes	1 Improves traffic flow	1 Provide two right turning lanes into Elizabeth Drive from Cowpasture Road to cater for the number of vehicles turning right and to prevent backing up of vehicles past the end of right turn bay. 2 Elizabeth Drive should be widened at least up to Windsor Road in the western direction to allow sufficient length for 3 lanes to converge to one lane.	If Elizabeth Drive is not widened up to Windsor Road there will be a bottle neck as the 3 lanes converge into one lane as at present.
3	Yes	1 Improve traffic flow	1 Increase the length of right turn bay on Cowpasture Road at Elizabeth Drive Intersection.	None

ID	Support		Reason		Suggestions	Respondent's Further Comments
4	Yes	1	Need to upgrade Cowpasture Road to cope with the increased traffic form residential area and the through traffic on Cowpasture Road.	1	Instead of stopping the upgrading of Cowpasture Road just past the intersection at North Liverpool Road, why not continue the upgrading right down to Camden Valley?	None
5	Yes	1	If the RTA thinks the project would benefit the people and the Local Residents, I support it. Well Done.	1	Make the traffic flow smoothly and safely with more Signs.	No. Do a good job. Everyone is happy.
6	Yes	1	Less Traffic Snarls during peak hours.	1	Do not impose No Right Turn at Mount Street to turn into Cowpasture Road. It would inconvenience the residents around Mount Street. I turn right at least once a day with no drama at all.	Why there is no public display at Wetheril Park Library? No one there knows anything about a public display. Why is this so.
				2	Consider installing signs requiring to limit Compression Braking on Elizabeth Drive and Cowpasture Road in both directions, to try to cut down on truck noise.	
7	Yes	1	Increased traffic on Cowpasture Road need additional traffic lanes	1	Do not impose No Right Turn from Mount Street to Cowpasture Road, as there are lot of parents who turn right onto Cowpasture Road, after picking up their children after school.	If there is no right turn from Mount St, then the cars will be turning left on to Wilson Rd. This will increase traffic to children walking to and from a local primary school which is only 20 m from the intersection.

ID	Support	Reason	Suggestions	Respondent's Further Comments
8	Yes	1 Same as the points stated on "Benefits" in the Newsletter. An off-road Pedestrian/Cycleway would definitely benefit locals. It improves safety to Cyclists with all those trucks using Cowpasture Road.	1 Please plant 3 times the number of trees cut down due to road widening. 2 To reduce the noise caused by trucks revving engines at low gears, especially in early mornings, a concrete noise barrier similar to that on Elizabeth Drive needs to be built.	This project has bee needed for many years as the traffic was really bad at times. But, what about the southern end of the upgrade where the 4 lanes are to be squeezed in to 2 lanes. We need to eventually widen the rest of Cowpasture Road.
9	Yes	1 Traffic jams in mornings and afternoons on Cowpasture Road significantly affects 'to and fro' transportation from work.	1 Extend the road widening to full length of Cowpasture Road, Elizabeth Drive to Wallgrove Road and full length of Wallgrove road, as this is the main traffic route from M5 to M4 to go to Penrith.	Please hurry the works.
10	Yes	1 It will improve traffic flow and will allow vehicles from Gloucester Street to turn right on to Cowpasture Road safely during morning and afternoon peak hour traffic. 2 The roundabout at North Liverpool Road intersection is dangerous due to the amount of traffic on Cowpasture Road and due to the ignorance of some drivers about the new roundabout rules.	0 None	The proposal need not be changed.

ID	Support	Reason	Suggestions	Respondent's Further Comments
11	Yes	1 It will improve traffic flow.	1 Extend the southwards widening at least up to Hoxton Park to get the full benefit of the expansion & traffic flow. The two lane Cowpasture Road will be a Clog south of North Liverpool Road intersection due to traffic from Hoxton Park.	People travelling alone Cowpasture Road can look into the back yards of property including mine just past the North Liverpool Road intersection. In order to cut down on traffic noise higher noise walls and more shrubbery could be provided.
12	Yes	1 Proposal will improve traffic flow and reduce accidents.	0 None	None
13	Yes	1 Improves the road as indicated in the Newsletter.	1 Construct Noisewall between Elizabeth Drive and North Liverpool Road as the current noise levels are already high. 2 Provide Signs for trucks not to use Compression Brake to reduce the noise.	The project should be extended till Hoxton Park Road. Lights should be added at Cowpasture Road & South Liverpool Rd (Burger King) intersection. Work should not take 3 yrs to complete as that along Elizabeth Dr and previous Cowpasture Rd project.
14	Yes	1 It will reduce traffic congestion during peak hours and improve traffic flow.	1 Erect a Pedestrian overpass near Mount Street to allow school children to cross Cowpasture road more safely.	No. This is a long awaited upgrade.

ID	Support	Reason	Suggestions	Respondent's Further Comments
15	Unsure	1 [Yes Benefit] - The widening of Cowpasture Road is overdue. 2 [No benefit] - No right turn at Mount Street will only cause greater traffic congestion during peak hours.	1 Move/relocate the school traffic away from Mount Street to Gloucester Street.	Current arrangements for School pickup & dropoff is out of control. Parents ignore the No Standing Sign in front of the school and park cars blocking driveways. Numerous letters&discussions with the School&Church authorities have fallen on deaf ears.
16	Yes	1 It is about time after 41 years..	1 Provide an alternate access to residents in Marley Crescent, Minto Cl, Durham Cl, Penna Pl, etc. to Elizabeth Drive to avoid traffic Chaos in Mount Street on school days and church events.	Residents in the area bounded by Cowpasture Rd, Elizabeth Dr, Wilson Rd and Mount St are virtual prisoners during morning & afternoon peak hours on schooldays and Church events as their only access route- Mount Street- is congested.
17	Yes	1 Widening to dual carriageway will improve traffic flow.	1 Provide a parking facility at the Mount St/Cowpasture Rd corner to prevent parents Double parking on Mount St and also parking across driveways.	Can something be done about the traffic chaos on Mount street during peak hours. Parents ignore basic road rules. Even the Police appears to have given up.

ID	Support	Reason	Suggestions	Respondent's Further Comments
18	Yes	1 It will ease the congestion of traffic that occurs at Mount Street during peak hours and school hours. 2 It will improve safety to pedestrians and cyclists.	1 Install traffic lights at Mount Street intersection to enable residents to enter Cowpasture Rd which is a nightmare at times now.	None
19	Yes	1 It will improve traffic flow on Cowpasture Rd and thus would hopefully reduce the traffic (trucks & cars) going through Cecil Hills to avoid Cowpasture Rd/Elizabeth Dr intersection.	1 Extend the proposal to Green Valley Road to reduce accident and noise pollution. 2 Widen the road to the (little) fence, not the boundary fence of property as long as noisewalls are constructed in place. 3 Landscape and plant trees on the Cecil Park to Green Valley Road.	Green Valley Rd and Cowpasture Rd need to be considered due to the amount of accidents. Trucks park on the Cecil Park side and leave their engines running when stopping to get something to eat. No Stopping Signs on this part of the road will be great

ID	Support		Reason		Suggestions	Respondent's Further Comments
20	Yes	1	It will improve traffic flow and would reduce the need for trucks from Elizabeth Dr running down Sandringham Rd, Frederick Rd on to Cowpasture Rd to avoid the delays at Elizabeth Dr/Cowpasture Rd intersection.	1	Only to allow local and light traffic to go into Frederic Road the noise from the trucks are sometimes unbearable.	Separate lanes are needed at the end of Fredric Rd for traffic going straight or turning on to Cowpasture Road.
21	No	1	The proposal will not constitute to the local community's health, as it will bring more traffic to the area , more noise and more air pollution.	1	OBJECTION: Maintain 2 lane undivided carriageway and provide alternative traffic flow. At the moment traffic from Wallgrove Rd merge on to Cowpasture Rd. Extend Wallgrove Rd to join the 15th Ave Hoxton Park to spread the traffic flow in the area.	I would like to see Cowpasture Rd be improved, to improve Stormwater flow and the catchment in the area. At the moment I have been woken up at 2-3 am in the morning by truck noise and I do not want to add more noise to the area.
22	Yes	1	The area has developed but the road works did not keep up with the development.	1	Street lights should be installed at the Cowpasture Road Gloucester Street intersection.	Wilson Road should be resurfaced.
23	Yes	1	It will improve traffic flow on Cowpasture Rd and reduce the waiting time at the Gloucester Street intersection, thus will reduce about 5 to 10 minutes of my travelling time.	1	Make sure the traffic lights at Gloucester Street do not take for ever to open during AM & PM peak hours.	Will Sound barriers be put from Elizabeth Drive to Gloucester Street? Will the works coincide with the new fire station? (ie When it will be completed if approved?
		2	It will improve safety.			

ID	Support		Reason		Suggestions	Respondent's Further Comments
24	Yes	1	Improves Traffic flow. Traffic leaving Cecil Hills & trying to enter Cowpasture Rd is heavily congested in mornings. It takes 10 mins to leave the estate. Similarly coming home down the Cowpasture Rd on the section that is being improved takes 7min.	0	None	I am happy that something is finally being done to address the current traffic congestion, which has only got worse in the last 5 years. It is about time.
25	Yes	1	Cowpasture Rd is too narrow for the amount of traffic that uses it.	0	None. Great as the proposal stands.	I have complained on a few occasions to my local member. Our efforts seemed to fall on deaf ears.
		2	Traffic lights at Cowpasture Rd/ Frederick Road intersection are long over due and will be of great benefit to all using that intersection.			

ID	Support	Reason	Suggestions	Respondent's Further Comments
26	Unsure	1 North Liverpool Rd, Gloucester St and Wilson Rd will become more congested (due to additional traffic). 2 Cowpasture Rd South of North Liverpool Rd will become (more congested) a car park as is currently the section between Elizabeth Dr and North Liverpool Road. 3 The more you try to improve traffic flow the more traffic you attract.	1 Start/complete a bypass road west of Cowpasture Road.	When you plant trees and shrubs as a part of landscaping, plant flowering and food producing (nuts, berries, etc. for birds)
27	No	1 Installing Signal lights at Cowpasture Rd/North Liverpool Rd intersection will generate a lot of traffic(additional?). Right turn from Cowpasture Rd to Gloucester St will be a nightmare. [Why???]	1 Wider road with double lanes is the best, but not a set of lights at Cowpasture Rd/North Liverpool Rd. The intersection should have a bigger roundabout with double lanes. 2 No right turns be allowed at Gloucester Street and Mount Street from Cowpasture Road.	The widening of Elizabeth Dr/Cowpasture Rd intersection is good and is a must. A round about is much better than signal lights at Nth Liverpool Rd/Cowpasture Rd. Signal lights will create too much traffic and delays. Please make a new proposal.

ID	Support		Reason		Suggestions	Respondent's Further Comments
28	Unsure	1	Yes Allow for increased traffic flow due to the ever increasing problems of congestion. I am most supportive of the proposal.	1	Noise barriers should be installed along Cowpasture Rd bordering Cecil Hills Estate. Noise is already too high.	I would appreciate more rigid controls to sound monitoring. Noise from truck's air brakes at 4.00AM and peak hour traffic is increasing at my house on the hill. The trees & earth mound barrier are no longer adequate as trees have grown and thinned.
				2	Do not have signalised intersection at Elizabeth Dr and North Liverpool Rd as standing traffic creates pollution to residential sites.	
				3	Do not replace roundabout at North Liverpool Rd as standing traffic increases car pollution to residential homes.	
				4	Provide pedestrian overpass over Frederic/North Liverpool Rd for school children.	
29	Yes	1	The population of Bonnyrigg, Cecil Hills and Green Valley is more and more every week. The level of traffic on Cowpasture Rd is terrible. We need the traffic lights.	0	None	The proposed upgrade from Elizabeth Dr to North Liverpool is perfect and should be implemented as soon as possible.

ID	Support	Reason	Suggestions	Respondent's Further Comments
30	Yes	1 Improved traffic flow on Cowpasture Rd will encourage the peak hour traffic not to use the internal Cecil Hills roads to avoid Elizabeth Dr/Cowpasture Rd traffic jam.	1 The East/West traffic across Cowpasture Rd appears to go from 2 lanes to 1 lane as it goes across the Elizabeth Dr intersection. If this is so it will produce a dangerous situation and could cause accidents. 2 The current noise level from Cowpasture Rd is excessive and noise abatement works similar to those provided north of Elizabeth Dr must be mandatory.	The roads within Cecil Hill should have speed limits reduced to 50kph and load limits be posted to prevent Heavy Vehicles access except for deliveries. The use of Compression Brakes should be banned from residential areas along Cowpasture Road.
31	Yes	1 There will be less traffic congestion and people will be able to use the road in safety. It will be better for buses in the area as I go to school in the area. It will really benefit the school Children.	1 The proposal can be improved by continuing the widening of the road to the roundabout of Hoxton Park Road. 2. I hope there will be a few crossings for pedestrians especially for school children.	A great idea. We have been waiting this for ages!! All you need to do is start as soon as possible and really quickly. Can you send me updates to my address or e-mail me on scoop4me@yahoo.com

ID	Support	Reason	Suggestions	Respondent's Further Comments
32	Yes	1 Cowpasture Rd is a critical part of local transport network. The huge growth in the area has already overloaded the capacity of the road and it will soon become more congested as more residents occupy the new homes under construction in Cecil Hills.	1 The Elizabeth Drive improvements need to be extended down to the roundabout at Windsor Rd. This is one of the only two entrance/exit for the entire Cecil Hills subdivision which makes the access to Elizabeth Dr dangerous. 2 The roundabout at Elizabeth Dr/Windsor Rd should preferably be replaced with signal lights with the extension of Elizabeth Dr upgrading to Windsor Rd.	Noise levels are already high from Cowpasture Rd and residents of Edinburgh Cct suffer badly. Noise attenuation measures are needed. If concrete Noisewalls are used, use a design sympathetic to the environment with shrubs and colour walls.
33	No	1 N/A not in my suburb. [He may not be a local resident in the immediate area]	1 Continue the upgrade down to Greenway Park estate Carnes Hill.	I use this road to visit my children & grand children who live at Raby. I have observed quite a number of near misses as well as a lot of traffic congestion from Green valley Rd until Greenways Park.
34	Yes	1 Traffic Flow will be improved.	1 Extend the upgrade to cover the entire Cowpasture Road.	None.
35	Yes	1 This should have been done years ago. There is too much traffic in the local area therefore in great need of wider roads.	1 No traffic lights at Gloucester St as the will be too many along this strip of road. A roundabout will suffice. I feel that too many traffic lights too close together tends to stop the traffic flow desired and defeats the purpose.	Basically widen Cowpasture Rd as much as is possible.

ID	Support		Reason		Suggestions	Respondent's Further Comments
36	Yes	1	It will reduce traffic congestion and reduce accidents.	1	Provide bicycle tracks and wide pedestrian access road.	How soon can you can you complete the project? Why stop at North Liverpool Road when the traffic congestion goes all the way to Camden Valley Way?
				2	Why not provide signalised intersection at Mount Street if busses can turn right, otherwise No Right Turn for all vehicles as I believe that this will cause accidents.	
37	Yes	1	The roundabout at Cowpasture & North Liverpool Roads was holding up traffic & a big danger to children crossing that intersection when walking to Cecil Hills High School.	1	Signalised intersection at Mount Street and Wilson Road and probably road humps to stop speeding up and down Mount Street (in addition to road humps in front of the school).	The Mount St/Wilson Rd intersection will be worse due to the traffic not being able to turn right up at Cowpasture Rd. The intersection is very bad at 8-9am & 2:30-3:30pm. To avoid terminal accidents a signal lights should be considered.
38	Yes	1	Improve traffic flow.	1	No Right Turn at Mount St/Cowpasture Rd intersection be limited to peak periods only.	No Right Turn at Mount St/Cowpasture Rd intersection will bring on more traffic to Wison Rd especially during peak hours. The residents coming up Cowpasture Road Can't turn into Mount Street on Weekends.
39	Yes	1	Improves traffic flow. It takes up to 30 min now to travel along Cowpasture Rd from Bosley Park to Hoxton Park Rd roundabout, during peak hour.	1	May be the road can be upgraded all the way up to Camden Valley Road.	The speed limit on the Cowpasture Rd should be reduced while it has only two lanes. There has been some horrific accidents. Traffic on Cowpasture road is ever increasing. Hope the improvements will be made soon.

ID	Support		Reason		Suggestions	Respondent's Further Comments
40	Yes	1	It will improve traffic flow along Cowpasture Rd at Elizabeth Dr Intersection. However to get greater improvement in the southern direction Cowpasture Rd needs to be dual lane all the way up to Hoxton Park Rd & beyond.	1	By providing More details: How far the kerb will be to the rear property line. There is no mention of Noisewalls where they will be and how high they will be & and type they will be.	I find it absurd that Sydney being the biggest city does not have a Freeway/Motorway that connects F3&F6. If we had such a road there would be less traffic on our local rds. There should be bigger campaign against trucks using their exaust brakes.
41	None indi			0	None	There are lot of trees on Cowpasture Rd bordering Cecil Hills. Are any of these going to be cut? If so, then the bird life which frequent these trees would also be lost.
42	Yes	1	Traffic on this section of Cowpasture Rd is very heavy during peak hours. Most of the day exit from Cecil Hills estate can be very difficult at times as there is constant traffic on the round about.	1	Have a Right Turn Bay at Mount Street and allow all traffic to turn. As the two Catholic Schools and the Church are currently accessed via right turn into Mount St. Alternatives are significantly longer in time and distance.	None
43	Unsure			0	None	The North Livepool Rd/Wilson Rd roundabout is dangerous as it is. If North Liver Pool Rd/Cowpasture Rd intersection is widened the traffic from Cecil Hills will increase and the Wilson Rd roundabout will become more dangerous.

ID	Support	Reason	Suggestions	Respondent's Further Comments
44	Yes	1 It will hopefully reduce traffic delays approaching North Liverpool & Cowpasture roads as well as reduce traffic of non residents through Elizabeth Park Estate (Cecil Hills).	1 Extend the upgrade to Camden Valley Way. 2 Make Elizabeth Park Estate (Cecil Hills) a "Local Traffic Only" area.	None
45	Yes	1 It will improve traffic flow in all direction at Cowpasture Road/Elizabeth Dr intersection.	1 Please ensure the length of left turning on Elizabeth Dr when approaching Cowpasture Rd eastwards to be at least 150m and the right turning lane on Cowpasture Rd when approaching Elizabeth Dr southwards to be 250m to avoid through blocking turning traffic 2 Increase the time the green arrow shows on at Cowpasture Rd/Elizabeth Dr as only a few cars (4 to 5) make it through on the green.	None
46	Yes	1 The upgrading will reduce traffic congestion during peak hours.	1 By getting started A.S.A.P and by doing most of the work at night and weekends so as not to affect the residents.	Upgrade the road all the way up to Camden Valley Way. Noisewalls should be included alon residential areas. Trucks are noisy and some restrictions should be put in place.

ID	Support	Reason	Suggestions	Respondent's Further Comments
47	Unsure		1 Provide 3 southbound lanes on Cowpasture Rd 2 lanes for through traffic and one lane for left turning lanes into Mount St, Gloucester St and North Liverpool Rd.	None
			2 Implement "No Right Turn (buses exempted)" from Mount St during School hours only. This will not discriminate against local residents but rather those parents who will not use the bus pass system.	
			3 Signal lights to be provided at Mount St /Wilson Road to prevent accidents due to doubling of traffic because of "No Right Turn" at Mount St/Cowpasture Rd intersection.	
			4 Mount St/Elizabeth Dr [Cowpasture Rd??] : The Median strip should have a Right Turn Safety Lane for the right turning traffic from Mount St (for Buses & Local Residents)	
			5 North Liverpool Rd (westbound) across Cowpasture Rd: This is a major feeder from Elizabeth Dr and Meadows Rd. Recommend out of the 4 lanes, 1 for left turn only, 1 for through traffic & left turn, 1 for through traffic and 1 for right turn only.	

ID	Support		Reason		Suggestions	Respondent's Further Comments
47	Unsure			6	A right hand lane be integrated into the median for local residents turning right into Mount St from Cowpasture Rd outside peak hours.	None
48	Yes	1	I live in Cecil Hills and exit via Elizabeth Dr. Bottle necks on Elizabeth Dr/Cowpasture Rd is building up enough to cause delays at Windsor Rd/Elizabeth Dr and once on Elizabeth Dr another 5 to 10min to go past the intersection.	1	Implement Elizabeth Dr/ Cowpasture Rd intersection taking note that westbound must also be extended all the way up to Wallgrove Rd/Elizabeth Dr round about.	None
				2	I am not sure whether the proposed method of improving Elizabeth Dr/Cowpasture Rd will ease traffic as signal lights will delay drivers. I Propose the RTA investigate an "Over Pass" bridge.	
49	No	1	Concern that more traffic will pass through and more noise to the area, especially to those homes close to Cowpasture Rd. Concern for the safety for School children from Cecil Hills High going to McDonalds on the other side.	1	Concrete noisewall to be provided to those houses that are on Cowpasture Road	I strongly oppose the proposal, if nothing is to be done about the noise that will follow the widening of Cowpasture Rd.
				2	Signal lights should replace the roundabout from North Liverpool Road to Cecil Hills	

ID	Support		Reason		Suggestions	Respondent's Further Comments
50	No	1	The traffic noise is unbearable at present & the traffic congestion is extreme. There was no 4 lane suggestion when I bought the land 3 years ago. [Is it that Upgrading may bring more traffic!!!]	1	Go around us & around the Airport to Wallgrove.	Go around us and use the orbital idea. No noisewalls. The noise is from heavy vehicles. I bought to live in a house & not a prison. No walls.[Is it for Re-routing truck traffic!!!!!]
				2	Remove the trucks and their exhaust brake noise from Cowpasture Road.	
51	Yes	1	Improve traffic flow and safety. Cowpasture Rd should have more than 2 lanes each way.	1	Noisewalls have to be built as it becomes very noisy with the semi-trailers & trucks travelling on Cowpasture Road, especially in the middle of the night.	None
52	Yes	1	Current access to Cowpasture Rd from Gloucester St by Vehicle is extremely difficult. With Cowpasture Rd being widened & the Fire Station being built at the corner, installation of signal lights will improve traffic flow & access to residents.	1	Erection of a pedestrian bridge over Cowpasture Rd to improve student access to Freeman High School & Cecil Hills High School.	During construction works access to Cowpasture Rd from Gloucester St & Mount St should be restricted, otherwise excessive delays will occur.

Issue Subjects and Suggestions From The Community

Subject of Issues	Suggestion	ID
Air Pollution	◆ Do not replace roundabout at North Liverpool Rd as standing traffic increases car pollution to residential homes.	28
	◆ Do not have signalised intersection at Elizabeth Dr and North Liverpool Rd as standing traffic creates pollution to residential sites.	28
Total Number of Suggestions on this Subject **2**		
Alternate Access to Houses between Elizabeth Dr & Mount	◆ Provide an alternate access to residents in Marley Crescent, Minto Cl, Durham Cl, Penna Pl, etc. to Elizabeth Drive to avoid traffic Chaos in Mount Street on school days and church events.	16
Total Number of Suggestions on this Subject **1**		
Alternatives to the Project	◆ OBJECTION: Maintain 2 lane undivided carriageway and provide alternative traffic flow. At the moment traffic from Wallgrove Rd merge on to Cowpasture Rd. Extend Wallgrove Rd to join the 15th Ave Hoxton Park to spread the traffic flow in the area.	21
	◆ Go around us & around the Airport to Wallgrove.	50
	◆ Start/complete a bypass road west of Cowpasture Road.	26
Total Number of Suggestions on this Subject **3**		

Subject of Issues	Suggestion	ID
Cycleway	◆ Provide bicycle tracks and wide pedestrian access road.	36
Total Number of Suggestions on this Subject **1**		
Disruption during Construction	◆ By getting started A.S.A.P and by doing most of the work at night and weekends so as not to affect the residents.	46
Total Number of Suggestions on this Subject **1**		
Extending the Upgrade Further	◆ Extend the road widening to full length of Cowpasture Road, Elizabeth Drive to Wallgrove Road and full length of Wallgrove road, as this is the main traffic route from M5 to M4 to go to Penrith.	9
	◆ The proposal can be improved by continuing the widening of the road to the roundabout of Hoxton Park Road.	31
	◆ Extend the upgrade to Camden Valley Way.	44
	◆ Implement Elizabeth Dr/ Cowpasture Rd intersection taking note that westbound must also be extended all the way up to Wallgrove Rd/Elizabeth Dr round about.	48
	◆ Extend the proposal to Green Valley Road to reduce accident and noise pollution.	19

Subject of Issues	Suggestion	ID
Extending the Upgrade Further	◆ Continue the upgrade down to Greenway Park estate Carnes Hill.	33
	◆ Extend the upgrade to cover the entire Cowpasture Road.	34
	◆ Instead of stopping the upgrading of Cowpasture Road just past the intersection at North Liverpool Road, why not continue the upgrading right down to Camden Valley?	4
	◆ The Elizabeth Drive improvements need to be extended down to the roundabout at Windsor Rd. This is one of the only two entrance/exit for the entire Cecil Hills subdivision which makes the access to Elizabeth Dr dangerous.	32
	◆ Elizabeth Drive should be widened at least up to Windsor Road in the western direction to allow sufficient length for 3 lanes to converge to one lane.	2
	◆ May be the road can be upgraded all the way up to Camden Valley Road.	39
	◆ The East/West traffic across Cowpasture Rd appears to go from 2 lanes to 1 lane as it goes across the Elizabeth Dr intersection. If this is so it will produce a dangerous situation and could cause accidents.	30
	◆ Extend the southwards widening at least up to Hoxton Park to get the full benefit of the expansion & traffic flow. The two lane Cowpasture Road will be a Clog south of North Liverpool Road intersection due to traffic from Hoxton Park.	11

Total Number of Suggestions on this Subject **13**

Subject of Issues	Suggestion	ID
Improvement to Cowpasture Road	◆ Provide 3 southbound lanes on Cowpasture Rd 2 lanes for through traffic and one lane for left turning lanes into Mount St, Gloucester St and North Liverpool Rd.	47
Total Number of Suggestions on this Subject **1**		
Improvement to Elizabeth Drive/Cowpasture Road	◆ Increase the length of right turn bay on Cowpasture Road at Elizabeth Drive Intersection.	3
	◆ Please ensure the length of left turning on Elizabeth Dr when approaching Cowpasture Rd eastwards to be at least 150m and the right turning lane on Cowpasture Rd when approaching Elizabeth Dr southwards to be 250m to avoid through blocking turning traffic	45
	◆ I am not sure whether the proposed method of improving Elizabeth Dr/Cowpasture Rd will ease traffic as signal lights will delay drivers. I Propose the RTA investigate an "Over Pass" bridge.	48
	◆ Provide two right turning lanes into Elizabeth Drive from Cowpasture Road to cater for the number of vehicles turning right and to prevent backing up of vehicles past the end of right turn bay.	2
Total Number of Suggestions on this Subject **4**		
Improvement to Mount Street/Cowpasture Road	◆ Do not impose No Right Turn at Mount Street to turn into Cowpasture Road. It would inconvenience the residents around Mount Street. I turn right at least once a day with no drama at all.	6
	◆ No Right Turn at Mount St/Cowpasture Rd intersection be limited to peak periods only.	38

Subject of Issues	Suggestion	ID
Improvement to Mount Street/Cowpasture Road	◆ Do not impose No Right Turn from Mount Street to Cowpasture Road, as there are lot of parents who turn right onto Cowpasture Road, after picking up their children after school.	7
	◆ Why not provide signalised intersection at Mount Street if busses can turn right, otherwise No Right Turn for all vehicles as I believe that this will cause accidents.	36
	◆ Have a Right Turn Bay at Mount Street and allow all traffic to turn. As the two Catholic Schools and the Church are currently accessed via right turn into Mount St. Alternatives are significantly longer in time and distance.	42
	◆ Implement "No Right Turn (buses exempted)" from Mount St during School hours only. This will not discriminate against local residents but rather those parents who will not use the bus pass system.	47
	◆ Mount St/Elizabeth Dr [Cowpasture Rd??] : The Median strip should have a Right Turn Safety Lane for the right turning traffic from Mount St (for Buses & Local Residents)	47
	◆ A right hand lane be integrated into the median for local residents turning right into Mount St from Cowpasture Rd outside peak hours.	47
Total Number of Suggestions on this Subject 8		
Improvements North Liverpool Road/Cowpasture Road	◆ Wider road with double lanes is the best, but not a set of lights at Cowpasture Rd/North Liverpool Rd. The intersection should have a bigger roundabout with double lanes.	27
	◆ North Liverpool Rd (westbound) across Cowpasture Rd: This is a major feeder from Elizabeth Dr and Meadows Rd. Recommend out of the 4 lanes, 1 for left turn only, 1 for through traffic & left turn, 1 for through traffic and 1 for right turn only.	47

Subject of Issues	Suggestion	ID
Total Number of Suggestions on this Subject **2**		
Improvements outside the project area	◆ The roundabout at Elizabeth Dr/Windsor Rd should preferably be replaced with signal lights with the extension of Elizabeth Dr upgrading to Windsor Rd.	32
	◆ Signal lights to be provided at Mount St /Wilson Road to prevent accidents due to doubling of traffic because of "No Right Turn" at Mount St/Cowpasture Rd intersection.	47
	◆ Signal lights should replace the roundabout from North Liverpool Road to Cecil Hills	49
	◆ Signalised intersection at Mount Street and Wilson Road and probably road humps to stop speeding up and down Mount Street (in addition to road humps in front of the school).	37
Total Number of Suggestions on this Subject **4**		
Improvements to Gloucester Street/Cowpasture Road	◆ No traffic lights at Gloucester St as the will be too many along this strip of road. A roundabout will suffice. I feel that too many traffic lights too close together tends to stop the traffic flow desired and defeats the purpose.	35
Total Number of Suggestions on this Subject **1**		
Improvements to Gloucester Street/Cowpasture Road	◆ No right turns be allowed at Gloucester Street and Mount Street from Cowpasture Road.	27
Total Number of Suggestions on this Subject **1**		

Subject of Issues	Suggestion	ID
Landscaping & Tree Planting	◆ Please plant 3 times the number of trees cut down due to road widening.	8
	◆ Landscape and plant trees on the Cecil Park to Green Valley Road.	19
Total Number of Suggestions on this Subject **2**		
Noise Pollution	◆ Remove the trucks and their exhaust brake noise from Cowpasture Road.	50
	◆ Provide Signs for trucks not to use Compression Brake to reduce the noise.	13
	◆ Consider installing signs requiring to limit Compression Braking on Elizabeth Drive and Cowpasture Road in both directions, to try to cut down on truck noise.	6
Total Number of Suggestions on this Subject **3**		
Noisewalls	◆ Noise barriers should be installed along Cowpasture Rd bordering Cecil Hills Estate. Noise is already too high.	28
	◆ Widen the road to the (little) fence, not the boundary fence of property as long as noisewalls are constructed in place.	19

Subject of Issues	Suggestion	ID
Noisewalls	◆ By providing More details: How far the kerb will be to the rear property line. There is no mention of Noisewalls where they will be and how high they will be & and type they will be.	40
	◆ The current noise level from Cowpasture Rd is excessive and noise abatement works similar to those provided north of Elizabeth Dr must be mandatory.	30
	◆ Concrete noisewall to be provided to those houses that are on Cowpasture Road	49
	◆ Construct Noisewall between Elizabeth Drive and North Liverpool Road as the current noise levels are already high.	13
	◆ Noisewalls have to be built as it becomes very noisy with the semi-trailers & trucks travelling on Cowpasture Road, especially in the middle of the night.	51
	◆ To reduce the noise caused by trucks revving engines at low gears, especially in early mornings, a concrete noise barrier similar to that on Elizabeth Drive needs to be built.	8
Total Number of Suggestions on this Subject **8**		
Parking Facilities at Mount Street	◆ Provide a parking facility at the Mount St/Cowpasture Rd corner to prevent parents Double parking on Mount St and also parking across driveways.	17
Total Number of Suggestions on this Subject **1**		

Subject of Issues	Suggestion	ID
Pedestian Facilities (Crossings, Bridges, etc)	◆ Erection of a pedestrian bridge over Cowpasture Rd to improve student access to Freeman High School & Cecil Hills High School.	52
	◆ I hope there will be a few crossings for pedestrians especially for school children.	31
	◆ Provide pedestrian overpass over Frederic/North Liverpool Rd for school children.	28
	◆ Erect a Pedestrian overpass near Mount Street to allow school children to cross Cowpasture road more safely.	14
Total Number of Suggestions on this Subject **4**		
Re-routing Traffic	◆ Move/relocate the school traffic away from Mount Street to Gloucester Street.	15
Total Number of Suggestions on this Subject **1**		
Signal Timing	◆ Increase the time the green arrow shows on at Cowpasture Rd/Elizabeth Dr as only a few cars (4 to 5) make it through on the green.	45
	◆ Make sure the traffic lights at Gloucester Street do not take for ever to open during AM & PM peak hours.	23
Total Number of Suggestions on this Subject **2**		

Subject of Issues	Suggestion	ID
Signs (Warning, Traffic, etc)	◆ Make the traffic flow smoothly and safely with more Signs.	5
Total Number of Suggestions on this Subject **1**		
Street Lighting	◆ Street lights should be installed at the Cowpasture Road Gloucester Street intersection.	22
Total Number of Suggestions on this Subject **1**		
Traffic Lights	◆ Install traffic lights at Mount Street intersection to enable residents to enter Cowpasture Rd which is a nightmare at times now.	18
Total Number of Suggestions on this Subject **1**		
Traffic Restrictions	◆ Make Elizabeth Park Estate (Cecil Hills) a "Local Traffic Only" area.	44
	◆ Only to allow local and light traffic to go into Frederic Road the noise from the trucks are sometimes unbearable.	20
Total Number of Suggestions on this Subject **2**		

ATTACHMENT 3

Responses from Public Organisations

Fairfield City
Celebrating diversity

Fairfield City Council, Administration Centre, Avoca Road, Wakeley NSW 2176
Tel: (02) 9725 0222 Fax: (02) 9725 4249 DX25063 Fairfield
All communications to:
Fairfield City Council, PO Box 21, Fairfield NSW 2165

In reply please quote: G16-03-056/SMA

Contact: Mr S.M. Anderson on 9725-0239

12 November 1997

Environmental Planning Pty Ltd
(Attn: Mr B Adcock)
PO Box 390
PYMBLE 2073

Dear Sir,

REF FOR RECONSTRUCTION OF COWPASTURE ROAD - NORTH LIVERPOOL ROAD TO THE HORSLEY DRIVE.

I refer to your letter, dated 7 October, 1997, and apologise for the delay in responding to you.

A review of the plans for the proposals has highlighted the following issues which need to be considered: -

1. Service station corner Cowpasture Road & North Liverpool Road -
   A DA required a deceleration lane for this development, however, the new proposal deletes this lane. Removal of the roundabout and the installation of traffic signals will, if the kerb levels are raised, effect the OSD system and the retention of fire fighting water and pollution controls may be negated.

2. The impact of the road design on the existing overland flow paths and pollutant loads on the creeks systems and tributaries.

Should you require any further information, please contact the undersigned.

Yours faithfully,

S. Anderson

S.M. ANDERSON
MANAGER - DESIGN & TRAFFIC SERVICES

FN:0210358L.TCS (MND)

Environment
Protection
Authority
New South Wales

Civic Tower
Cnr of Jacobs Street
and Rickard Road
Locked Bag 1502
Bankstown
NSW 2200

Telephone .02. 9795 5000
Facsimile .02. 9795 5002

Mr B Adcock
Director
Environmental Planning Pty Ltd
PO Box 390
PYMBLE NSW 2073

Our Reference: BA462/5

Your Reference:

Contact: Michael Chertok

Dear Mr Adcock

RE: REVIEW OF ENVIRONMENTAL FACTORS: RECONSTRUCTION OF COWPASTURE ROAD

I refer to your letter of 7 October 1997 requesting Environment Protection Authority (EPA) consideration of the concept designs for the proposed Cowpasture Road reconstruction and comments on the requirements for inclusion in two Review of Environmental Factors (REFs) relating to the proposed works.

The EPA is happy to provide comments in relation to your request and these are outlined below. The set of factors that could be considered in the preparation of a REF are broad. While it is understood that you seek specific advice in relation to Air, Water, Noise and Waste impacts, consideration of impacts can include factors such as:

- impact on ecosystems,
- reduction in aesthetic, recreational or other local amenity parameters,
- reduction in the range of beneficial uses of the environment, and
- cumulative environmental effects.

The reconstruction, as set out in five concept plans enclosed with your letter, includes areas where construction has been completed, and where construction is currently taking place. These areas are known as Section 2 and 4 respectively. In view of this, and in terms of providing relevant advice, the comments below address Sections 1,3 and 5 of the Cowpasture Road reconstruction. It should be noted however, that an inspection on 11 November by an authorised officer of the EPA revealed that construction work on Section 3 appears to have already commenced. This matter will be raised with RTA operational staff.

The comments below are both generic and specific. Generic comments apply to REF 1 and REF 2, whereas specific comments give coverage to the identified environmental factors relating to each REF.

Generic Comments: Review of Environmental Factors 1 & 2

Air

- Construction Phase: A Dust Management Plan should be developed in relation to the construction program, including an identification of sensitive receivers. The criteria for dust fallout are enclosed with this letter.

Water

- Construction Phase: Appropriate sediment and erosion controls. This should be contained in a soil and water management plan for the proposed works.
- Operational Phase: Controls for treatment of run-off from road. The REF should identify which water quality controls are required after evaluating the types of controls that could be introduced.
- The requirements for EPA Pollution Control Approvals and Licences are attached.

Noise

- Construction Phase: Compliance with criteria specified in the EPA's Environmental Noise Control Manual (Chapter 171) wherever possible. Any works outside these criteria should only be undertaken where all practical alternatives and mitigation measures have been exhausted. The factors that should be addressed are construction work times, mitigation measures for works and equipment, details of construction program and community notification.
- Operational Phase: The emerging Road Traffic Noise Criteria should be applied and options for noise mitigation should be identified. Under the criteria, the proposed works should be classified as a redevelopment of an existing arterial road. It should be designed so as not to increase existing noise levels by more than 2dB(A). The relevant criteria are:
  - Day: $L_{eq(15hr)}60$
  - Night: $L_{eq(9hr)}55$

Waste

- The hierarchical principles of avoidance, minimisation, reuse, recycling and disposal should be applied. A waste management procedure should be implemented for the works.

Vegetation

- The removal of trees in the road corridor should be minimised wherever possible. Replanting of the roadside corridor with locally indigenous species should be undertaken.

Specific Comments: Review of Environmental Factors 1
Cowpasture Road from North Liverpool Road to Elizabeth Drive (Section 1)

Air (Construction)

- Dust: Identified sensitive receivers include the school and church at the corner of Mount Street and possibly the Sydney Water facility opposite the Gloucester Street intersection. It is recommended that consultation with Sydney Water be undertaken to determine if a potential impact exists.

Noise (Operation)

- Road traffic noise criteria for sensitive land use developments should be applied where appropriate. The following are relevant in terms of Section 1;
  - Places of worship: $L_{eq(1hr)}$40 (internal) – day and night
  - Existing school classroom: $L_{eq(1hr)}$45 (internal)
  - Passive recreation and school playground: $L_{eq(1hr)}$55

Review of Environmental Factors 2:
Cowpasture Road from Edensor Road to Prairie Vale Road (Section 3)
Cowpasture Road from Restwell Road to The Horsley Drive (Section 5)

Noise (Operation)

- Road traffic noise criteria for sensitive land use developments should be applied where appropriate. The following is relevant in terms of Section 3;
  - Passive recreation and school playground: $L_{eq(1hr)}$55

Water/Habitat Preservation (Construction and Operation):
A wetland system exists near the Bossley Road intersection on the western side of the existing road, which is obviously a habitat for many bird species. The wetland drains to a creek running under the existing road, then alongside the road at Bossley Park to the intersection with The Horsley Drive.

Potential construction impacts on this ecosystem will require mitigation using pollution controls. Activity on the whole length of Section 5 has potential to impact upon this ecosystem.

- Restwell Road to Bossley Road: Run-off on the western side of road is could flow into the wetland system.
- Bossley Road to The Horsley Drive: Run-off impacts could occur where the creek passes under existing road and along the eastern side of road to The Horsley Drive intersection.

As contaminated run-off could pollute this ecosystem it is recommended that a Stormwater and Surface Water Management Plan be prepared for the construction phase. Ecosystem protection should also be addressed in the Waste Management Plan.

It is recommended that a Flora and Fauna survey be undertaken for the wetland and associated creek system to identify habitat values. Preservation of the habitat in the operation phase of Cowpasture Road will require careful management. In this respect, consultation with Fairfield Council and the surrounding community would be advisable.

Should you have any questions regarding the above comments please contact Michael Chertok of the Sydney Region Planning Section on Ph. 9795 5242.

Yours sincerely

P.J. Wells 14.11.97

Peter Wells
Principal Officer, Sydney Planning
for Director-General

CRITERIA FOR DUST FALLOUT

EXISTING DUST LEVEL g/m^2/month	MAXIMUM ACCEPTABLE INCREASE OVER EXISTING DUST LEVEL g/m^2/month	
	RESIDENTIAL SUBURBAN	OTHER
2	2	2
3	1	2
4	0	1

NOTE:
IF THE EXISTING DUST LEVEL IN ANY AREA IS GREATER THAN 4 g/m^2/month (ie 5 or above) THEN NO INCREASE IN DUST FALLOUT IS ACCEPTABLE AS A RESULT OF ANY PROPOSED DUST EMITTING WORKS

APPENDIX I. CLEAN WATERS ACT - ACTIVITIES REQUIRING APPROVAL

Approval is required under Section 19 of the Act:

- where equipment or works are installed/constructed/modified for the discharge of pollutants into waters; that is, any project that contemplates pollutants being discharged to waters

- where equipment or works are installed/constructed/modified for treatment of pollutants prior to discharge into any waters. Certain means of storage, treatment and disposal can create a risk of pollution, including seepage.

- where equipment or works are installed/constructed/modified for the storage/ treatment or disposal of prescribed matter in a manner or in circumstances specified in Regulation 11A.

Regulation 11A specifies 'prescribed matter' as liquid wastes arising from:

- any process/operation from a mine, open cut working, coal washing, trade, industry, sewage treatment, intensive piggery (over 50 breeding sows), or intensive cattle feedlot (over 400 cattle)

- any domestic process or operation other than from daily activities in a single household.

Regulation 11A also requires an approval to store, treat or dispose of this prescribed matter if any of these are used:

- lagoon, pond, irrigation area, disposal field, disposal farm, well, bore, mine-shaft, pit, quarry or trench

- septic tank (for industrial waste)

- any sewage treatment works using any physico-chemical process, trickling filter (or variants), rotating biological filter, activated sludge including extended aeration, Pasveer process, or contact stabilisation using mechanical aeration or pure oxygen or diffused air.

Note that preparatory work for the installation, construction or modification of equipment or works requires an approval if it constitutes the beginning of the installation, construction or modification.

CHAPTER 171

NOISE CONTROL GUIDELINE

CONSTRUCTION SITE NOISE

Where there is likelihood of annoyance due to noise from construction sites, conditions such as the following may be specified in a development consent or building application.

This applies particularly to non-scheduled premises such as commercial buildings where a long construction time is not likely.

The criteria may not be applicable to long term constructions such as coal mines which may take several years.

Variations should be made according to local conditions.

Level Restrictions

(i) Construction period of 4 weeks and under.

The L_{10} level measured over a period of not less than 15 minutes when the construction site is in operation must not exceed the background level by more than 20 dB(A).

(ii) Construction period greater than 4 weeks and not exceeding 26 weeks.

The L_{10} level measured over a period of not less than 15 minutes when the construction site is in operation must not exceed the background level by more than 10 dB(A).

Time Restrictions

Monday to Friday, 7 am to 6 pm.

Saturday, 7 am to 1 pm if audible on residential premises, otherwise: 8 am to 1 pm.

No construction work to take place on Sundays or Public Holidays.

Silencing

All possible steps should be taken to silence construction site equipment. It is particularly important that silenced equipment should be used on road or rail works where 24 hour operation is necessary.

LAND & WATER CONSERVATION

Environmental Planning Pty Ltd
PO Box 390
PYMBLE NSW 2073

Contact: John Ross
Phone: (02) 9895 7441

Attention: Mr Bruce Adcock, Director

Our Ref: 0237916
[CPL192.DOC]
Your Ref: -

13-10-97

Dear Sir,

Re: REF (2) Requirements, Cowpasture Road, N.Liverpool Road to The Horsley Drive.

Thank you for your letter of 7 October 1997, seeking this Department's comments and requirements for the above Reviews of Environmental Factors.

Water Resources Matters

In the conduct of the investigations, it is recommended that you make full use of the seven water resources documents sent to you with the Department's letter of 23 September 1997 and listed below. All appropriate matters discussed in these guideline documents should be dealt with in the above REFs.

a) "Amendments to the NSW Rivers and Foreshores Improvement Act";

b) "The 7-Step Method of controlling Bank Erosion and Sediment Build-up";

c) "A Guide to Stream Channel Management";

d) "The Importance of the Riparian Zone in Water Resource Management - A Literature Review";

e) "NSW State Rivers and Estuaries Policy";

f) "Minimum Standards for Works in Rivers and Lakes"; and

g) "General Requirements for Environmental Impact Statements". (This is essentially a checklist of water resources matters to be addressed in the assessment of environmental impacts).

Soil Conservation and Land Management

Erosion and sediment control is an important environmental consideration before and during any development. It is essential to minimise onsite erosion and to prevent the offsite sedimentation of adjacent properties, streams and other waterbodies. To achieve this an

Erosion and Sediment Control Plan (ESCP) should be developed for review by this Department.

In this context, the following guidelines are for use in the environmental assessment where appropriate.

- Development should be staged to minimise the area exposed to erosion damage at any one time.
- Permanent drainage and sediment control works should be installed as a first step in, or as soon as practicable during, land development. These works should immediately be vegetated/stabilised.
- Topsoil should be stripped from each area to be disturbed and stockpiled for later spreading to promote revegetation.
- Temporary erosion and sediment control measures should be incorporated at all stages of development.
- Stormwater runoff from disturbed areas should be filtered through sediment-trapping structures. Where practicable, runoff from undisturbed areas should be controlled separately.
- Disturbed areas should be progressively stabilised and revegetated so that no areas remain untreated for more than 7 days after earthworks are completed.
- All erosion and sediment control measures should be maintained in good working condition. Maintenance should ensure that accumulated sediment is removed from filter fences, traps and basins before 60% of the available capacity is lost.
- Temporary sediment control measures should be removed once they are no longer required and the sites should be rehabilitated.

Floodplain Management

Any proposed development at the site should consider the State Government's Flood Policy as outlined in the Floodplain Development Manual (1986). The primary objective of the State Government's Flood Policy is to reduce the impact of flooding and flood liability on individual owners and occupiers, and to reduce the private and public losses resulting from flooding.

Consideration should be given, where appropriate, to the impacts of flooding on the proposed development and the impact of the proposed development on flooding for the full range of flood events. For public safety, provision should also be made for flood free access to the site, for the full range of flood events~~, for public safety~~.

Other Ecological Matters for Considerations

- What will be the impact of the development on surface water flows and hydrology of the area, particularly as it relates to any wetland?

- What will be the controls on surface water quality?
- What will be the impact of the development, if any, on groundwater quality and quantity?
- What will be the impact of the development on vegetation, both existing onsite and adjacent? Where applicable will there be a buffer zone between the development and any wetland (and any other significant vegetation or waterbodies)?
- What are the planned erosion and sediment controls for the development? These should take the form of an Erosion and Sedimentation Control Plan which can be reviewed by the Department.
- Is the development likely to impact on sensitive soils (eg: acid sulphate soils)?
- Is there likely to be any impact on the habitat of endangered species?
- If water supply is intended to be obtained from surface or groundwater, a licence under the Water Act (1912) may need to be obtained from the Department.

I trust the above comments will be helpful.

Yours sincerely,

John A Ross,
Environmental Review Co-ordinator
for Catchment Planning Manager,
Sydney-South Coast Region

NSW
NATIONAL
PARKS AND
WILDLIFE
SERVICE

Mr Bruce Adcock
Director
Environmental Planning Pty Ltd
PO Box 390
PYMBLE NSW 2073

Dear Mr Adcock

RE: PROPOSED RECONSTRUCTION OF COWPASTURES ROAD BETWEEN NORTH LIVERPOOL ROAD, GREEN VALLEY AND THE HORSLEY DRIVE, BOSSLEY PARK

Thank you for your letter dated 7 October 1997 in which you consulted with the National Parks and Wildlife Service on the above proposal.

The NPWS has a statutory responsibility for the protection and care of native flora, native fauna and Aboriginal sites, and for the management of NPWS estate. Accordingly the NPWS has an interest in ensuring that potential impacts to these attributes are appropriately assessed.

To assist you in this regard, it is recommended that the matters referred to in the attached guidelines be addressed in your assessment where appropriate. The attached guidelines also provide information on any approvals that may be relevant under the National Parks and Wildlife Act and a summary of the NPWS' databases which may be of assistance to you in your assessment.

As your may be aware, the component of the proposal between Elizabeth Drive and The Horsley Drive adjoins Western Sydney Regional Park. It is recommended that the following points be specifically considered in the REF for this component:

1. Access requirements for Western Sydney Regional Park.

2. The need for noise attenuation mounds to mitigate noise impacts to Western Sydney Regional Park.

It is recommended that you contact Geoff King, Project Officer, Metropolitan Regional Parks Unit, NPWS, on 9895-7572 to discuss the above and any other management issues regarding the Regional Park.

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43 Bridge Street
Hurstville NSW
Australia
PO Box 1967
Hurstville 2220
Fax: (02) 9585 6442
Tel: (02) 9585 6678

Please contact Derek Steller, Environmental Planning Officer, on 9585-6691 if you wish to discuss the contents of this letter in more detail.

Yours sincerely,

21.10.97

Gary Dunnett
A/Environmental Planning Manager
SYDNEY ZONE

NSW NATIONAL PARKS AND WILDLIFE SERVICE

GENERAL GUIDELINES FOR IMPACT ASSESSMENT

The National Parks and Wildlife Service (NPWS) has an interest in the potential impacts of the proposal on the following:

- areas of native vegetation,
- areas of potential value as habitat for native fauna,
- sites and places of Aboriginal heritage, and
- land dedicated under the National Parks and Wildlife Act (NPW Act).

If these attributes are anticipated to be present in your study area and / or likely to be impacted, it is recommended that assessments by a suitably qualified person be undertaken to determine the extent of impact. Details of the qualifications and experience of the person undertaking the work should be provided. In addition, a detailed description of survey methodology including survey design, sampling methods, weather conditions, time and duration of surveys and location of survey sites and transect lines should also be provided.

The matters recommended to be addressed in the assessment are as follows:

- description of the proposal and the way in which the environment will be modified;
- map(s) placing the proposal in a regional and local setting;
- applicability of Local Environmental Plans, Regional Environmental Plans and State Planning Policies (including SEPP 44 and SEPP 46)to the proposal should be discussed;
- information on the current and past land uses of the site and that of the surrounding area;
- detailed description and mapping of all vegetation communities in the study area;
- identification of any vegetation communities or plant species which are of local, regional or state conservation significance (including threatened communities, plant species or populations listed under the Threatened Species Conservation Act, 1995). The criteria for establishing significance should be documented;
- description of known or expected fauna assemblages within the study area;
- identification of fauna habitat likely to be of local, regional or state significance (including habitat of threatened fauna species or

populations listed under the Threatened Species Conservation Act, 1995);

- identification of whether there are any sites or places of cultural significance to the Aboriginal community;
- mapping of the location of all Aboriginal sites (including archaeological sites and potential sites) within the study area and an assessment of the significance of these sites;
- identification of habitat corridors and linkages between areas of remnant native vegetation which may assist faunal movement through the area;
- prediction of the likely impact of the proposal on the above attributes (quantification of the extent of impact where practical);
- assessment of measures available to minimise the impact of the proposal on these attributes and monitoring program if appropriate, and
- prediction of the likely impact of the proposal on land dedicated under the NP&W Act.

Threatened Species legislation

You are also advised that the Threatened Species Conservation Act, 1995 (TSC Act) came into effect on the 1 January 1996. The TSC Act effectively replaces the legislative scheme introduced by the Endangered Fauna (Interim Protection) Act, 1991 and amends the way threatened species are considered under the Environmental Planning and Assessment Act, 1979 and the National Parks and Wildlife Act, 1974.

It is recommended that consideration be given to the provisions of the TSC Act when undertaking the assessment of a proposal. Information on the provisions of the TSC Act may be obtained from the Department of Urban Affairs and Planning Circular No. A13 (12 December 1995). The Service has also produced an Information Pack on the TSC Act.

Aboriginal heritage and community consultation

With regard to Aboriginal heritage, it is recommended that an assessment of whether there are any places of cultural significance to the Aboriginal community be conducted. This should involve consultation with community representatives and if necessary documentary research to establish whether there are any places of traditional or historic significance to the Aboriginal community.

It is further recommended that assessment be conducted of the archaeological potential of the study area if the proposal involves disturbance to substantially unmodified ground surfaces. One means to assess archaeological potential is to obtain a site search from the Service.

In providing this information, the Service will provide advice as to the archaeological potential of the site and whether further surveying is recommended.

If the site does have archaeological potential then it is recommended that a survey be undertaken in consultation with the Local Aboriginal Land Council.

Should Aboriginal archaeological sites be present in the study area, you should consider the requirements of the NP&W Act with regard to Aboriginal relics. Under s90 of the Act it is an offence to knowingly damage or destroy relics without the prior permission of the Director-General of the NPWS.

Databases

The NPWS has two GIS databases which may provide information of use to you if you proceed to undertake further assessment. These are:

- Atlas listing of fauna and flora records in NSW;
- Aboriginal Sites register.

The material from these databases is available upon written application and the receipt of the appropriate fee. If you are interested in obtaining access to the Atlas database, please contact the Data Licensing Officer, GIS Division, on 585-6684. Records from the Aboriginal Sites register may be obtained upon written application to the Registrar, Cultural Heritage Conservation Division, on 585-6471.

INTEGRAL energy

Australian Quality Award Winner 1995 Large Organisation

28 October 1997

The Director
Environmental Planning Pty. Ltd.
P.O. Box 390
Pymble NSW 2073

ATTN:- Mr. Bruce Adcock - Director.

Dear Sir,

Re:- Reviews of Environmental Factors for the Reconstruction of Cowpasture Road Between North Liverpool Road, Green Valley and the Horsley Drive, Bossley Park.

Thankyou for your letter dated 7 October, 1997 regarding the above matter. Integral Energy has examined the proposed route affected by the RTA upgrade proposal and have identified the following issues.

Existing bare overhead low voltage, 11kV, and 33kV mains run along portions of Cowpasture Road which is to be upgraded. An overhead 132kV transmission line crosses Cowpasture Road near Elizabeth Drive. All of these assets would be affected by road widening activities and the installation of sound barriers. Safe access would also be required to our relocated overhead assets at the side of the road.

The inclusion of Integral Energy underground ducts along the length of the road and for some road crossings as part of the RTA reconstruction project would be required to allow for the possible undergrounding of the existing overhead mains and any future new mains as may be required to serve the continuing development in this area.

Integral Energy's standard overhead constructions would be chosen for the relocated assets, except where otherwise requested or stated by the RTA, Local Council, or for environmental reasons or as suggested in Integral Energy's Mains Design Instruction MDI 0015 - Selection of Distribution Mains.

In addition to this, all low voltage and 11kV road crossings shall be undergrounded. The opportunity should also be taken to underground major intersections such as Cowpasture Road and Elizabeth Drive.

Integral Energy Networks
A business unit of Integral Energy Australia
Your contact: Patricia Woodbury ☎ **Direct: (02) 9853-6552** In Reply Quote:
Huntingwood Drive, Huntingwood NSW 2148
Telephone: 131 081 Facsimile: (02) 9853 6000
Postal Address: PO Box 6366, Blacktown NSW 2148. DX 8148 Blacktown
integral@integral.com.au

It would be appreciated if these issues were considered and documented in the Review of Environmental Factors, since the relocation of the overhead mains is required solely because of the road widening. The REF should consider all issues related to any impact on or change to the electrical distribution system including:-

- Identification of specific impacts.
- Identification of options for modification / relocation
- Identification and the environmental assessment of the preferred option.

Should you require any further information, please do not hesitate to contact either myself on phone (02) 9853-6552 or the Regional Planner Mr. Joe Degabriele on phone (02) 9853-6572.

Yours faithfully

P Woodbury

Patricia Woodbury
NETWORK MAINS ASSETS

Sydney
WATER

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Jason Coghlan
Ph) 02-98288487
Fax) 02-98288528

Mr Bruce Adcock
Director
Environmental Planning Pty Ltd
PO Box 390
PYMBLE NSW 2073

14th October 1997

Dear Mr Adcock,

Thankyou for the opportunity to comment on the proposed Reviews of Environmental Factors (REF's) for the Reconstruction of Cowpasture Road Between North Liverpool Road, Green Valley and The Horsley Drive, Bossley Park.

In both REF's Sydney Water's requirements for this project would be to consider the potential relocation of mains due to reconstruction of the roads. Should the relocation of mains be deemed necessary during construction it is requested that liaison be undertaken with the Sydney Water Urban Development Team. Claudio Filippi of this team may be contacted on (02) 9828 8673.

If you require any further information please contact Jason Coghlan of the Greater Western Environment Team on (02) 9828 8487.

Yours sincerely

K Lenertz

Kate Lenertz
A/Environment Manager
Greater Western Region

OPTUS

communications pty limited
ACN 052 833 208

ASSET LOCATION REPLY

NETWORK OPERATIONS CENTRE
LEVEL 1,
65 EPSOM ROAD
ROSEBERY NSW 2018
AUSTRALIA

TELEPHONE: (+61 2) 9342 0930
FACSIMILE: (+61 2) 9342 0931

FAX COVER SHEET

TO:	BRUCE ADCOCK Copy : Doug Darlington
COMPANY NAME:	ENVIRONMENTAL PLANNING PTY LTD
FAX:	9983 1400 Fax : 9848 2809
DATE:	10/10/97
FROM:	KATE NEUBAUER FAXED 10/10/97
NUMBER OF PAGES:	1 (including cover sheet)

Dear Sir/Madam,

OPTUS Communications asset location reference No: **COMMS20587**

One Call Service Reference No (if applicable): **N/A**

With reference to your enquiry of: **10/10/97**
Address/area of proposed works: **COWPASTURE RD**
BONNYRIGG HEIGHTS/BOSSLEY NSW

After referring to OPTUS Communications existing asset plans, OPTUS Communications find that there are **NO RECORDS OF EXISTING OPTUS COMMUNICATIONS ASSETS** within the vicinity of the proposed works:

If your works are commencing more that 14 days from the date of this reply, you are asked to reconfirm this locate advice 48 hours prior to commencing works by calling (02) 9342 0930 or *FREECALL* 1800 505 777 and stating the asset location reference No. from this reply.

An independent asset location must also be obtained from OPTUS Vision, therefore, this request has been forwarded to OPTUS Vision on your behalf.

If a response has not been received from OPTUS Vision prior to commencing your works, they are contactable via *FREECALL* 1800 500 305 or by Fax on (02) 9881 4060.

Optus Communications thank you for your inquiry and appreciate your continued usage of the One Call Service and/or OPTUS Communications *FREECALL* 1800 505 777 locate service.

This reply relates directly to the location requested. Where additional works occur that have not been specified within the location request OPTUS Communications require that an additional location request be submitted. In the case of no additional location request being submitted OPTUS Communications will hold the relevant party responsible for any damage to ,or expenses incurred by, OPTUS Communications.

• Important •
The contents of the facsimile (including any attachments) may be confidential and privileged. Any unauthorised use of this document or its contents is prohibited. If you have received this facsimile in error, please notify us by telephone immediately and then shred this document. Thank you.

61 2 93420017

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Fax 1300 307 035

65,
Epsom Rd.
ROSEBERY
NSW 2018

FAX COVER SHEET

To: **Bruce Adcock** Copy : Doug Darlington

Date: **10 October, 1997**

Fax #: **99831400** Fax : 9848 2809

From: **Optus Vision** FAXED 10/10/97

No. of Pages: 1
(including cover sheet)

Dear Bruce,

In regards to your enquiry, I would like to advise you that **Optus Vision** have **no** current records of any **underground cables existing** within these requested areas:

Cowpasture Rd - North Liverpool Rd - Elizabeth Dr
Cowpasture Rd, Elizabeth Dr - Edensor Rd
Cowpasture Rd, Edensor Rd - Prairie Vale Road
Cowpasture Rd, Praire Vale Rd - Restwell Rd
Cowpasture Rd, Restwell Rd - The Horsley Dr

Thanks
Maria

CONFIDENTIALITY NOTICE

This facsimile may contain confidential information. You must not disclose, distribute or copy this facsimile to any person other than the person to whom it is addressed. If you have received this facsimile in error, please immediately telephone us to arrange for its return.

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Green Valley. NSW 2168

TELEPHONE: (02) 9607 8888
FACSIMILE: (02) 9607 0781

5th November 1997

ENVIRONMENTAL PLANNING PTY LTD
P.O. Box 390
PYMBLE NSW 2073

Dear Sir,

Re: Reviews of Environmental Factors for the Reconstruction of Cowpasture Road between North Liverpool Road, Green Valley and The Horsley Drive, Bossley Park.

I refer to the above reference and state that I have no objection with the concept design as per drawings, Reg No. 0 648.156.CD.0006 between North Liverpool Road Green Valley and Elizabeth Drive.

Our contract area of operation runs East and West along North Liverpool Rd then onto Frederick Road, Cecil Hills crossing over Cowpasture Road, except for School Bus diversions to and from Freeman Catholic High and John The Baptist Schools, Mount Street, Bonnyrigg Heights.

As per your drawings, I can turn left from Mount Street and travel along Cowpasture Road to North Liverpool Road where I can either turn left into North Liverpool Road or right into Frederick Road, Cecil Hills, also I can turn left into Gloucester Street from Cowpasture Road.

Subject to any alterations to the named plan, I will not have any problems with operating our current services.

In regards to Reviews of Environmental Factor, I am not qualified to comment.

In closing, thank you for the opportunity as a Public Transport Provider to comment.

yours sincerely
Oliveri's **METRO-LINK** Bus Lines.

P.R. Baker.

Phillip R Baker
General Manager

C.C Bus & Coach Association
Locked Bag 13
North Parramatta NSW 2151
Attention: Mr. Richard Wheatley.

CAMWEST
Affiliated with
Bicycle New South Wales

CAMWEST C/- Ian Macindoe
10 Barnetts Road
WINSTON HILLS NSW 2153

Bruce Adcock, Director
ENVIRONMENTAL PLANNING PTY LTD
P O Box 390
PYMBLE NSW 2073

Fax: 9983-1400

29 October 1997

Dear Mr Adcock

Bicycle New South Wales has passed to me your letter and associated plan diagrams for REF of the reconstruction of Cowpasture Road. CAMWEST (Cyclists' Action Movement WEST) often handles advocacy work for BNSW where it falls in our geographic region (western Sydney).

CAMWEST is pleased to see that there is a move to upgrade Cowpasture Rd which we consider a most important north-south link for cycling, particularly now that several recreational facilities are under development in the general area served by the road: Prospect Reservoir reserve; Western Sydney Regional Park; the Equestrian Centre; and Fairfield City Farm. In addition there is a current proposal for the Bay to Mountains Cycleway which will carry bicycle riders across Cowpasture Rd at a couple of points to reach Fairfield City Farm and the Western Sydney Regional Park; so, we will be concerned that those crossings be made as safe for cycling as possible and not be obstructed by noise attenuation measures.

At this stage in the process our comments are general and will serve for both REFs:

- There should be continuity of separate cycling space throughout the length of Cowpasture Road, either a cycling lane of 1.5 to 2.0 metres width or similar width shoulder designated for cycling.
- There should be suitable delineation of cycling transition through all intersections and traffic management features.
- Drainage grates should be a cycling-friendly design, as should any other features of the road, such as traffic management devices (especially roundabouts).

CAMWEST will be pleased to provide further comment to the Roads and Traffic Authority as line-marked drawings become available for our perusal.

Sincerely

Ian Macindoe
Secretary, CAMWEST

copies: Brad Donaldson, Bicycle Co-ordinator, Sydney RTA
Roland Boer, President, CAMWEST
Neil Tonkin, Executive Director, Bicycle NSW

Central Precinct Committee

Chairman - Mr E Faulder
Secretary - Mr J Priestly

52 Woburn Abbey Court
Wattle Grove 2173

28/10/97

Mr B Adcock
Environmental Planning Pty Ltd
PO Box 390
Pymble NSW 2073.

Dear Sir

Re REF of reconstruction of Cowpasture Rd.

The Central Precinct Committee of Liverpool Council has noted you correspondence. At this time the Precinct does not wish to make any comments on the proposals. We however note that works have been completed or are under way on sections of Cowpasture Rd between Elizabeth Drive and The Horsley Drive. Also it has been noted that the majority of these works are outside the boundaries of The City of Liverpool.

Yours Sincerely

John Priestly
Secretary

John the Baptist

Primary School

Mount Street
BONNYRIGG HEIGHTS NSW 2177
PO Box 1126
GREEN VALLEY NSW 2168
(Tel) 9823 5042
(Fax) 9823 4039

1st August, 2000.

Mr Bruce Adcock,
Director,
Environmental Planning Pty Ltd,
PO Box 390,
PYMBLE NSW 2073.

Dear Mr Adcock,

I am in receipt of your letter dated 20th July, 2000 outlining plans for the reconstruction and widening of Cowpasture Road.

At a recent meeting of John the Baptist Primary School Executive, the proposal was considered in light of the implications for the school and its students. Full support was given for the proposal in its current form.

It is hoped that as part of the road development, the suggested noise attenuation measures will be included. At the present time our classrooms closest to Cowpasture Road are subjected to unacceptable noise levels. These will definitely increase with the enhanced volume of traffic on the reconstructed road.

Please make contact if the school is able to assist further in the review.

Yours sincerely,

Michele King,
PRINCIPAL.

ATTACHMENT 4

Flora and Fauna Impact Assessments

November 1997, G. Leonard

Flora and Fauna Assessments for Reconstruction of Cowpasture Road Between North Liverpool Road, Green Valley and Elizabeth Drive, Bonnyrigg Heights

1. Introduction

This flora and fauna habitat survey has been carried out in order to describe the current status of the vegetation growing on a proposed road reconstruction extending along Cowpasture Road between Elizabeth Drive, Bonnyrigg Heights to the north and North Liverpool Road, Green Valley to the south. Prospect Reservoir is located further to the north of the study area. Stands of remnant native vegetation were searched in order to confirm the presence or absence of four nationally listed (ROTAP) threatened plant species which have been previously recorded in the region. These species are *Acacia pubescens* (Vent) R. Br., *Pultenaea parviflora* Sieber ex De Candolle, *Persoonia nutans* R. Br., and *Pimelea spicata* R. Br. The potential habitat value of the native vegetation was also considered, although no fauna species of national conservation significance have been recorded in the area (NPWS database).

General studies of the region have been carried out by Benson (1992), Benson and McDougall (1991) and Benson and Howell (1990). Detailed studies within the region include Mount King (1990), Travers Morgan (1990), QEM (1993), Gunninah (1995), McKenzie Land Planning Services (March 1996), Sinclair Knight Merz (1996), Landscope (1997), Webb McKeown and Associates (1996) and Lesryk (1996). These references were checked for descriptions of similar vegetation types, and for recordings of rare or endangered plant and animal species.

Vegetation along the proposed road reconstruction mainly consists of cleared paddocks, although small remnant stands of grey box woodland and Spotted Gum Forest are located adjacent to Cowpasture Road on the western side. In most sections, understorey consists of introduced grass and shrub species, with occasional occurrences of native plant species.

Topography of the site varies from flat to gently sloping. Soils derived from the Blacktown Soil Landscape Group occur over most of the site, however soils derived from the Luddenham Soil Landscape Group are indicated as occurring in the vicinity of Cowpasture Road (see Bannerman and Hazelton 1990).

Original vegetation in the study area would have consisted mainly of Cumberland Plain Woodlands (see Benson and McDougall 1991). Stands of Map Unit 9b Spotted Gum Forest are indicated as occurring to the north-east of the study site, located at the northern end of and adjacent to Cowpasture Road, (at the intersection of The Horsley Drive,

Bossley Park and Cowpasture Road); and also near the intersection of Cowpasture Road (western side) and Elizabeth Drive small stands of Map Unit 10c Grey Box Woodland are located from one to two kilometres to the east and west of Cowpasture Road (Benson 1992).

2. Methods

2.1 Identification and naming of species and families

Plant identifications were made according to recent nomenclature in Harden (1990, 1991, 1992 and 1993). Simpson and Day (1996) was used to name birds and Cogger (1992) to name reptiles and amphibians.

2.2 Classification of communities

Existing plant communities occurring in the study area have been classified by structural and floristic characteristics according to Benson (1992), Benson and Howell (1990) and Benson and McDougall (1991).

2.3 Conservation significance of plant species and plant communities

The scientific and conservation significance of individual species and vegetation types was established with reference to Briggs and Leigh (1996) and Part 2 of the *Threatened Species Conservation Act 1995* in the national context. Conservation significance of plant species and vegetation types was established in the regional context according to Benson and McDougall (1991) and Benson (1992). A search of the National Parks and Wildlife Service 1:100,000 Fauna Atlas was also undertaken.

2.4 Field survey strategy

A general survey (see York et al 1991) was carried out by Gary Leonard on 15/8/97. All stands of native vegetation and all water courses were searched, in order to inventory a majority of the flora and fauna species occurring in the study area. Searches were carried out for rare or endangered flora and fauna species that have been previously recorded in nearby sites or in similar habitats, using the "Random Meander" technique, as outlined by Cropper (1993). The weather during the survey was windy and humid.

3. Vegetation on the Study Area

No complete stands of native vegetation occur within the proposed road alignment. Vegetation along a major part of the proposed alignment consists of grazed or mown grassland with small clumps of trees or scattered individuals. Fauna habitat is limited because of the disturbed nature of the site.

3.1 Descriptions of vegetation types occurring along the proposed road alignment

3.1.1. Grassland/scattered trees

Structure
Sections of open grassland, with scattered trees or, small stands of trees to 20 metres, usually well spaced; generally with grass understorey but occasionally with scattered shrubs to 2 metres.

Occurrence
This vegetation type occurs in some areas along the western section of the proposed road alignment at Cowpasture Road, from North Liverpool Road to Elizabeth Drive.

Floristics
The most common tree species are grey box *Eucalyptus moluccana*, and spotted gum *Corymbia maculata*, although forest redgum *Eucalyptus tereticornis* is an occasional occurrence. Native shrubs are rare at the south end of the proposed road alignment, the vegetative cover mainly consisting of introduced grass species, with some native grass and herb species occurring. Common introduced shrub species include lantana *Lantana camara*, privet Ligustrum spp, and African Olive *Olea europaea* ssp africana while blackthorn *Bursaria spinosa* is a common native species.

3.1.2. Map unit 9b Spotted Gum Forest

Structure
Trees to 20 metres, occurring with an understorey consisting of grassland and scattered shrubs with a sparse to medium density.

Occurrence
This vegetation type only occurs at the intersection of Cowpasture Road and Elizabeth Road on the eastern side.

Floristics
The dominant tree species is spotted gum *Corymbia maculata* although grey box *Eucalyptus moluccana* and forest redgum *E. tereticornis* are also common. Common native shrub species include Cherry Ballart *Exocarpos cupressiformis*, *Acacia falcata* and Blackthorn *Bursaria spinosa*. Introduced grass and herb species also occur and include Paddy's Lucerne *Sida rhombifolia* and Rhodes grass *Chloris gayana*.

3.2 Value of the vegetation in the study area

3.2.1 Plant species of national conservation significance

No plant species of national conservation significance was recorded in the study area. Searches were carried out for individuals of *Acacia pubescens, Persoonia nutans, Pultenaea*

parviflora and *Pimelea spicata*, although no individuals of these species were recorded during this survey.

The conservation rating for *Acacia pubescens* is 3VCa (Briggs and Leigh 1996). This species is considered to have once been widespread (Benson and McDougall 1991), but is now restricted, in the Sydney region to small populations at Rookwood Necropolis, Lansdowne Park Bankstown, Duck River Granville and Kemps Creek. Populations are conserved in Morton and Wollemi National Parks (Briggs and Leigh 1996).

Pultenaea parviflora only occurs in Western Sydney, is threatened by continuing urban and rural development and is considered by Benson and McDougall (1991) to be inadequately conserved. The conservation rating for this species is 2V (Briggs and Leigh 1996). Large populations of this species occur to the north-west of Prospect Reservoir (pers. obs.).

Pimelea spicata was once "... widespread in the box woodlands on the Wianamatta Shales of the Cumberland Plain in western Sydney and on the Illawarra Plain south of Wollongong" (Leigh and Briggs 1992). Destruction of habitat, altered burning regimes and weed invasion have contributed to this species' decline, to the extent that only six sites are known where this species occurs. Small populations occur at Casula and at Marayong in regrowth grey box woodland (pers. obs.).

Persoonia nutans is an erect, bushy shrub to 2m, but usually 1m, generally occurring on the western edge of the Cumberland Plain and the Lower Blue Mountains, on alluvial sands, gravels and laterites. Preferred habitat is shrub-woodland and dry sclerophyll forest. The leaves are soft and narrow, and the bright yellow flowers are borne on long pendulous peduncles. The main flowering period is summer, although the fruits remain on the plant for an extended period. Benson and Howell (1990) observed that populations have been recorded on low-nutrient Tertiary Sediments at Liverpool, Castlereagh State Forest, Penrith and Londonderry. NSW Herbarium records for Liverpool LGA include occurrences at Kemps Creek, Glenfield, Hargrave Park and Voyager Point.

The species tends to occur in small scattered populations, with some extensive stands regenerating on disturbed sandy soils at Agnes Banks. This species has a conservation rating of 2E (Briggs and Leigh 1996.). The species is considered to be conserved at Agnes Banks and Windsor Downs Nature Reserves (Briggs and Leigh 1996).

3.2.2 Plant species of regional conservation significance

Benson and McDougall (1991) list species occurring in Western Sydney which are considered vulnerable in the regional context. Such species may not necessarily be rare in other parts of NSW, but are considered threatened because of an absence of conservation areas and increased levels of clearing and development in Western Sydney. One of these species was recorded in the study area. Stands of spotted gum *Corymbia maculata* were recorded on the western side of Cowpasture Road at the intersection of Elizabeth Drive and Cowpasture Road.

3.2.2. Plant communities

Clearing for the proposed road alignment may require the removal of a number of established native trees. The Scientific Committee has made a Final Determination to list Cumberland Plain Woodland as an Endangered Ecological Community in Part 3 of Schedule 1 of the *Threatened Species Conservation Act*.

Cumberland Plain Woodland is considered to be the plant community occurring on shale soils of the Cumberland Plain. The Determination lists an assemblage of plant species which constitutes this vegetation type. Twenty-eight of these species were recorded in the study area. Although the remnant stands in the study area are small, disjunct and lacking in native understorey species, they generally comply with descriptions of the plant community as outlined in the Determination and in Benson (1992) and Benson and Howell (1990).

'Eight Part Test' for Cumberland Plain Woodland under Threatened Species Conservation Act, 1995

(a) "...in the case of a threatened species, whether the life cycle of the species is likely to be disrupted such that a viable population of the species is likely to be placed at risk of extinction..."
Remnant and/or regrowth stands of Cumberland Plains Woodland occur on the western side of Cowpasture Road between the North Liverpool Road and Elizabeth Drive intersections. Only individual trees would require removal for the proposed reconstruction, and as long as adequate care is taken to protect vegetation adjacent to construction areas it is unlikely that the vegetation type would be placed at risk by the proposed reconstruction. A conserved stand of Cumberland Plains Woodland occurs within Stockdale Crescent Reserve, to the north of the study area.

(b) "...whether the life cycle of the species that constitutes the endangered population is likely to be disrupted such that the viability of the population is likely to be compromised..."
Although the Determination states that "Only 6% of the original extent of the community remained in 1988..." the amount of vegetation required for removal for the proposed reconstruction is minimal, and viable stands located back from the road reserve will be retained.

(c) "...in relation to the regional distribution of the habitat of a threatened species, population or ecological community, whether a significant area of known habitat is to be modified or removed..."
A very small proportion of this vegetation type will require removal for the proposed reconstruction. Adjacent vegetation stands could be improved by additional planting to connect disjunct stands and by removing weed species.

(d) "...whether an area of known habitat is likely to become isolated from currently interconnecting or proximate areas of habitat for a threatened species, population or ecological community..."
Only existing edges of vegetation stands will require removal, so no further fragmentation of existing stands will occur.

(e) "...whether critical habitat will be affected..."
The habitats occurring in the proposed reconstruction area also occur within adjacent conserved areas.

(f) "...whether a threatened species, population or ecological community, or their habitats, are adequately represented in conservation reserves (or other similar protected areas) in the region..."
Large, continuous stands of Cumberland Plain Woodland are conserved or are proposed for conservation at Long Neck Lagoon, Bents Basin, Nortons Basin, Mulgoa, Agnes Banks, Hawkesbury, Riverstone, Castlereagh, Marsden Park and Kemps Creek. Smaller stands are conserved at Narellan and Marayong.

(g) "...whether the development or activity proposed is of a class of development or activity that is recognised as a threatening process..."
The Determination lists the following threatening processes: "Clearance for agriculture, grazing, hobby and poultry farms, housing and other developments, invasion by exotic plants, and increased nutrient loads due to fertiliser run-off from gardens and farmland, dumped refuse or sewer discharge." Road widening operations may have several detrimental influences on adjacent vegetation, including altered moisture regimes and such edge effects as desiccation, wind-throw and introduction of introduced plant species. Such detrimental influences may be ameliorated to some extent by taking appropriate preventative steps during and after construction.

(h) "...whether any threatened species, populations or ecological communities are at the limit of their known distribution..."
Cumberland Plain Woodland extends from north of Windsor to south of Picton, from west of Penrith to east of Marayong. The stands in the study area do not occur at any geographic limits.

3.3 Fauna habitat

No extensive, complete stands of native vegetation occur in the proposed reconstruction area, nor does the vegetation that occurs on the site connect with any adjacent vegetation stands. Because most of the trees in the road reserve are juvenile to established, there are very few hollows, although up to five dead trees occur in the road reserve. Fauna species recorded during the survey are listed below. * denotes an introduced species.

BIRDS
White-faced Heron *Ardea novaehollandiae*
Masked Lapwing (Plover) *Vanellus miles*
Feral pigeon* *Columba livia*
Spotted Turtle-Dove* *Streptopelia chinensis*
Eastern Rosella *Platycercus eximius*
Kookaburra *Dacelo novaeguineae*
Richard's Pipit *Anthus novaeseelandiae*
Willie Wagtail *Rhipidura leucophrys*
Zebra Finch *Taeniopygia guttata*
Noisy Miner *Manorina melanocephala*
House Sparrow* *Passer domesticus*
Common Starling* *Sturnus vulgaris*
Pied Currawong *Strepera graculina*
Australian Raven *Corvus coronoides*
Pallid Cuckoo *Cuculus pallidus*
Common Mynah* *Acridotheres tristis*

MAMMALS
Rabbit *Oryctolagus cuniculus*

REPTILES
Eastern Water Skink *Eulamprus quoyii*

AMPHIBIANS
No calls heard during the survey.

Lesryk (1996) recorded a total of 21 native mammals, 109 birds, 14 reptiles and 5 frog species at five sites in the Liverpool LGA. Although no fauna species of national conservation significance have been recorded in the proposed reconstruction area (NPWS database), Lesryk (1996) recorded two bat species, the Large-eared Pied Bat (*Chalinolobus dwyeri*) and Common Bentwing-bat (*Miniopterus schreibersii*), which are of conservation significance as listed under the *Threatened Species Conservation Act 1995*. These species were positively identified by the analysis of recorded calls. Two other species of conservation significance, the Sooty Owl (*Tyto tenebricosa*) and Masked Owl (*Tyto novaehollandiae*), were tentatively recorded by calls (see Lesryk 1996). As both species of bat and both species of owl require tree hollows for nesting, it is unlikely that the site is visited by any of these species.

4. Conclusions and Recommendations

A number of native trees and shrubs may require removal, for the proposed reconstruction although no significant woodland stands will be affected. Where possible, existing established trees should be retained. As a number of mature and established spotted gums, grey boxes and forest redgums may require removal, a new planting of these three species should be carried out where space and visibility allow, in order to provide a link with existing trees that are to be retained on the road reserve as well as in adjacent areas. Tree seedlings should be propagated from locally collected seed.

Trees to be retained near the reconstruction area should be fenced during the construction period. No parking of vehicles or storage of materials should be permitted beneath the canopy of trees located near the new road alignment.

Any revegetation works in the road reserve should include a weed control programme. Species currently occurring in the proposed construction area which are listed as noxious plants in the Liverpool and Fairfield LGAs are Prickly Pear *Opuntia* spp, Lantana *Lantana camara* and Blackberry *Rubus fruticosus* species aggregate.

These species would benefit from disturbance so all propagules should be removed from the proposed construction area. A buffer of fast-growing native shrub species should be planted along the road reserve boundaries. Suggested species include *Acacia decurrens, A. falcata, A. implexa, A. parramattensis, Kunzea ambigua, Ozothamnus diosmifolius* and *Hakea sericea.*

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KEY			
1	grassland / scattered trees	*	introduced species
2	woodland	√	occurring in the study area
3	wetland and creeklines	#	plant species of conservation significance

FAMILY	GENUS SPECIES	*	1	2	3
FILICOPSIDA					
Dennstaedtiaceae	*Pteridium esculentum*		√	√	
Sinopteridaceae	*Cheilanthes sieberi*		√	√	
MAGNOLIOPSIDA - DICOTYLEDONS					
Acanthaceae	*Brunoniella australis*		√	√	
Anacardiaceae	*Schinus molle*	*	√		
Apiaceae	*Foeniculum vulgare*	*	√		√
Asclepiadaceae	*Gomphocarpus fruticosus*	*	√		√
Asteraceae	*Bidens pilosa*	*	√	√	
	Calotis lappulacea	#	√		
	Cirsium vulgare	*	√		
	Conyza bonariensis	*	√		√
	Coreopsis lanceolata	*			√
	Hypochoeris radicata	*	√		√
	Ozothamnus diosmifolius			√	
	Pseudognaphalium luteoalbum		√		
	Senecio madascariensis	*	√		√
	Sonchus oleraceus	*	√		√
Basellaceae	*Anredera cordifolia*	*	√		√
Brassicaceae	*Capsella bursa-pastoris*	*	√		
Cactaceae	*Opuntia stricta*	*	√		
Campanulaceae	*Wahlenbergia gracilis*		√	√	
Chenopodiaceae	*Chenopodium album*	*	√		
	Einadia hastata		√		
Clusiaceae	*Hypericum gramineum*		√	√	
Convolvulaceae	*Dichondra repens*		√		√
Epacridaceae	*Lissanthe sapida*			√	
Fabaceae: Faboideae	*Daviesia ulicifolia*		√	√	
	Dillwynia sieberi		√	√	
	Glycine clandestina species complex		√	√	√
	Glycine tabacina species complex		√		
	Hardenbergia violacea		√	√	
	Indigofera australis		√	√	
	Melilotus officinalis	*	√		
	Pultenaea villosa			√	
	Trifolium dubium	*	√		√
	Trifolium repens	*	√		

FAMILY	GENUS SPECIES	*	1	2	3
	Vicia sativa	*	√		
Fabaceae: Mimosoideae	*Acacia falcata*		√	√	
	Acacia implexa	#	√	√	√
	Acacia parramattensis		√	√	
Fabaceae: Caesalpinioldeae	*Senna pendula* var *glabrata*	*	√		
Gentianaceae	*Centaurium erythraea*	*	√		
Goodeniaceae	*Goodenia hederacea* subsp *hederacea*		√	√	
Loranthaceae	*Amyema miquelii*	#		√	
Malvaceae	*Modiola caroliniana*	*	√		√
	Sida rhombifolia	*	√		
Myoporaceae	*Eremophila debilis*			√	
Myrtaceae	*Angophora floribunda*			√	
	Corymbia maculata	#	√		
	Eucalyptus eugenioides			√	
	Eucalyptus moluccana		√	√	
	Eucalyptus tereticornis		√	√	
Oleaceae	*Ligustrum lucidum*	*	√		√
	Ligustrum sinense	*			√
	Olea europaea subsp *africana*	*	√		√
Plantaginaceae	*Plantago lanceolata*	*	√		√
Pittosporaceae	*Bursaria spinosa* var *spinosa*		√	√	
Primulaceae	*Anagallis arvensis*	*			√
Proteaceae	*Hakea sericea*			√	
Rosaceae	*Rubus fruticosus* species aggregate	*	√		
Sapindaceae	*Cardiospermum grandiflorum*	*	√		
	Dodonaea viscosa subsp *cuneata*	#	√	√	
Solanaceae	*Lycium ferocissimum*	*	√		
	Solanum prinophyllum		√	√	
Stackhousiaceae	*Stackhousia viminea*		√		
Verbenaceae	*Lantana camara*	*	√		
	Verbena bonariensis	*	√		
	Verbena rigida	*	√		√
MAGNOLIOPSIDA - MONOCOTYLEDONS					
Commelinaceae	*Tradescantia albiflora*	*			√
Cyperaceae	*Cyperus gracilis*				√
Lomandraceae	*Lomandra longifolia*				√
Poaceae	*Andropogon virginicus*	*	√		
	Aristida vagans		√	√	
	Avena fatua	*	√		
	Briza maxima	*	√		
	Chloris gayana	*	√		√
	Cynodon dactylon		√	√	√
	Echinopogon caespitosus var *caespitosus*		√	√	
	Eleusine indica	*	√		
	Entolasia marginata		√	√	
	Eragrostis brownii		√		
	Microlaena stipoides var *stipoides*		√	√	
	Paspalum dilatatum	*	√		√
	Paspalum distichum	#			√
	Pennisetum clandestinum	*	√	√	√
	Poa annua	*	√		√
	Sporobolus indicus var *capensis*	*	√		
	Themeda australis		√	√	√

ATTACHMENT 5

Acoustic Assessment for Reconstruction and Widening of Cowpasture Road from North Liverpool Road to Elizabeth Drive

August 2000, Koikas Acoustics Pty Ltd.

COWPASTURE ROAD NOISE SURVEY RESULTS MAY/JUNE 2000

	SITE 1:	No. 17 Barila Place, Bonnyrigg Heights			
DATE	Leq, 24 hours	Leq, 8 hours	Leq, 15 hours	Leq, 9 hours	L10, 18 hours
Sat 27/5/2k	69.9	65.9	71.1	66.6	72.9
Sun 28/5/2k	69.1	65.5	70.4	65.6	72.2
Mon 29/5/2k	71.0	67.2	72.0	68.4	74.2
Tue 30/5/2k	71.0	66.6	72.2	67.6	74.4
Wed 31/5/2k	70.9	67.5	71.8	68.8	74.1
Thur 1/6/2k	70.3	67.5	71.1	68.6	73.7
Fri 2/6/2k	70.2	67.4	70.9	68.5	73.3
AVE. 7 days	**70.3**	**66.8**	**71.4**	**67.7**	**73.5**
AVE. 5 days	**70.7**	**67.2**	**71.6**	**68.4**	**73.9**

	SITE 2:	No. 54 Davina Crescent, Cecil Hills			
DATE	Leq, 24 hours	Leq, 8 hours	Leq, 15 hours	Leq, 9 hours	L10, 18 hours
Sat 27/5/2k	60.8	58.2	61.6	59.2	63.7
Sun 28/5/2k	58.8	55.6	59.7	56.1	61.9
Mon 29/5/2k	63.4	60.0	64.3	61.1	66.1
Tue 30/5/2k	63.7	59.8	64.6	61.1	67.0
Wed 31/5/2k	63.2	59.8	64.2	61.0	66.7
Thur 1/6/2k	63.1	61.0	63.6	62.2	66.3
Fri 2/6/2k	62.8	60.3	63.6	61.3	65.7
AVE. 7 days	**62.3**	**59.2**	**63.1**	**60.3**	**65.3**
AVE. 5 days	**63.2**	**60.2**	**64.1**	**61.3**	**66.4**

	SITE 3:	No 75 Helena Road, Cecil Hills			
DATE	Leq, 24 hours	Leq, 8 hours	Leq, 15 hours	Leq, 9 hours	L10, 18 hours
Sat 27/5/2k	60.1	58.0	61.0	58.9	62.5
Sun 28/5/2k	57.6	54.1	58.7	54.6	60.4
Mon 29/5/2k	61.2	57.6	62.2	58.9	64.5
Tue 30/5/2k	61.8	58.6	62.5	60.2	65.1
Wed 31/5/2k	61.3	57.3	62.3	58.8	64.9
Thur 1/6/2k	62.5	59.7	63.2	61.0	65.6
Fri 2/6/2k	62.7	59.0	63.8	59.8	65.7
AVE. 7 days	**61.0**	**57.8**	**62.0**	**58.9**	**64.1**
AVE. 5 days	**61.9**	**58.4**	**62.8**	**59.7**	**65.2**

	SITE 4:	No 31 Marley Crescent, Bonnyrigg Heights			
DATE	Leq, 24 hours	Leq, 8 hours	Leq, 15 hours	Leq, 9 hours	L10, 18 hours
Sat 27/5/2k	67.4	63.9	68.4	64.9	70.5
Sun 28/5/2k	66.1	62.7	67.3	62.9	69.2
Mon 29/5/2k	69.2	64.9	70.2	66.4	72.6
Tue 30/5/2k	69.4	64.6	70.6	66.2	72.9
Wed 31/5/2k	69.2	65.5	70.1	67.1	72.5
Thur 1/6/2k	69.1	66.0	69.9	67.3	72.4
Fri 2/6/2k	69.0	65.6	69.9	66.8	72.4
AVE. 7 days	**68.5**	**64.7**	**69.5**	**65.9**	**71.8**
AVE. 5 days	**69.2**	**65.3**	**70.1**	**66.8**	**72.6**

	SITE 5:	No 11 Jane Place, Cecil Hills			
DATE	Leq, 24 hours	Leq, 8 hours	Leq, 15 hours	Leq, 9 hours	L10, 18 hours
Sat 27/5/2k	54.5	50.4	55.7	51.6	57.2
Sun 28/5/2k	52.8	48.5	54.2	48.8	55.4
Mon 29/5/2k	56.8	52.1	58.0	53.8	59.5
Tue 30/5/2k	57.8	52.4	59.1	54.0	60.5
Wed 31/5/2k	57.4	53.0	58.5	54.6	60.3
Thur 1/6/2k	57.1	53.4	58.0	54.8	60.1
Fri 2/6/2k	58.0	53.9	59.2	55.0	60.4
AVE. 7 days	**56.3**	**52.0**	**57.5**	**53.2**	**59.1**
AVE. 5 days	**57.4**	**53.0**	**58.6**	**54.4**	**60.2**

	SITE 6:	John The Baptist Primary School				
DATE	Leq, 24 hours	Leq, 8 hours	Leq, 15 hours	Leq, 9 hours	L10, 18 hours	max Leq, 1 hour
Sat 27/5/2k	39.8	36.3	40.9	37.0	42.8	-
Sun 28/5/2k	38.4	34.4	39.7	34.4	41.4	-
Mon 29/5/2k	41.8	38.2	42.8	39.2	44.3	45.1
Tue 30/5/2k	41.9	37.2	43.1	38.3	45.0	45.3
Wed 31/5/2k	42.1	38.0	43.2	39.3	44.9	45.8
Thur 1/6/2k	41.8	38.4	42.8	39.4	44.7	45.2
Fri 2/6/2k	42.1	38.5	43.1	39.3	44.7	45.9
AVE. 7 days	**41.1**	**37.3**	**42.2**	**38.1**	**44.0**	
AVE. 5 days	**41.9**	**38.1**	**43.0**	**39.1**	**44.7**	**45.5**

	Local Daylight Saving Time	'Dry Bulb Temp(°C)'	'Dew Point Temp (°C)'	'Relative Humid. (%)'	'Wind Direction (° from true north)'	'Wind Speed (kts)'	'Maximum Wind Gust (kts)'	Pressure (hPa)'	Cummulative Rainfall from 9am (mm)'
26-May-00	00:00	12.5	12.2	98.0	0	0.0			1.4
26-May-00	00:30	12.9	12.6	98.1	250	4.1	4.1		1.4
26-May-00	01:00	12.8	12.5	98.1	240	2.9	5.1		1.4
26-May-00	01:30	11.9	11.6	98.0	320	2.9	4.1		1.4
26-May-00	02:00	11.5	11.2	98.0	0	0.0			1.4
26-May-00	02:30	11.3	11	98.0	280	1.0	4.1		1.4
26-May-00	03:00	11.9	11.6	98.0	280	4.1	7.0		1.6
26-May-00	03:30	12.5	12.2	98.0	260	7.0	8.9		1.6
26-May-00	04:00	12.1	11.6	96.8	240	6.0	7.0		1.6
26-May-00	04:30	11.8	11.3	96.7	230	8.0	9.9		1.6
26-May-00	05:00	12.4	10.8	90.0	220	8.0	11.1		1.6
26-May-00	05:30	12.1	10.2	88.1	240	6.0	7.0		1.6
26-May-00	06:00	9.8	9.4	97.3	260	4.1	6.0		1.6
26-May-00	06:30	8.3	7.9	97.3	350	1.9	4.1		1.6
26-May-00	07:00	8.8	8.4	97.3	190	2.9	5.1		1.6
26-May-00	07:30	9.4	9.1	98.0	0	0.0			1.6
26-May-00	08:00	10.9	10.5	97.4	0	0.0			1.6
26-May-00	08:30	12.7	12.3	97.4	0	0.0			1.6
26-May-00	09:00	13.8	12.9	94.3	20	2.9	4.1		1.6
26-May-00	09:30	15.2	12.2	82.3	0	0.0	2.9		0
26-May-00	10:00	16	10.3	68.9	300	6.0	8.0		0
26-May-00	10:30	16.9	10.8	67.3	300	7.0	9.9		0
26-May-00	11:00	17.3	10.2	63.0	270	6.0	8.9		0
26-May-00	11:30	18.3	10.2	59.2	310	6.0	9.9		0
26-May-00	12:00	19.3	8	47.9	310	8.0	12.0		0
26-May-00	12:30	19.3	7.4	46.0	310	8.0	13.0		0
26-May-00	13:00	19.6	6.4	42.1	300	8.9	14.0		0
26-May-00	13:30	19.1	5.6	41.1	310	9.9	15.0		0
26-May-00	14:00	18.5	7	47.0	320	7.0	9.9		0
26-May-00	14:30	20.2	6.6	41.2	330	8.0	11.1		0
26-May-00	15:00	19.8	5.5	39.1	300	9.9	15.0		0
26-May-00	15:30	18.6	6.5	45.2	300	7.0	8.0		0
26-May-00	16:00	18.7	5.9	43.1	320	7.0	9.9		0
26-May-00	16:30	17.8	6.1	46.2	310	6.0	7.0		0
26-May-00	17:00	16.3	5.3	48.1	330	6.0	8.0		0
26-May-00	17:30	15.4	5.1	50.2	330	6.0	7.0		0
26-May-00	18:00	15.3	5.3	51.2	340	6.0	8.0		0
26-May-00	18:30	14.8	6.1	55.9	330	6.0	8.0		0
26-May-00	19:00	14.1	6.7	61.0	330	6.0	7.0		0
26-May-00	19:30	13.6	7	64.3	340	6.0	7.0		0
26-May-00	20:00	13	6.8	66.0	320	7.0	8.0		0
26-May-00	20:30	12.4	7.1	70.1	330	5.1	6.0		0
26-May-00	21:00	12.1	7.2	71.9	340	4.1	6.0		0
26-May-00	21:30	12.3	8.2	76.0	340	5.1	6.0		0
26-May-00	22:00	11.5	8.2	80.1	340	5.1	6.0		0
26-May-00	22:30	11.4	8.8	84.0	360	6.0	8.0		0
26-May-00	23:00	11.9	8.8	81.3	350	4.1	6.0		0
26-May-00	23:30	12.4	8.9	79.2	340	5.1	7.0		0
27-May-00	00:00	12.1	9.3	83.0	360	5.1	7.0		0
27-May-00	00:30	12.1	9.3	83.0	350	8.0	9.9		0
27-May-00	01:00	12	8.9	81.3	340	4.1	7.0		0
27-May-00	01:30	11.8	8.8	81.8	350	5.1	7.0		0
27-May-00	02:00	11.2	8.9	85.7	350	5.1	7.0		0
27-May-00	02:30	10.5	8.6	88.0	330	5.1	7.0		0
27-May-00	03:00	10.9	8.3	84.0	340	4.1	7.0		0
27-May-00	03:30	10.8	8.2	84.0	350	6.0	8.9		0
27-May-00	04:00	10.5	8.1	85.1	350	5.1	7.0		0
27-May-00	04:30	10.3	7.9	85.0	350	5.1	8.0		0
27-May-00	05:00	10.1	7.7	85.0	340	4.1	7.0		0
27-May-00	05:30	10.2	7.8	85.0	360	5.1	7.0		0
27-May-00	06:00	9.8	7.6	86.2	350	5.1	7.0		0
27-May-00	06:30	10.1	7.6	84.4	360	8.0	11.1		0
27-May-00	07:00	10.6	7.3	80.0	360	8.9	11.1		0
27-May-00	07:30	11.4	7.3	75.9	360	8.0	11.1		0
27-May-00	08:00	12.1	7.7	74.4	360	6.0	9.9		0
27-May-00	08:30	13.6	7.8	67.9	360	12.0	15.9		0
27-May-00	09:00	14.5	8.1	65.4	350	11.1	15.9		0
27-May-00	09:30	15.6	8.4	62.2	350	11.1	16.9		0
27-May-00	10:00	16.8	8.5	58.0	340	12.0	19.0		0
27-May-00	10:28	17.5	4.5	42.1	340	15.0	25.1		0
27-May-00	11:00	18.2	5.5	43.2	330	13.0	21.0		0
27-May-00	11:25	16.4	5.4	48.1	290	16.9	27.0		0
27-May-00	11:35	16.1	4.8	47.0	290	20.0	30.9		0
27-May-00	12:00	15.9	5	48.3	300	19.0	29.9		0
27-May-00	12:20	16.3	3.4	42.1	300	16.9	28.9		0
27-May-00	13:00	16.7	3.1	40.1	290	14.0	21.0		0
27-May-00	13:13	17.1	2.3	37.0	300	15.0	27.0		0
27-May-00	13:30	16.3	1.6	37.0	300	16.9	23.9		0
27-May-00	13:43	16	2.5	40.2	300	18.1	28.9		0
27-May-00	13:43	15.1	3.3	45.1	270	22.0	35.0		0
27-May-00	13:55	13.3	3.9	52.9	270	16.9	27.0		0
27-May-00	14:05	13.2	3.8	52.8	280	16.9	28.0		0
27-May-00	14:27	13.7	2.3	46.0	290	16.9	28.9		0
27-May-00	15:00	13.7	2.6	47.0	300	18.1	27.0		0
27-May-00	15:17	13.2	1.6	45.2	290	15.9	30.9		0

27-May-00	15:28	13.3	2	46.2	300	18.1	28.0	0
27-May-00	16:00	12.8	2.4	49.1	310	15.0	20.0	0
27-May-00	16:30	11.9	2.4	52.1	320	9.9	15.9	0
27-May-00	17:00	11	2.3	54.9	320	8.9	14.0	0
27-May-00	17:30	11.4	1.7	51.2	310	13.0	21.0	0
27-May-00	18:00	10.7	1	51.0	320	11.1	16.9	0
27-May-00	18:30	10.1	1	53.1	310	8.0	11.1	0
27-May-00	19:00	10	0.1	50.1	290	8.0	12.0	0
27-May-00	19:30	9.7	-0.2	50.0	290	9.9	13.0	0
27-May-00	20:00	8.7	-0.3	53.1	300	5.1	6.0	0
27-May-00	20:30	7.6	0.1	58.9	330	4.1	7.0	0
27-May-00	21:00	9.7	0.1	51.1	300	13.0	20.0	0
27-May-00	21:30	9.5	-0.1	51.1	290	11.1	16.9	0
27-May-00	22:00	8.7	-0.3	53.1	310	8.9	12.0	0
27-May-00	22:30	8.2	-0.3	55.0	310	8.9	12.0	0
27-May-00	23:00	7.9	-0.3	56.1	320	8.0	9.9	0
27-May-00	23:30	7.7	-0.5	56.0	320	8.0	9.9	0
28-May-00	00:00	7.5	-0.5	56.8	300	6.0	7.0	0
28-May-00	00:30	7.7	0	58.1	290	8.0	9.9	0
28-May-00	01:00	8.3	-0.4	54.2	290	13.0	19.0	0
28-May-00	01:30	8.3	-0.9	52.2	300	14.0	22.0	0
28-May-00	02:00	7.7	-1.2	53.2	300	13.0	16.9	0
28-May-00	02:30	7.1	-1.3	55.1	300	8.9	14.0	0
28-May-00	03:00	6.6	-1	58.3	320	8.0	9.9	0
28-May-00	03:30	7.1	-1	56.3	310	9.9	13.0	0
28-May-00	04:00	7	-1.2	55.8	310	11.1	15.9	0
28-May-00	04:30	7.4	-1.2	54.3	310	12.0	16.9	0
28-May-00	05:00	7.6	-1.3	53.2	320	11.1	15.9	0
28-May-00	05:30	7	-1.1	56.3	290	5.1	7.0	0
28-May-00	06:00	6.1	-0.8	61.2	320	7.0	9.9	0
28-May-00	06:30	6.6	-1	58.3	320	8.9	12.0	0
28-May-00	07:00	5.9	-1	61.1	310	7.0	8.9	0
28-May-00	07:30	7.3	-1.3	54.3	310	9.9	14.0	0
28-May-00	08:00	8.4	-1.1	51.1	300	11.1	14.0	0
28-May-00	08:30	9.2	-1.2	48.1	310	13.0	19.0	0
28-May-00	09:00	9.9	-0.5	48.3	310	13.0	19.0	0
28-May-00	09:30	10.6	-1.4	43.1	310	11.1	20.0	0
28-May-00	10:00	10.9	-1.8	41.0	300	15.0	20.0	0
28-May-00	10:30	11.6	-1.5	40.1	310	15.9	22.0	0
28-May-00	10:46	11.9	-1.9	38.1	320	15.0	27.0	0
28-May-00	10:58	11.8	-2.4	37.0	300	19.0	29.9	0
28-May-00	11:30	12.2	-2	37.1	310	16.9	22.9	0
28-May-00	11:43	12.3	-2.3	36.1	310	15.9	27.0	0
28-May-00	12:00	12.5	-1.4	38.0	300	15.9	22.0	0
28-May-00	12:30	12.5	-1.7	37.2	300	15.0	21.0	0
28-May-00	12:32	12.6	-2	36.1	300	15.0	25.1	0
28-May-00	13:00	13	-1.3	37.1	300	16.9	23.9	0
28-May-00	13:22	12.8	-2.3	34.9	300	19.0	28.9	0
28-May-00	13:45	12.5	-2.9	34.0	310	16.9	28.0	0
28-May-00	14:00	11.8	-1.7	39.0	310	15.9	22.0	0
28-May-00	14:04	11.9	-2.3	37.0	310	15.9	27.0	0
28-May-00	14:30	12.3	-0.9	40.0	310	19.0	26.0	0
28-May-00	15:00	11.3	-1.4	41.2	300	14.0	22.0	0
28-May-00	15:04	11.4	-1.3	41.2	300	15.0	27.0	0
28-May-00	15:30	12	-0.5	42.0	300	20.0	28.9	0
28-May-00	15:42	11.4	-0.4	44.0	290	15.0	25.1	0
28-May-00	16:00	11.2	0.3	46.9	300	11.1	16.9	0
28-May-00	16:30	9.7	0.4	52.2	310	13.0	22.9	0
28-May-00	17:00	9	1	57.2	310	15.9	25.1	0
28-May-00	17:27	8.2	1.9	64.4	300	16.9	27.0	0
28-May-00	18:00	7.8	2.3	68.1	300	15.0	20.0	0
28-May-00	18:30	8	1.9	65.3	300	15.9	27.0	0
28-May-00	19:00	7.1	2	70.0	310	12.0	18.1	0
28-May-00	19:30	6.2	2.1	75.0	330	8.9	12.0	0
28-May-00	20:00	5.8	1.9	76.0	340	5.1	9.9	0
28-May-00	20:30	5.1	2.1	80.9	10	4.1	6.0	0
28-May-00	21:00	5.3	1.8	78.1	350	5.1	8.0	0
28-May-00	21:30	3.9	0.6	79.0	360	4.1	6.0	0
28-May-00	22:00	4.9	1.1	76.4	330	8.0	9.9	0
28-May-00	22:30	5.2	0.2	70.1	290	4.1	5.1	0
28-May-00	23:00	7.3	-0.4	58.0	260	8.0	12.0	0
28-May-00	23:30	6.6	-0.3	61.3	290	8.0	9.9	0
29-May-00	00:00	6.8	-1.1	57.0	250	5.1	7.0	0
29-May-00	00:30	5.4	-0.8	64.2	280	2.9	4.1	0
29-May-00	01:00	4.7	-0.5	68.9	300	4.1	4.1	0
29-May-00	01:30	6.2	-1	59.9	270	6.0	7.0	0
29-May-00	02:00	6.3	-1.1	59.0	270	6.0	9.9	0
29-May-00	02:30	5.6	-0.8	63.3	290	7.0	11.1	0
29-May-00	03:00	4.6	-0.8	67.9	10	2.9	5.1	0
29-May-00	03:30	5.3	-0.5	66.1	270	5.1	13.0	0
29-May-00	04:00	6.3	-1.1	59.0	260	8.0	11.1	0
29-May-00	04:30	6.7	-1.4	56.2	270	8.0	12.0	0
29-May-00	05:00	5.8	-1.3	60.2	270	5.1	7.0	0
29-May-00	05:30	4	-1.5	67.3	330	5.1	7.0	0
29-May-00	06:00	4.1	-1.4	67.3	350	5.1	8.0	0
29-May-00	06:30	3.8	-1.5	68.2	300	5.1	7.0	0
29-May-00	07:00	5.2	-1.6	61.4	280	6.0	7.0	0

29-May-00	07:30	5.2	-1.5	61.9	290	5.1	6.0	0
29-May-00	08:00	7.1	-0.3	59.2	300	5.1	7.0	0
29-May-00	08:30	8.8	-0.7	51.2	300	7.0	11.1	0
29-May-00	09:00	9.5	-0.9	48.2	310	11.1	15.9	0
29-May-00	09:30	10.4	-0.1	48.1	310	8.0	12.0	0
29-May-00	10:00	11.1	-0.6	44.2	280	9.9	15.0	0
29-May-00	10:30	11.7	-1.1	41.0	260	11.1	19.0	0
29-May-00	11:00	12.1	-1.4	39.0	260	8.9	15.0	0
29-May-00	11:30	12.7	-0.9	38.9	270	8.0	13.0	0
29-May-00	12:00	12.6	-1	38.9	290	12.0	19.0	0
29-May-00	12:30	13.2	-0.8	38.0	300	14.0	21.0	0
29-May-00	13:00	13	-0.9	38.2	280	15.0	21.0	0
29-May-00	13:30	13.3	-0.3	39.1	280	12.0	19.0	0
29-May-00	14:00	13.1	-1.6	36.0	250	12.0	20.0	0
29-May-00	14:30	13.2	-1.1	37.1	240	9.9	15.9	0
29-May-00	15:00	13.4	-0.2	39.2	260	8.9	15.9	0
29-May-00	15:30	13	-0.3	39.9	250	13.0	18.1	0
29-May-00	16:00	12.1	-0.1	43.0	250	13.0	20.0	0
29-May-00	16:30	11.5	0.6	47.0	260	7.0	9.9	0
29-May-00	17:00	9.8	0.5	52.3	290	6.0	11.1	0
29-May-00	17:30	9.1	0.8	56.0	300	9.9	14.0	0
29-May-00	18:00	8.5	0.7	57.9	310	8.9	12.0	0
29-May-00	18:30	8.5	0.8	58.3	310	8.9	11.1	0
29-May-00	19:00	7.6	1.1	63.4	340	8.0	11.1	0
29-May-00	19:30	8	1	61.2	340	8.0	12.0	0
29-May-00	20:00	8.2	0.9	60.0	340	8.0	9.9	0
29-May-00	20:30	7.2	1.1	65.1	360	5.1	7.0	0
29-May-00	21:00	7.3	1.4	66.1	340	6.0	8.9	0
29-May-00	21:30	7.1	1.4	67.0	340	7.0	8.0	0
29-May-00	22:00	8.4	1.6	62.2	330	8.9	12.0	0
29-May-00	22:30	6.7	1.6	69.9	350	8.0	9.9	0
29-May-00	23:00	7.3	1.4	66.1	330	8.9	12.0	0
29-May-00	23:30	8.4	1.6	62.2	330	8.9	13.0	0
30-May-00	00:00	9.3	2.2	61.1	340	9.9	13.0	0
30-May-00	00:30	8.5	2.1	64.0	350	8.0	9.9	0
30-May-00	01:00	8.1	2	65.3	350	8.9	13.0	0
30-May-00	01:30	8	1.8	64.8	350	6.0	8.9	0
30-May-00	02:00	7.8	2.3	68.1	330	7.0	11.1	0
30-May-00	02:30	8.5	2.1	64.0	320	9.9	13.0	0
30-May-00	03:00	8.5	2.1	64.0	330	8.0	9.9	0
30-May-00	03:30	8.6	2.4	65.0	330	8.9	11.1	0
30-May-00	04:00	8.2	2.7	68.2	330	8.0	11.1	0
30-May-00	04:30	7.6	4.4	80.1	240	7.0	9.9	0
30-May-00	05:00	6.3	4.3	87.0	320	4.1	7.0	0
30-May-00	05:30	6.4	3.9	84.0	330	4.1	6.0	0
30-May-00	06:00	5.8	4.1	88.8	310	4.1	5.1	0
30-May-00	06:30	4.7	3.5	91.9	350	1.9	4.1	0
30-May-00	07:00	4.6	3.7	93.9	180	5.1	7.0	0
30-May-00	07:30	5	3.7	91.3	210	2.9	5.1	0
30-May-00	08:00	8.3	2.4	66.3	270	5.1	7.0	0
30-May-00	08:30	9.6	2.2	59.9	270	5.1	8.9	0
30-May-00	09:00	10	1.7	56.2	280	7.0	12.0	0
30-May-00	09:30	10.3	1.7	55.1	260	8.0	11.1	0
30-May-00	10:00	10.8	0.3	48.2	280	9.9	16.9	0
30-May-00	10:30	11.5	0.3	46.0	260	12.0	16.9	0
30-May-00	11:30	12.2	0.3	43.9	240	13.0	18.1	0
30-May-00	12:00	11.4	0.2	46.0	240	11.1	16.9	0
30-May-00	12:30	11.2	0.6	48.0	240	13.0	21.0	0
30-May-00	13:00	11.5	0.6	47.0	240	13.0	19.0	0
30-May-00	13:30	12	0.1	43.9	230	13.0	18.1	0
30-May-00	14:00	11.5	-0.6	43.1	260	12.0	18.1	0
30-May-00	14:30	10.9	-0.2	46.2	240	12.0	16.9	0
30-May-00	15:00	11.6	0.7	47.0	240	12.0	16.9	0
30-May-00	15:30	11.9	-0.3	42.9	240	12.0	18.1	0
30-May-00	16:00	11.2	0.3	46.9	250	8.0	13.0	0
30-May-00	16:30	10.7	-1.3	43.2	250	12.0	19.0	0
30-May-00	17:00	9.5	-0.6	49.2	260	9.9	15.9	0
30-May-00	17:30	8.6	-0.9	51.2	270	9.9	16.9	0
30-May-00	18:00	7.8	-0.9	54.0	270	7.0	9.9	0
30-May-00	18:30	6.5	-0.9	59.1	300	6.0	8.9	0
30-May-00	19:00	6.5	-0.7	60.0	290	5.1	8.0	0
30-May-00	19:30	6	-0.9	61.2	310	5.1	8.0	0
30-May-00	20:00	5.2	-0.8	65.1	310	4.1	8.0	0
30-May-00	20:30	5.9	-0.8	62.0	270	4.1	6.0	0
30-May-00	21:00	6.5	0	63.1	250	7.0	9.9	0
30-May-00	21:30	7.5	0.5	61.1	270	7.0	9.9	0
30-May-00	22:00	7.8	1	62.1	260	7.0	12.0	0
30-May-00	22:30	8.8	1.5	60.1	250	8.0	11.1	0
30-May-00	23:00	8.8	2	62.3	250	7.0	14.0	0
30-May-00	23:30	8.8	2.2	63.2	240	8.0	15.0	0
31-May-00	00:00	9.1	2.2	61.9	250	7.0	9.9	0
31-May-00	00:30	9.2	2.1	61.1	250	7.0	9.9	0
31-May-00	01:00	9.2	2.1	61.1	250	7.0	9.9	0
31-May-00	01:30	9.1	2	61.1	240	7.0	9.9	0
31-May-00	02:00	8.9	1.8	61.0	240	8.0	11.1	0
31-May-00	02:30	8.6	1.8	62.3	250	8.0	11.1	0
31-May-00	03:00	8.7	1.6	61.0	250	11.1	15.0	0

31-May-00	03:30	8.3	1.7	63.1	250	9.9	14.0	0
31-May-00	04:00	8	1.6	63.9	250	8.0	12.0	0
31-May-00	04:30	8.1	1.5	63.0	250	9.9	13.0	0
31-May-00	05:00	7.8	1.7	65.3	260	8.0	11.1	0
31-May-00	05:30	7.6	1.5	65.2	260	8.0	11.1	0
31-May-00	06:00	7.6	1.5	65.2	250	8.0	11.1	0
31-May-00	06:30	7.3	1.4	66.1	260	5.1	7.0	0
31-May-00	07:00	7.2	1.3	66.1	260	7.0	8.9	0
31-May-00	07:30	7.4	1.5	66.1	240	8.0	11.1	0
31-May-00	08:00	8.6	1.8	62.3	270	5.1	8.0	0
31-May-00	08:30	9.5	1.2	56.1	250	8.0	12.0	0
31-May-00	09:00	10.5	1.1	52.1	250	9.9	15.0	0
31-May-00	09:30	11.6	1.3	49.1	250	9.9	15.9	0
31-May-00	10:00	12.5	0.6	44.0	230	8.9	15.0	0
31-May-00	10:30	13	0.1	41.1	230	12.0	19.0	0
31-May-00	11:00	13.7	0.4	40.1	230	11.1	18.1	0
31-May-00	11:30	14	-0.8	36.0	230	15.0	22.0	0
31-May-00	12:00	14.1	-1.1	35.0	220	16.9	23.9	0
31-May-00	12:30	14.9	0	36.0	220	11.1	15.9	0
31-May-00	13:00	14.6	-0.3	36.0	220	13.0	21.0	0
31-May-00	13:30	15	0.5	37.1	240	12.0	20.0	0
31-May-00	14:00	14.7	0.2	37.1	250	14.0	20.0	0
31-May-00	14:30	14.9	0.8	38.2	240	9.9	15.0	0
31-May-00	15:00	14.8	1.4	40.2	260	9.9	16.9	0
31-May-00	15:30	14.5	1.1	40.1	250	9.9	15.0	0
31-May-00	16:00	13.8	1.8	44.1	260	9.9	15.9	0
31-May-00	16:30	12.7	1.4	46.0	260	11.1	15.9	0
31-May-00	17:00	11.4	1.7	51.2	250	8.9	14.0	0
31-May-00	17:30	10.4	1.8	55.2	230	7.0	11.1	0
31-May-00	18:00	9.4	1.8	59.0	280	5.1	7.0	0
31-May-00	18:30	9.1	2	61.1	270	6.0	9.9	0
31-May-00	19:00	9.2	2.1	61.1	270	5.1	8.0	0
31-May-00	19:30	8.4	2.2	64.9	280	5.1	7.0	0
31-May-00	20:00	8.2	2.3	66.3	290	5.1	7.0	0
31-May-00	20:30	8.1	2.4	67.2	270	5.1	7.0	0
31-May-00	21:00	7.6	2.3	69.1	270	4.1	5.1	0
31-May-00	21:30	7.4	2.7	72.0	270	5.1	7.0	0
31-May-00	22:00	8.5	2.7	66.8	270	5.1	7.0	0
31-May-00	22:30	8.4	2.7	67.3	270	6.0	8.0	0
31-May-00	23:00	7.6	2.7	71.1	240	2.9	5.1	0
31-May-00	23:30	5.7	1.8	76.0	340	4.1	5.1	0
01-Jun-00	00:00	5.6	2.6	81.0	0	0.0		0
01-Jun-00	00:30	5.2	2.4	82.1	350	4.1	5.1	0
01-Jun-00	01:00	7.6	3.1	73.1	290	7.0	8.0	0
01-Jun-00	01:30	8.1	3.2	71.2	290	6.0	7.0	0
01-Jun-00	02:00	8.2	2.9	69.2	280	5.1	6.0	0
01-Jun-00	02:30	6.2	2.3	76.0	290	4.1	5.1	0
01-Jun-00	03:00	6.3	2.6	77.1	300	6.0	8.0	0
01-Jun-00	03:30	6.2	2.5	77.1	300	5.1	6.0	0
01-Jun-00	04:00	5.7	2.7	81.0	300	4.1	5.1	0
01-Jun-00	04:30	6.9	3.2	77.2	280	5.1	6.0	0
01-Jun-00	05:00	5.5	2.7	82.1	270	4.1	5.1	0
01-Jun-00	05:30	7.5	3.6	76.3	250	7.0	8.0	0
01-Jun-00	06:00	7.8	3.3	73.1	240	6.0	8.0	0
01-Jun-00	06:30	3.4	0.8	83.0	320	2.9	4.1	0
01-Jun-00	07:00	5.1	3.4	88.7	260	4.1	6.0	0
01-Jun-00	07:30	4	1.7	84.9	340	2.9	5.1	0
01-Jun-00	08:00	6.4	4.6	88.2	250	2.9	4.1	0
01-Jun-00	08:30	7.3	4.3	81.2	360	4.1	4.1	0
01-Jun-00	09:00	10.2	5.2	71.1	340	4.1	5.1	0
01-Jun-00	09:30	12.1	4.4	59.2	250	4.1	6.0	0
01-Jun-00	10:00	13.1	3.8	53.2	240	7.0	9.9	0
01-Jun-00	10:30	13.8	4.7	54.1	260	6.0	9.9	0
01-Jun-00	11:00	15	3.5	46.0	220	8.0	15.0	0
01-Jun-00	11:30	15.3	2.8	43.0	250	8.0	11.1	0
01-Jun-00	12:00	15.5	2.4	41.2	230	8.9	14.0	0
01-Jun-00	12:30	16	3.1	42.0	230	9.9	15.9	0
01-Jun-00	13:00	16	2.4	39.9	220	8.0	12.0	0
01-Jun-00	13:30	16.2	2.6	40.0	210	9.9	13.0	0
01-Jun-00	14:00	16.6	2.3	38.2	220	6.0	9.9	0
01-Jun-00	14:30	16.9	2.5	38.0	290	5.1	8.9	0
01-Jun-00	15:00	16.9	3.2	39.9	300	6.0	11.1	0
01-Jun-00	15:30	16.8	2.4	38.0	240	6.0	11.1	0
01-Jun-00	16:00	16.4	3.1	40.9	230	6.0	9.9	0
01-Jun-00	16:30	14.8	3.3	46.0	210	6.0	8.9	0
01-Jun-00	17:00	13.2	1.9	46.2	210	8.9	11.1	0
01-Jun-00	17:30	12.6	1.9	48.0	210	9.9	13.0	0
01-Jun-00	18:00	11.9	2.1	51.0	210	8.9	14.0	0
01-Jun-00	18:30	11.7	2.2	52.1	210	9.9	15.0	0
01-Jun-00	19:00	11.4	2.5	54.3	230	7.0	9.9	0
01-Jun-00	19:30	11.3	2.3	53.8	220	8.9	13.0	0
01-Jun-00	20:00	10.6	2.4	56.8	250	7.0	9.9	0
01-Jun-00	20:30	8.9	2.3	63.2	280	4.1	6.0	0
01-Jun-00	21:00	9.6	2.3	60.3	260	6.0	8.0	0
01-Jun-00	21:30	8.3	1.9	64.0	270	2.9	5.1	0
01-Jun-00	22:00	7.8	2.3	68.1	290	4.1	6.0	0
01-Jun-00	22:30	8.8	2.8	66.0	230	6.0	8.0	0

01-Jun-00	23:00	9.2	2.5	62.8	230	7.0	9.9	0
01-Jun-00	23:30	9.2	2.6	63.3	230	8.0	9.9	0
02-Jun-00	00:00	8.9	2.5	64.1	270	5.1	8.9	0
02-Jun-00	00:30	8.8	2.6	65.0	250	4.1	6.0	0
02-Jun-00	01:00	8.3	2.8	68.2	240	5.1	6.0	0
02-Jun-00	01:30	8.6	3	67.8	220	5.1	7.0	0
02-Jun-00	02:00	8.9	3.5	68.8	230	7.0	9.9	0
02-Jun-00	02:30	9	3.6	68.9	230	8.0	12.0	0
02-Jun-00	03:00	9.4	3.8	68.0	220	8.0	12.0	0
02-Jun-00	03:30	9.8	3.6	65.3	240	8.0	12.0	0
02-Jun-00	04:00	9.5	3.3	65.2	240	8.9	15.9	0
02-Jun-00	04:30	9.5	2.8	62.9	240	6.0	8.9	0
02-Jun-00	05:00	9	2.8	65.1	240	6.0	8.0	0
02-Jun-00	05:30	8.7	2.7	65.9	240	7.0	9.9	0
02-Jun-00	06:00	9	2.6	64.2	230	8.0	12.0	0
02-Jun-00	06:30	8.9	2.5	64.1	230	8.9	12.0	0
02-Jun-00	07:00	8.8	2.4	64.1	230	8.9	13.0	0
02-Jun-00	07:30	9.1	2.5	63.3	230	9.9	13.0	0
02-Jun-00	08:00	9.6	2.5	61.2	230	11.1	15.9	0
02-Jun-00	08:30	11.2	2.5	55.0	230	13.0	22.0	0
02-Jun-00	09:00	11.8	2.6	53.2	220	13.0	19.0	0
02-Jun-00	09:30	12.1	2.6	52.2	210	15.0	22.0	0
02-Jun-00	10:00	12.8	3	51.3	220	13.0	21.0	0
02-Jun-00	10:02	12.9	2.5	49.1	220	15.0	27.0	0
02-Jun-00	10:30	13.4	3	49.3	220	14.0	20.0	0
02-Jun-00	10:57	14	2.6	46.1	220	15.0	26.0	0
02-Jun-00	11:10	14	2	44.1	210	16.9	27.0	0
02-Jun-00	11:22	14.1	2.4	45.1	200	15.9	28.0	0
02-Jun-00	11:37	14.4	2.6	44.9	210	19.0	28.9	0
02-Jun-00	11:58	15.3	2.5	42.1	210	16.9	27.0	0
02-Jun-00	12:16	14.6	2.5	44.0	200	15.9	26.0	0
02-Jun-00	12:30	14.6	2.8	45.0	210	16.9	23.9	0
02-Jun-00	13:00	15	3.8	47.0	200	13.0	21.0	0
02-Jun-00	13:04	14.5	3.1	46.2	190	15.0	27.0	0
02-Jun-00	13:30	14.6	4.1	49.3	200	13.0	20.0	0
02-Jun-00	14:00	14.4	4.2	50.3	190	12.0	18.1	0
02-Jun-00	14:30	13.9	3.7	50.1	200	19.0	26.0	0
02-Jun-00	15:00	14.2	4.2	50.9	200	14.0	22.0	0
02-Jun-00	15:30	14	4.1	51.2	200	14.0	21.0	0
02-Jun-00	16:00	13.4	4.3	54.0	200	9.9	14.0	0
02-Jun-00	16:30	12.8	4.3	56.2	210	12.0	19.0	0
02-Jun-00	17:00	12	4.3	59.2	200	9.9	15.9	0
02-Jun-00	17:30	11.7	4.5	61.3	200	8.0	13.0	0
02-Jun-00	18:00	10.5	4	64.1	190	6.0	8.9	0
02-Jun-00	18:30	10.6	4.3	65.0	200	6.0	8.9	0
02-Jun-00	19:00	10.7	4.6	65.9	200	6.0	8.9	0
02-Jun-00	19:30	10.4	4.1	64.9	200	5.1	6.0	0
02-Jun-00	20:00	9.1	3.5	67.9	220	5.1	6.0	0
02-Jun-00	20:30	8.7	3.8	71.3	240	4.1	5.1	0
02-Jun-00	21:00	8.4	4.1	74.3	240	6.0	7.0	0
02-Jun-00	21:30	8.4	3.7	72.2	230	7.0	8.0	0
02-Jun-00	22:00	8.9	3.3	67.9	230	7.0	8.9	0
02-Jun-00	22:30	8.6	3.3	69.3	240	7.0	8.0	0
02-Jun-00	23:00	8.6	2.9	67.3	230	6.0	8.0	0
02-Jun-00	23:30	8.5	2.8	67.3	230	5.1	6.0	0
03-Jun-00	00:00	8	2.5	68.2	230	4.1	5.1	0
03-Jun-00	00:30	7.4	2.5	71.0	230	5.1	6.0	0
03-Jun-00	01:00	7.3	2.4	71.0	230	6.0	7.0	0
03-Jun-00	01:30	6.9	2.4	73.0	230	7.0	8.0	0
03-Jun-00	02:00	7	2.3	72.0	230	6.0	8.0	0
03-Jun-00	02:30	6.8	1.7	69.9	220	7.0	8.0	0
03-Jun-00	03:00	7.2	1.3	66.1	210	7.0	8.0	0
03-Jun-00	03:30	6.9	1.4	67.9	230	6.0	8.0	0
03-Jun-00	04:00	6.5	1.2	68.8	230	6.0	6.0	0
03-Jun-00	04:30	5.4	1.4	75.4	240	7.0	8.9	0
03-Jun-00	05:00	5.2	1.5	77.0	240	8.0	8.9	0
03-Jun-00	05:30	4.6	1.5	80.3	250	8.0	8.9	0
03-Jun-00	06:00	4.9	2.3	83.2	240	7.0	8.0	0
03-Jun-00	06:30	5.6	1.9	77.0	230	7.0	8.9	0
03-Jun-00	07:00	6	1.7	73.9	230	8.9	11.1	0
03-Jun-00	07:30	5.8	1.8	75.4	240	9.9	12.0	0
03-Jun-00	08:00	6.1	2.2	76.0	240	8.0	9.9	0
03-Jun-00	08:30	7.3	3	74.1	250	7.0	9.9	0
03-Jun-00	09:00	8.5	2.8	67.3	250	8.0	12.0	0
03-Jun-00	09:30	10	3.3	63.0	250	6.0	8.9	0
03-Jun-00	10:00	11.1	4.1	62.0	240	6.0	8.9	0
03-Jun-00	10:30	12.5	4.5	58.1	270	5.1	7.0	0
03-Jun-00	11:00	13.6	4.8	55.2	250	5.1	8.0	0
03-Jun-00	11:30	14.9	5.2	52.2	300	5.1	7.0	0
03-Jun-00	12:00	15.3	5.3	51.2	290	2.9	5.1	0
03-Jun-00	12:30	16.1	5.7	50.1	310	4.1	7.0	0
03-Jun-00	13:00	16	4.7	47.0	310	5.1	8.9	0
03-Jun-00	13:30	16.5	4.5	44.9	330	1.9	7.0	0
03-Jun-00	14:00	17.1	4.1	42.0	240	2.9	6.0	0
03-Jun-00	14:30	16.3	3.4	42.1	360	5.1	7.0	0
03-Jun-00	15:00	17	4	42.0	230	2.9	5.1	0
03-Jun-00	15:30	16.8	3.5	41.0	320	2.9	6.0	0

03-Jun-00	16:00	15.8	4.8	47.9	20	5.1	6.0	0
03-Jun-00	16:30	14.6	4.3	50.0	10	4.1	5.1	0
03-Jun-00	17:00	12	5	62.2	10	1.0	2.9	0
03-Jun-00	17:30	11.1	5.2	66.9	0	0.0		0
03-Jun-00	18:00	10.3	4.9	69.1	0	0.0		0
03-Jun-00	18:30	10.3	4.7	68.2	0	0.0		0
03-Jun-00	19:00	10.2	4.6	68.2	0	0.0		0
03-Jun-00	19:30	9.6	5	73.0	150	5.1	7.0	0
03-Jun-00	20:00	9.4	6.5	82.1	140	6.0	6.0	0
03-Jun-00	20:30	9.6	7.2	85.0	160	4.1	5.1	0
03-Jun-00	21:00	9.4	7.5	87.9	170	2.9	4.1	0
03-Jun-00	21:30	7.9	6.6	91.5	220	4.1	5.1	0
03-Jun-00	22:00	8.3	7.3	93.4	230	7.0	8.0	0
03-Jun-00	22:30	7.1	5.6	90.2	220	7.0	8.9	0
03-Jun-00	23:00	6.8	4.3	84.1	190	7.0	8.9	0
03-Jun-00	23:30	6.3	3.3	81.1	200	6.0	8.9	0
04-Jun-00	00:00	6.5	3.1	78.8	220	8.9	12.0	0

CERTIFICATE OF CALIBRATION

CERTIFICATE NO.: SLM01010

Equipment Description: Integrating Sound level Meter

Manufacturer: Norsonic

Model No: 116 **Serial No:** 20244

Microphone Type: 1220 **Serial No:** 15632

Filter Type: - **Serial No:** -

Comments: All tests passed for type 1.

Ambient Pressure: 1008

Temperature: 21 **Relative Humidity:** 57%

Date of Calibration: 23.11.98 **Calibration Due Date:** 23.11.2000

CHECKED BY: TJ **AUTHORISED SIGNATORY:** .....
Jack Kiely

The equipment listed above has been calibrated in this laboratory. The equipment performed satisfactorily in all the tests conducted.

This certificate is effective for 24 months from the date of calibration.

NATA
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CERTIFICATE OF CALIBRATION

CERTIFICATE NO.: SLM01011

Equipment Description:	Integrating Sound Level Meter		
Manufacturer:	Norsonic		
Model No:	116	**Serial No:**	20324
Microphone Type:	40AE	**Serial No:**	5002
Filter Type:	-	**Serial No:**	-
Comments:	All tests passed for type 1.		

Ambient Pressure:	1008		
Temperature:	21	**Relative Humidity:**	57%
Date of Calibration:	23.11.98	**Calibration Due Date:**	23.11.2000

CHECKED BY: TJ **AUTHORISED SIGNATORY:** ..... Jack Kiett

The equipment listed above has been calibrated in this laboratory. The equipment performed satisfactorily in all the tests conducted.

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CERTIFICATE OF CALIBRATION

CERTIFICATE NO: 2595

EQUIPMENT TESTED: Sound Level Calibrator

Manufacturer: Rion

Type No: NC-73 **Serial No:** 10702593

Owner: Koikas Acoustics
60 Glenfarne St
Bexley NSW 2207

Tests Performed: Output sound pressure level corrected to 1013 hecto Pascals was found to be:
94.01 dB re 20 µPA at 974.5 Hz
Uncertainty: +/- 0.1 dB

CONDITION OF TEST:

Ambient Pressure: 1020 mbar **Relative Humidity:** 64 %

Temperature: 21 °C

Date of Calibration: 12/7/99 **Calibration Due Date:** 12/7/2000

Test Method: IEC 942 - 1988 Clauses 3.1.2, 3.2.2 and ACU-VIB No.:3

CHECKED BY: JK **AUTHORISED SIGNATORY:** ..... Jack Kielt

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Instruments used in these tests are traceable to Australian Physical Standards held at C.S.I.R.O. N.M.L (National Measurement Laboratory) Sydney, Australia.

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CERTIFICATE OF CALIBRATION

CERTIFICATE NO.: SLM01009

Equipment Description: Precision Integrating Sound Level Meter

Manufacturer: Rion

Model No: NL-14 **Serial No:** 10430749

Microphone Type: UC-53 **Serial No:** 13765

Filter Type: - **Serial No:** -

Comments: All tests passed for type 1.

Ambient Pressure: 1008

Temperature: 21 **Relative Humidity:** 57%

Date of Calibration: 23.11.98 **Calibration Due Date:** 23.11.2000

CHECKED BY: TJ **AUTHORISED SIGNATORY:** .....

Jack Kielt

The equipment listed above has been calibrated in this laboratory. The equipment performed satisfactorily in all the tests conducted.

This certificate is effective for 24 months from the date of calibration.

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CERTIFICATE OF CALIBRATION

CERTIFICATE NO.: SLM01007

Equipment Description:	Sound Logging Meter		
Manufacturer:	RTA		
Model No:	Version 4.0	**Serial No:**	065
Microphone Type:	Electret	**Serial No:**	065
Filter Type:	-	**Serial No:**	-
Comments:	All tests passed for type 2.		

Ambient Pressure:	1008		
Temperature:	21	**Relative Humidity:**	57%
Date of Calibration:	23.11.98	**Calibration Due Date:**	23.11.2000
CHECKED BY:	TJ	**AUTHORISED SIGNATORY:**	Jack Kiett

The equipment listed above has been calibrated in this laboratory. The equipment performed satisfactorily in all the tests conducted.

This certificate is effective for 24 months from the date of calibration.

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CERTIFICATE OF CALIBRATION

CERTIFICATE NO.: SLM01006

Equipment Description: Sound Logging Meter

Manufacturer: RTA

Model No: Version 4.0 **Serial No:** 080

Microphone Type: Electret **Serial No:** 080

Filter Type: - **Serial No:** -

Comments: All tests passed for type 2.

Ambient Pressure: 1008

Temperature: 21 **Relative Humidity:** 57%

Date of Calibration: 23.11.98 **Calibration Due Date:** 23.11.2000

CHECKED BY: TJ **AUTHORISED SIGNATORY:** .....

Jack Kielt

The equipment listed above has been calibrated in this laboratory. The equipment performed satisfactorily in all the tests conducted.

This certificate is effective for 24 months from the date of calibration.

NATA

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CERTIFICATE OF CALIBRATION

CERTIFICATE NO.: SLM01008

Equipment Description:	Sound Logging Meter		
Manufacturer:	RTA		
Model No:	Version 4.0	**Serial No:**	081
Microphone Type:	Electret	**Serial No:**	081
Filter Type:	-	**Serial No:**	-
Comments:	All tests passed for type 2.		

Ambient Pressure:	1008		
Temperature:	21	**Relative Humidity:**	57%
Date of Calibration:	23.11.98	**Calibration Due Date:**	23.11.2000
CHECKED BY:	TJ	**AUTHORISED SIGNATORY:**	Jack Kielt

The equipment listed above has been calibrated in this laboratory. The equipment performed satisfactorily in all the tests conducted.

This certificate is effective for 24 months from the date of calibration.

NATA

Reg. Lab. No. 9262
Acoustic and Vibration Measurements

ACU-VIB Electronics
Acoustic and Vibration Electronics
HEAD OFFICE
Unit 2, 2 Charlotte St, Ashfield, NSW 2131
Tel: (02) 9797 1790 Fax: (02) 9797 1792
Mobile: (018) 470 179
P.O. Box W16 Wareemba, NSW 2046
REGIONAL OFFICE WA & NT
PO Box 535 Mundaring WA 6073
Tel: (08) 9295 2552 Fax: (08) 9295 2594
Mobile: 015 994 121

NATA
National Association of Testing Authorities, Australia
NATA Endorsed Calibration Certificate
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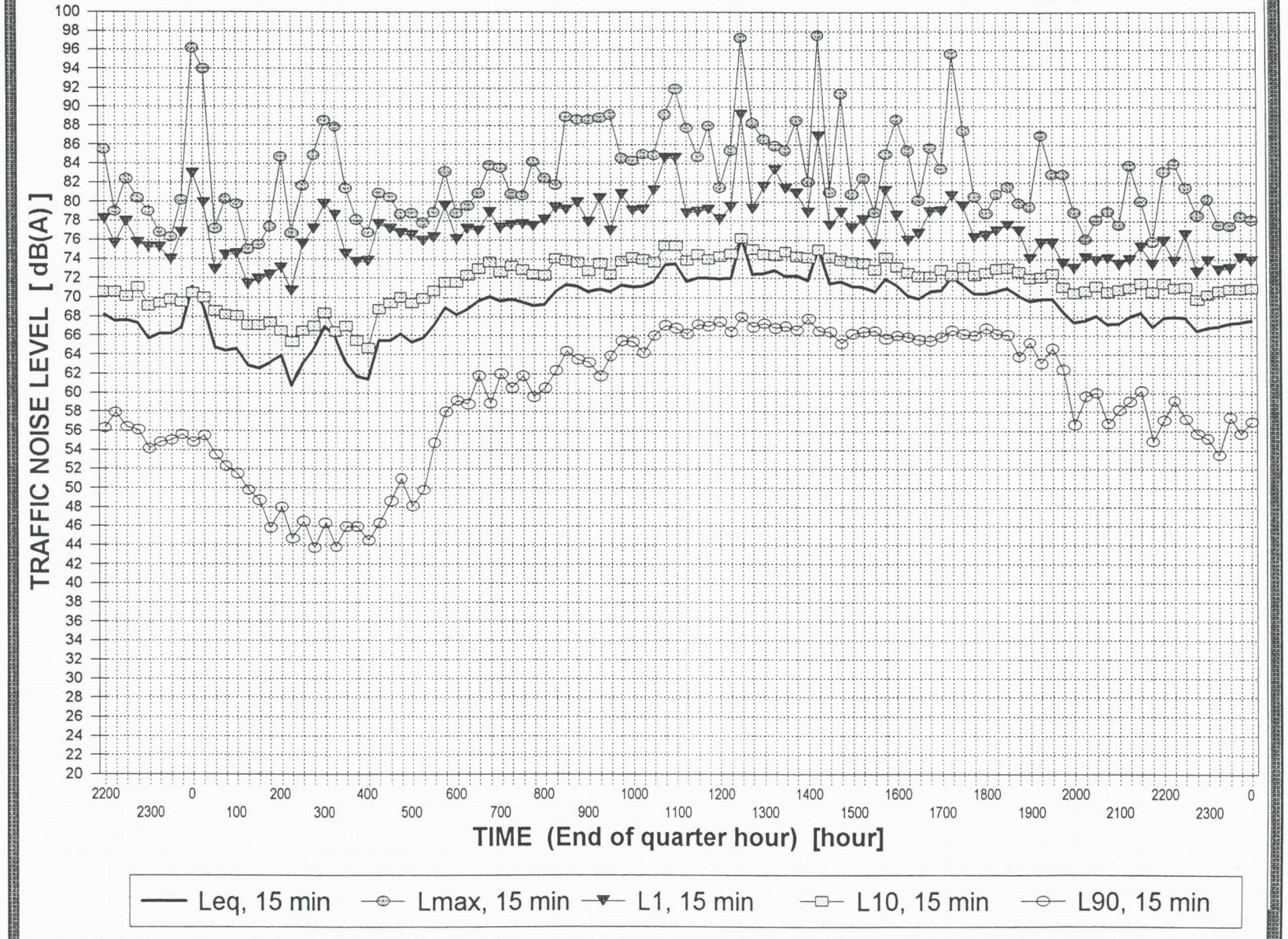
17 Barila Place, Bonnyrigg Heights

DAY 1

Saturday 27 May 2000

RT&A S/N 65



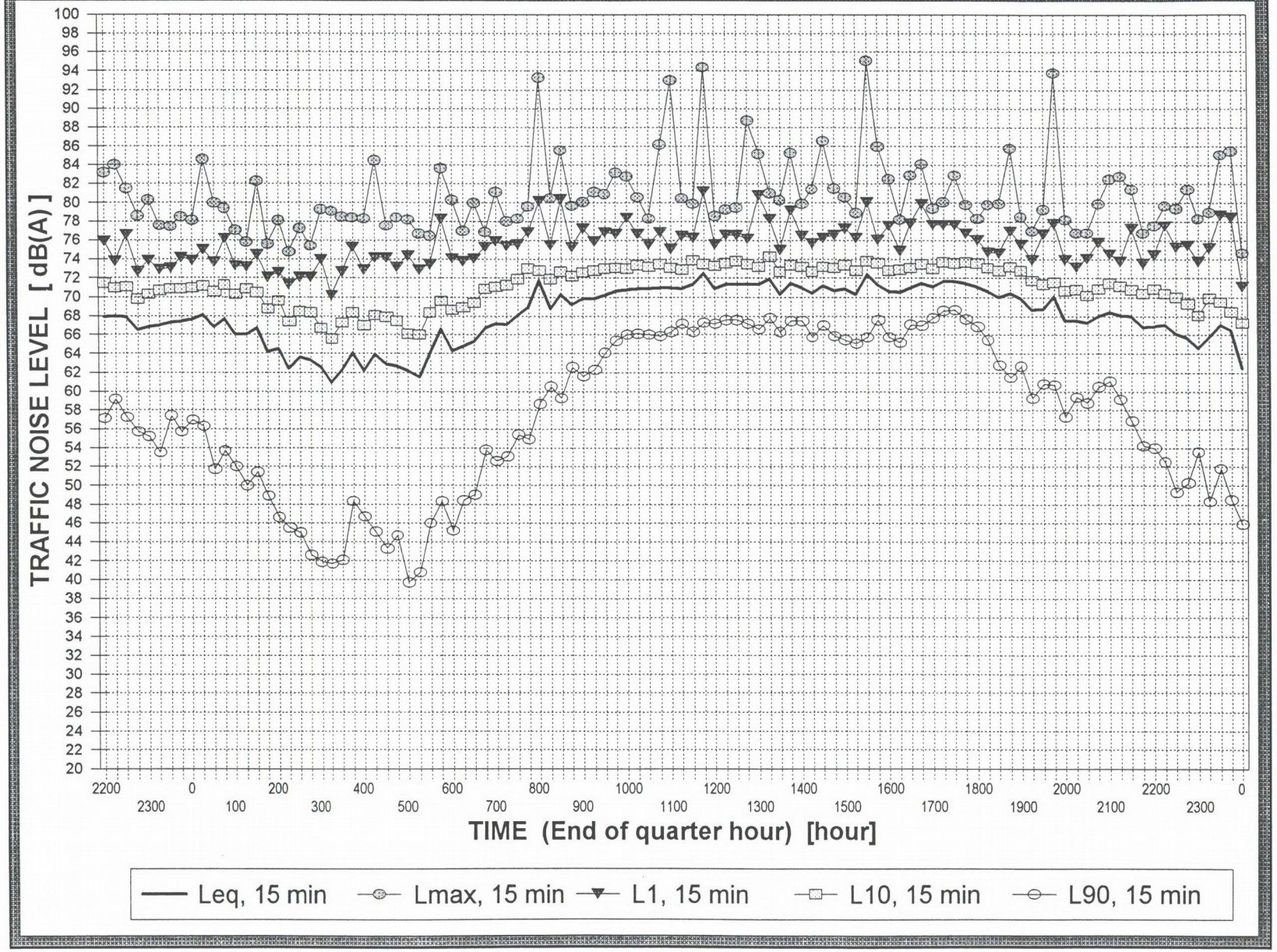
KOIKAS ACOUSTICS PTY LTD

17 Barila Place, Bonnyrigg Heights

DAY 2

Sunday 28 May 2000

RT&A S/N 65



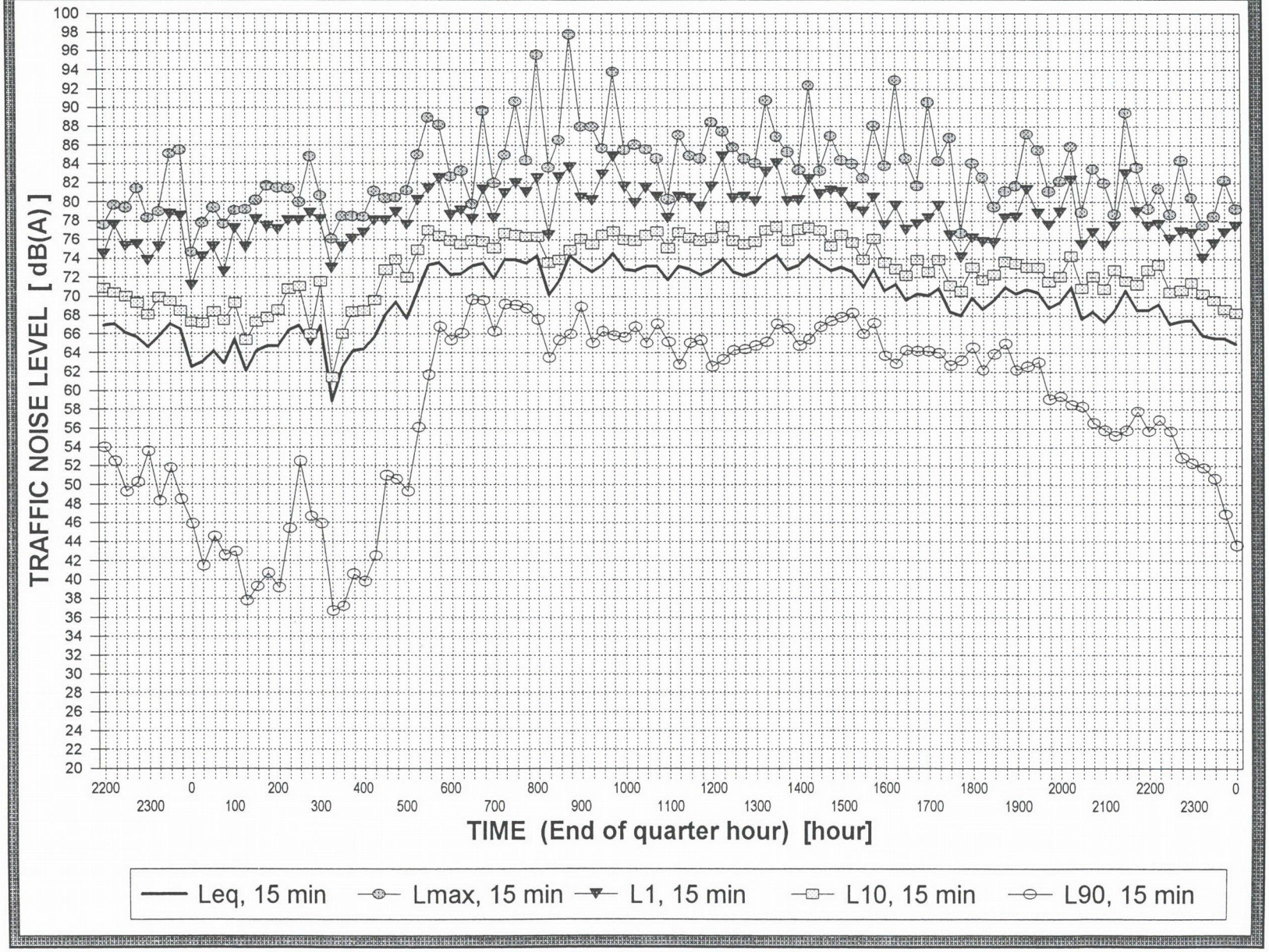
KOIKAS ACOUSTICS PTY LTD

17 Barila Place, Bonnyrigg Heights

DAY 3

Monday 29 May 2000

RT&A S/N 65



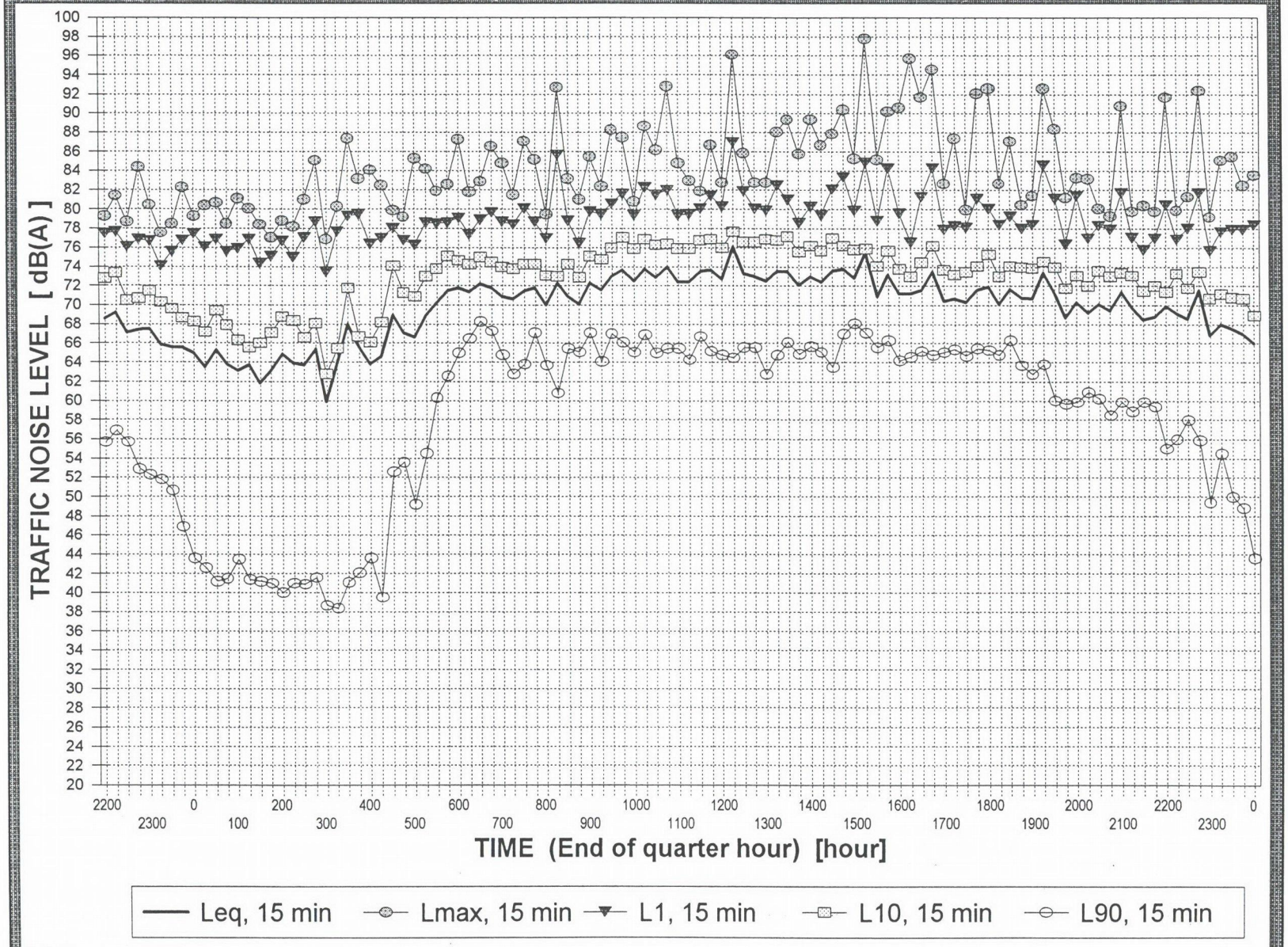
KOIKAS ACOUSTICS PTY LTD

17 Barila Place, Bonnyrigg Heights

DAY 4

Tuesday 30 May 2000

RT&A S/N 65



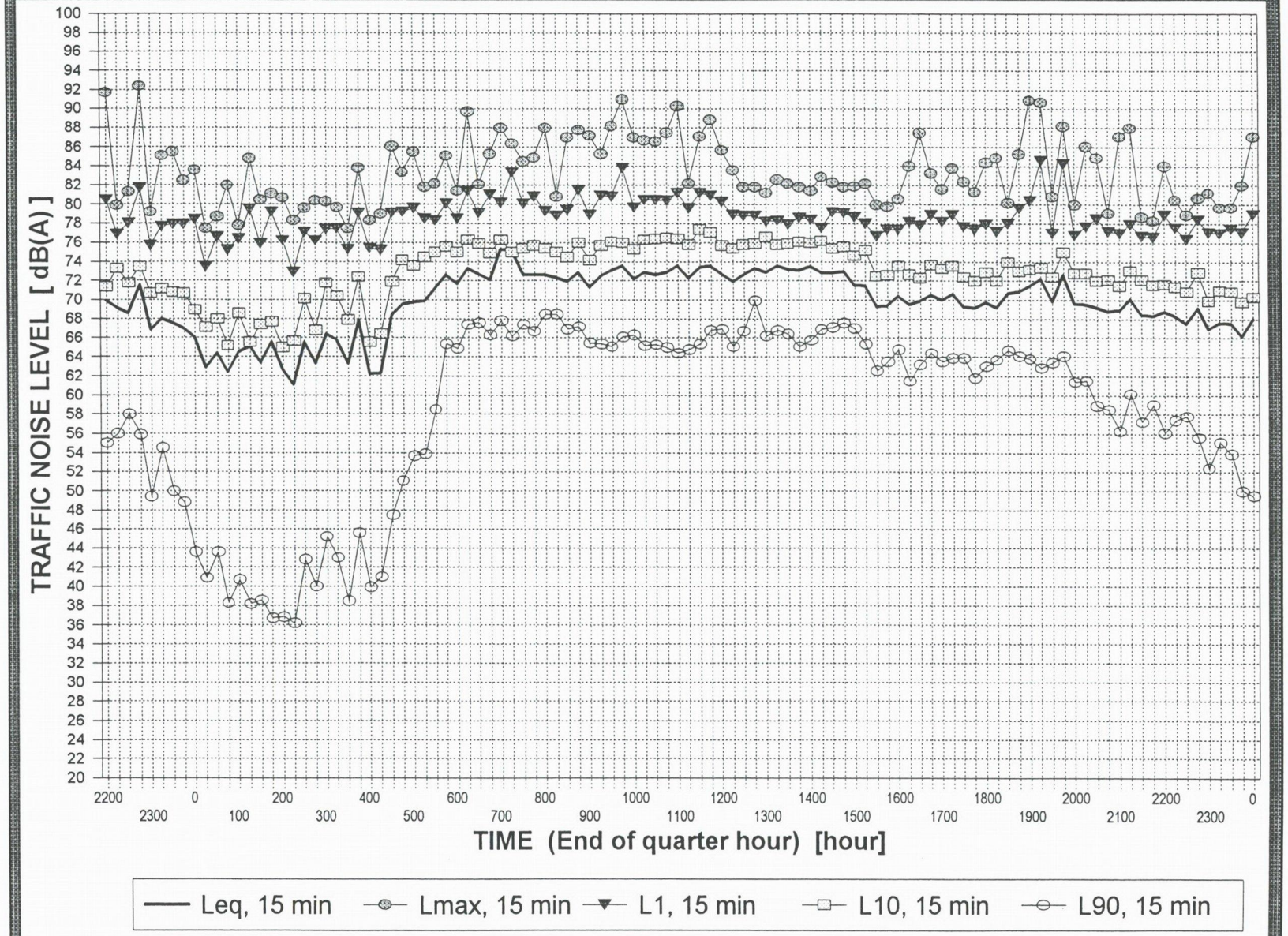
KOIKAS ACOUSTICS PTY LTD

17 Barila Place, Bonnyrigg Heights

DAY 5

Wednesday 31 May 2000

RT&A S/N 65



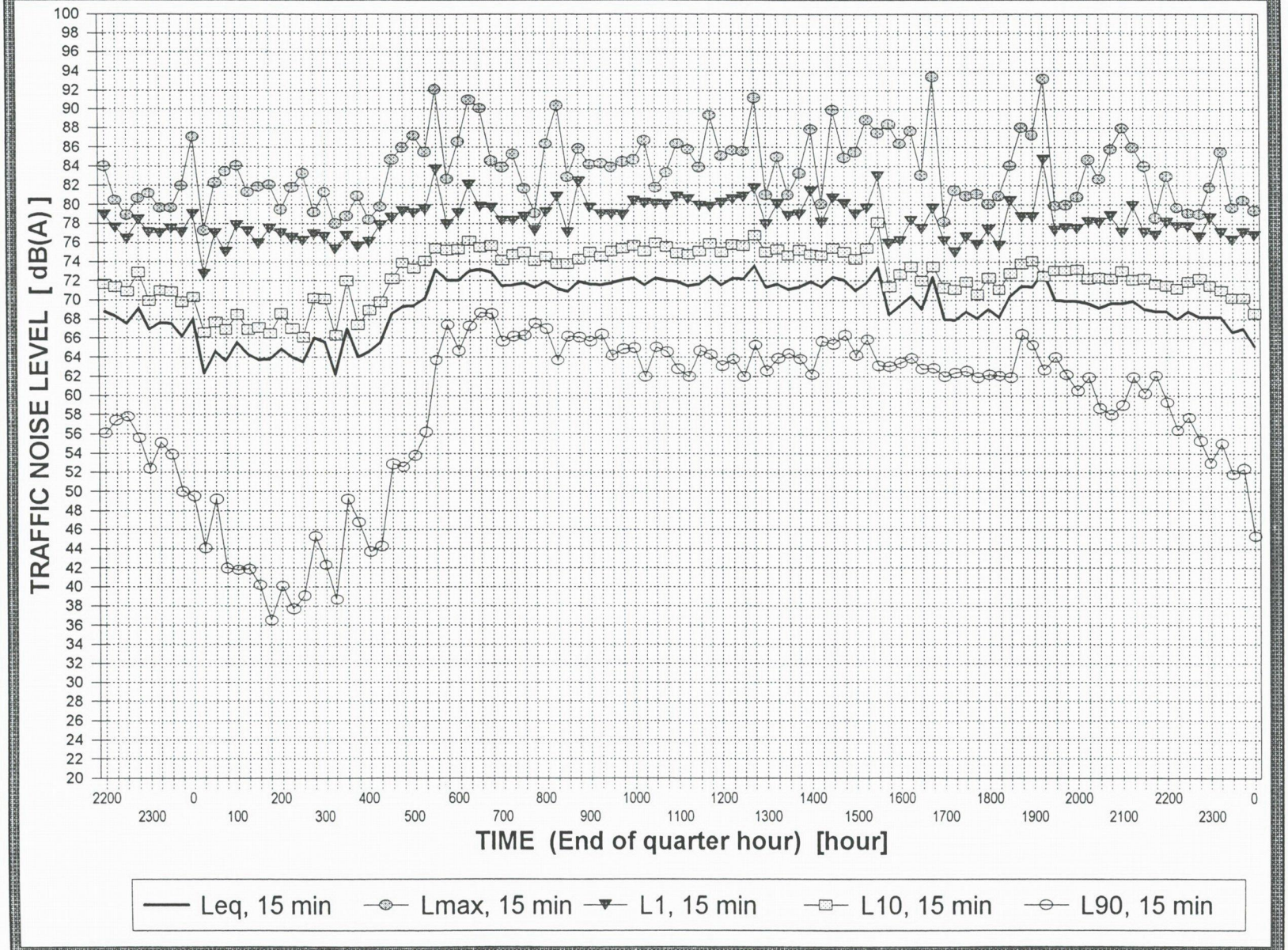
KOIKAS ACOUSTICS PTY LTD

17 Barila Place, Bonnyrigg Heights

DAY 6

Thursday 1 June 2000

RT&A S/N 65



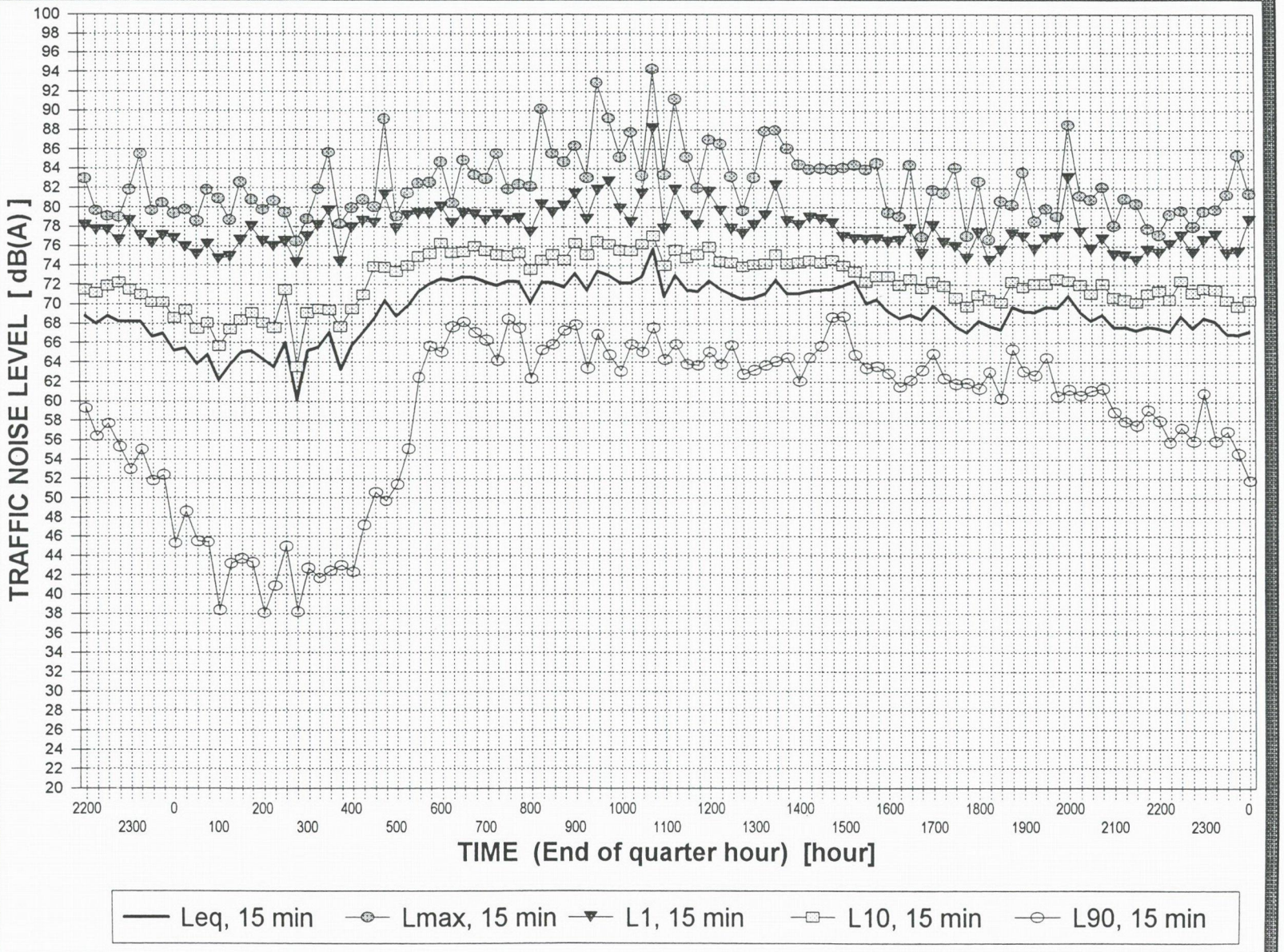
KOIKAS ACOUSTICS PTY LTD

17 Barila Place, Bonnyrigg Heights

DAY 7

Friday 2 May 2000

RT&A S/N 65



KOIKAS ACOUSTICS PTY LTD

17 Barila Place, Bonnyrigg Heights											DAY 1
Saturday 27 May 2000									RT&A S/N 65		
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	526	2215	67.5	79.0	75.6	72.0	70.6	66.1	57.9	47.3	11.5
2000	526	2230	67.6	82.4	77.9	72.2	70.1	65.3	56.4	50.9	14.8
2000	526	2245	67.3	80.4	75.7	73.1	71.1	65.0	56.1	49.9	13.1
2000	526	2300	65.7	79.0	75.2	70.7	69.1	63.6	54.1	46.2	13.3
2000	526	2315	66.2	76.8	75.2	70.8	69.4	64.5	54.8	47.6	10.6
2000	526	2330	66.2	76.3	74.0	71.3	69.8	64.7	55.0	49.5	10.1
2000	526	2345	66.8	80.2	76.8	71.4	69.5	64.8	55.6	48.7	13.4
2000	526	0	71.1	96.2	83.0	74.0	70.5	64.8	54.8	49.5	25.1
2000	527	15	69.0	94.0	79.9	72.4	70.0	64.8	55.5	46.6	25.0
2000	527	30	64.8	77.2	72.9	70.0	68.6	62.6	53.5	46.5	12.4
2000	527	45	64.4	80.3	74.4	69.6	68.2	61.4	52.3	48.1	15.9
2000	527	100	64.6	79.8	74.6	69.3	68.1	61.7	51.5	45.2	15.2
2000	527	115	62.9	75.0	71.4	68.3	67.1	59.9	49.8	43.0	12.1
2000	527	130	62.6	75.5	71.9	68.8	67.1	57.7	48.7	43.3	12.9
2000	527	145	63.1	77.4	72.3	69.1	67.4	58.3	45.8	39.2	14.3
2000	527	200	63.9	84.7	73.1	68.2	66.5	58.6	48.0	40.9	20.8
2000	527	215	60.7	76.7	70.7	67.0	65.4	54.2	44.7	40.1	16.0
2000	527	230	63.1	81.7	75.6	68.5	66.5	55.0	46.5	40.6	18.6
2000	527	245	64.6	84.9	77.2	70.8	67.0	54.1	43.7	36.3	20.3
2000	527	300	67.0	88.6	79.8	71.1	68.4	56.0	46.3	38.4	21.6
2000	527	315	65.9	87.9	78.6	69.2	66.4	51.9	43.8	37.7	22.0
2000	527	330	63.1	81.4	74.6	69.0	67.0	54.5	45.9	39.8	18.3
2000	527	345	61.7	78.1	73.7	67.3	65.5	53.2	45.9	41.5	16.4
2000	527	400	61.4	76.8	73.8	68.0	64.7	51.3	44.5	38.4	15.4
2000	527	415	65.5	80.9	77.7	72.2	68.8	56.5	46.3	39.6	15.4
2000	527	430	65.5	80.5	77.2	72.6	69.4	56.9	48.6	41.8	15.0
2000	527	445	66.2	78.7	76.7	73.2	70.0	61.8	51.0	42.5	12.5
2000	527	500	65.3	78.8	76.5	72.0	69.4	58.4	48.1	40.4	13.5
2000	527	515	65.8	77.8	75.9	72.9	69.9	60.6	49.8	42.2	12.0
2000	527	530	67.1	78.9	76.3	73.6	70.7	63.9	54.7	45.5	11.8
2000	527	545	68.9	83.2	79.6	74.5	71.6	66.0	58.0	52.4	14.3
2000	527	600	68.2	78.8	76.1	73.0	71.6	66.8	59.2	54.7	10.6
2000	527	615	68.8	79.6	77.2	74.0	72.3	66.9	58.8	52.0	10.8
2000	527	630	69.6	80.9	77.0	74.5	73.0	68.3	61.8	52.4	11.3
2000	527	645	70.1	83.8	78.9	75.5	73.7	67.6	58.9	52.6	13.7
2000	527	700	69.6	83.6	77.3	74.7	72.7	68.1	62.0	54.7	14.0
2000	527	715	69.8	80.8	77.6	74.9	73.3	68.2	60.5	53.9	11.0
2000	527	730	69.5	80.7	77.7	75.0	72.9	67.7	61.8	56.1	11.2
2000	527	745	69.1	84.2	77.5	74.1	72.4	67.4	59.6	51.4	15.1
2000	527	800	69.3	82.5	78.1	74.3	72.3	67.7	60.5	52.5	13.2
2000	527	815	70.7	81.8	79.4	76.1	74.1	69.0	62.4	56.8	11.1
2000	527	830	71.4	89.0	79.2	75.4	73.9	69.5	64.4	55.3	17.6
2000	527	845	71.2	88.7	80.0	75.6	73.7	69.1	63.5	54.6	17.5
2000	527	900	70.6	88.7	77.9	74.5	72.8	68.9	63.2	55.3	18.1
2000	527	915	70.9	88.9	80.4	75.4	73.6	68.7	61.8	53.7	18.0
2000	527	930	70.6	89.2	77.0	73.5	72.4	69.0	63.9	54.7	18.6
2000	527	945	71.3	84.6	80.8	75.5	73.8	69.8	65.5	59.6	13.3
2000	527	1000	71.1	84.3	79.1	76.1	74.2	69.4	65.4	56.0	13.2
2000	527	1015	71.2	85.0	79.2	75.4	74.0	70.2	64.2	54.8	13.8
2000	527	1030	71.7	84.9	81.2	76.0	73.7	70.1	66.0	58.1	13.2
2000	527	1045	73.4	89.2	84.6	77.5	75.4	70.8	67.1	59.9	15.8
2000	527	1100	73.5	91.9	84.6	77.3	75.4	70.5	66.8	57.9	18.4
2000	527	1115	71.7	87.8	78.8	75.5	73.9	70.7	66.2	54.3	16.1
2000	527	1130	72.0	84.7	79.0	75.5	74.5	71.3	67.2	58.4	12.7
2000	527	1145	72.0	88.0	79.2	75.4	74.0	71.1	67.0	59.1	16.0
2000	527	1200	71.9	81.5	78.2	75.4	74.3	71.2	67.5	58.0	9.6
2000	527	1215	72.0	85.4	79.5	75.9	74.6	70.9	66.4	57.5	13.4
2000	527	1230	76.3	97.3	89.2	79.0	76.2	71.5	68.0	61.5	21.0
2000	527	1245	72.4	88.3	79.3	76.5	75.0	71.1	66.9	57.5	15.9
2000	527	1300	72.5	86.6	81.6	76.4	74.5	71.2	67.3	57.8	14.1
2000	527	1315	72.8	85.9	83.4	76.7	74.4	70.9	66.8	54.0	13.1
2000	527	1330	72.2	85.4	81.4	76.5	74.8	70.6	67.0	59.6	13.2
2000	527	1345	72.3	88.6	80.9	75.9	74.3	71.1	66.6	54.1	16.3
2000	527	1400	71.8	82.1	78.9	75.5	74.2	71.2	67.8	60.3	10.3
2000	527	1415	75.2	97.6	86.9	76.7	75.0	71.5	66.5	55.9	22.4
2000	527	1430	71.5	81.0	77.6	75.5	74.2	70.9	66.4	55.4	9.5
2000	527	1445	71.7	91.4	78.9	75.5	73.9	70.7	65.2	54.8	19.7
2000	527	1500	71.2	80.8	77.3	75.0	73.7	70.5	66.2	54.3	9.6
2000	527	1515	71.1	82.5	78.1	75.1	73.6	70.3	66.4	58.5	11.4
2000	527	1530	70.6	78.9	75.6	73.5	72.9	70.4	66.5	56.1	8.3
2000	527	1545	71.9	85.0	81.2	76.6	74.2	70.4	65.7	52.1	13.1
2000	527	1600	71.3	88.7	78.6	74.9	73.2	70.1	66.0	52.0	17.4
2000	527	1615	70.2	85.4	76.0	73.8	72.6	69.5	65.9	54.9	15.2
2000	527	1630	69.9	80.2	76.7	73.2	72.2	69.3	65.6	59.9	10.3
2000	527	1645	70.6	85.7	79.0	74.1	72.2	69.6	65.5	51.8	15.1
2000	527	1700	70.8	83.5	79.1	74.4	72.9	69.8	65.9	59.4	12.7
2000	527	1715	72.2	95.6	80.7	73.4	72.3	69.7	66.6	59.7	23.4
2000	527	1730	71.3	87.5	79.6	74.9	73.2	70.3	66.2	59.8	16.2
2000	527	1745	70.4	80.6	76.3	73.2	72.3	70.2	66.0	53.4	10.2
2000	527	1800	70.4	78.8	76.5	73.9	72.6	69.9	66.8	60.8	8.4
2000	527	1815	70.7	80.8	77.0	74.1	73.0	70.3	66.2	58.1	10.1
2000	527	1830	71.0	81.6	77.6	74.0	73.1	70.7	66.1	58.2	10.6
2000	527	1845	70.2	79.9	77.0	73.8	72.7	69.8	63.8	52.6	9.7
2000	527	1900	69.6	79.5	74.1	72.6	72.0	69.3	65.3	60.0	9.9
2000	527	1915	69.8	87.0	75.7	73.1	72.1	68.9	63.1	55.5	17.2
2000	527	1930	69.9	82.9	75.7	73.2	72.5	69.1	64.7	52.1	13.0
2000	527	1945	68.6	82.9	73.6	72.0	71.1	68.0	62.5	53.6	14.3
2000	527	2000	67.4	78.9	73.1	71.2	70.5	66.9	56.7	48.9	11.5
2000	527	2015	67.6	76.1	74.2	71.6	70.7	67.0	59.7	50.7	8.5
2000	527	2030	68.1	78.1	73.9	72.0	71.2	67.5	60.0	48.3	10.0
2000	527	2045	67.2	79.0	74.1	71.7	70.6	66.0	56.8	49.8	11.8
2000	527	2100	67.3	77.6	73.5	71.7	70.8	66.2	58.2	48.0	10.3
2000	527	2115	68.0	83.8	74.0	71.8	71.0	66.5	59.1	47.9	15.8
2000	527	2130	68.4	80.1	75.3	72.8	71.5	67.5	60.2	50.1	11.7
2000	527	2145	66.9	75.8	73.5	71.7	70.6	65.7	54.9	45.2	8.9
2000	527	2200	67.9	83.2	75.9	73.0	71.5	65.7	57.1	49.1	15.3
2000	527	2215	68.0	84.0	73.8	71.9	71.0	66.9	59.2	52.1	16.0
2000	527	2230	67.9	81.5	76.6	72.3	71.1	66.4	57.2	49.9	13.6
2000	527	2245	66.5	78.6	72.7	70.8	69.8	65.4	55.7	48.2	12.1
2000	527	2300	66.8	80.3	73.9	71.3	70.3	65.7	55.2	50.9	13.5
2000	527	2315	67.0	77.6	72.9	71.6	70.7	66.0	53.5	46.4	10.6
2000	527	2330	67.3	77.5	73.1	71.6	70.9	66.2	57.4	50.6	10.2
2000	527	2345	67.4	78.5	74.2	72.0	70.9	66.2	55.7	47.7	11.1
2000	527	0	67.6	78.1	73.9	71.9	71.0	66.5	57.0	47.6	10.5

DAY 1	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**69.9**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**65.9**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**71.1**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**66.6**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**72.9**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**59.6**	dB(A)

17 Barila Place, Bonnyrigg Heights — DAY 2

Sunday 28 May 2000 — RT&A S/N 65

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	527	2200	67.9	83.2	75.9	73.0	71.5	65.7	57.1	49.1	15.3
2000	527	2215	68.0	84.0	73.8	71.9	71.0	66.9	59.2	52.1	16.0
2000	527	2230	67.9	81.5	76.6	72.3	71.1	66.4	57.2	49.9	13.6
2000	527	2245	66.5	78.6	72.7	70.8	69.8	65.4	55.7	48.2	12.1
2000	527	2300	66.8	80.3	73.9	71.3	70.3	65.7	55.2	50.9	13.5
2000	527	2315	67.0	77.6	72.9	71.6	70.7	66.0	53.5	46.4	10.6
2000	527	2330	67.3	77.5	73.1	71.6	70.9	66.2	57.4	50.6	10.2
2000	527	2345	67.4	78.5	74.2	72.0	70.9	66.2	55.7	47.7	11.1
2000	527	0	67.6	78.1	73.9	71.9	71.0	66.5	57.0	47.6	10.5
2000	528	15	68.1	84.6	75.0	72.1	71.2	66.6	56.3	47.1	16.5
2000	528	30	66.8	80.0	73.7	71.8	70.6	65.1	51.7	44.2	13.2
2000	528	45	67.7	79.4	76.2	72.5	71.3	66.1	53.7	46.0	11.7
2000	528	100	66.0	77.1	73.3	71.4	70.3	63.3	52.0	46.4	11.1
2000	528	115	66.0	75.8	73.2	72.0	70.9	62.3	50.0	45.5	9.8
2000	528	130	66.7	82.3	74.5	71.6	70.5	64.3	51.4	46.2	15.6
2000	528	145	64.2	75.6	72.1	70.1	68.8	60.2	48.9	44.2	11.4
2000	528	200	64.5	78.1	72.6	70.8	69.6	58.7	46.6	42.0	13.6
2000	528	215	62.4	74.8	71.4	69.0	67.4	55.8	45.5	41.5	12.4
2000	528	230	63.6	77.3	72.1	69.9	68.5	58.0	45.0	39.2	13.7
2000	528	245	63.3	75.4	72.1	69.8	68.4	57.0	42.6	38.2	12.1
2000	528	300	62.5	79.3	74.0	69.5	66.7	51.1	41.9	36.1	16.8
2000	528	315	60.9	79.1	70.2	67.7	65.6	49.7	41.7	37.8	18.2
2000	528	330	62.3	78.5	72.7	69.3	67.3	51.7	42.1	37.5	16.2
2000	528	345	64.1	78.4	75.3	71.1	68.4	55.8	48.3	43.4	14.3
2000	528	400	62.2	78.3	72.9	69.0	67.0	53.1	46.7	44.1	16.1
2000	528	415	63.9	84.5	74.2	70.1	68.1	54.6	45.1	41.4	20.6
2000	528	430	62.9	77.6	74.2	70.3	67.9	50.1	43.3	39.1	14.7
2000	528	445	62.7	78.4	73.2	69.7	67.5	53.1	44.7	41.3	15.7
2000	528	500	62.2	78.2	74.4	69.7	66.1	48.4	39.7	36.8	16.0
2000	528	515	61.5	76.7	72.9	68.2	66.0	52.4	40.8	36.2	15.2
2000	528	530	64.0	76.5	73.5	69.9	68.4	59.3	46.0	35.8	12.5
2000	528	545	66.6	83.7	78.3	72.1	69.6	61.3	48.3	39.7	17.1
2000	528	600	64.3	80.3	74.1	70.2	68.7	57.7	45.2	40.4	16.0
2000	528	615	64.8	77.0	73.8	70.1	68.9	61.3	48.4	40.2	12.2
2000	528	630	65.3	80.0	74.1	70.8	69.4	61.2	49.0	42.0	14.7
2000	528	645	66.7	76.9	75.3	72.7	70.9	63.5	53.8	43.8	10.2
2000	528	700	67.2	81.1	75.9	72.9	71.1	64.0	52.6	44.1	13.9
2000	528	715	67.1	78.0	75.4	72.5	71.3	64.4	53.1	47.7	10.9
2000	528	730	68.1	78.3	75.6	72.9	71.9	66.5	55.4	48.7	10.2
2000	528	745	68.9	79.6	76.9	74.4	73.0	66.6	54.9	46.3	10.7
2000	528	800	71.8	93.3	80.2	74.6	72.8	68.0	58.7	49.2	21.5
2000	528	815	68.8	80.5	75.5	72.9	71.9	68.0	60.5	52.4	11.7
2000	528	830	70.3	85.6	80.4	74.0	72.7	68.8	59.3	50.6	15.3
2000	528	845	69.2	79.7	75.3	73.2	72.2	68.4	62.6	52.3	10.5
2000	528	900	69.8	80.1	77.3	73.7	72.6	69.2	61.6	52.3	10.3
2000	528	915	69.8	81.1	75.9	73.7	72.8	69.2	62.3	50.7	11.3
2000	528	930	70.2	80.9	76.9	73.7	73.0	69.7	64.1	53.5	10.7
2000	528	945	70.6	83.2	76.7	73.9	73.1	70.1	65.4	54.4	12.6
2000	528	1000	70.8	82.8	78.4	74.2	73.0	69.9	66.0	58.6	12.0
2000	528	1015	70.9	80.6	76.7	74.2	73.4	70.6	66.1	57.0	9.7
2000	528	1030	70.9	78.3	75.6	74.0	73.2	70.8	66.0	54.3	7.4
2000	528	1045	71.0	86.2	76.9	74.5	73.5	70.5	65.9	54.0	15.2
2000	528	1100	71.0	93.0	75.1	73.7	73.1	70.8	66.3	59.7	22.0
2000	528	1115	70.9	80.5	76.5	73.9	72.9	70.5	67.2	60.7	9.6
2000	528	1130	71.4	79.9	76.3	74.9	73.9	71.1	66.3	57.7	8.5
2000	528	1145	72.5	94.4	81.2	74.6	73.5	71.0	67.3	57.8	21.9
2000	528	1200	70.9	78.6	75.6	74.0	73.3	70.7	67.2	61.4	7.7
2000	528	1215	71.4	79.3	76.6	74.4	73.6	71.3	67.6	56.9	7.9
2000	528	1230	71.4	79.5	76.6	74.6	73.8	71.0	67.6	58.7	8.1
2000	528	1245	71.4	88.8	76.2	74.2	73.5	71.2	67.2	58.4	17.4
2000	528	1300	71.4	85.2	80.8	74.2	73.2	70.6	66.6	58.3	13.8
2000	528	1315	71.9	81.0	78.3	75.4	74.3	71.3	67.8	62.1	9.1
2000	528	1330	70.3	80.3	75.0	73.5	72.7	70.1	66.3	57.6	10.0
2000	528	1345	71.5	85.3	79.2	74.2	73.4	70.8	67.5	59.2	13.8
2000	528	1400	71.0	79.9	76.5	74.0	73.2	70.7	67.5	62.9	8.9
2000	528	1415	70.4	81.4	75.7	73.5	72.7	70.1	65.8	55.1	11.0
2000	528	1430	71.2	86.6	76.3	74.0	73.2	70.6	67.0	59.0	15.4
2000	528	1445	70.7	81.5	76.6	74.4	73.1	70.2	65.9	54.1	10.8
2000	528	1500	70.9	80.6	77.3	74.6	73.4	70.4	65.5	55.6	9.7
2000	528	1515	70.3	78.9	76.3	73.6	72.8	69.8	65.1	58.7	8.6
2000	528	1530	72.4	95.1	80.1	75.4	73.8	70.6	65.8	55.5	22.7
2000	528	1545	71.3	86.0	76.1	74.3	73.6	71.0	67.6	59.8	14.7
2000	528	1600	70.6	82.5	77.6	73.7	72.8	70.2	65.8	53.5	11.9
2000	528	1615	70.5	78.2	74.9	73.6	72.9	70.5	65.2	56.4	7.7
2000	528	1630	71.0	82.9	77.8	74.1	73.1	70.5	67.1	57.4	11.9
2000	528	1645	71.5	84.1	79.9	74.4	73.5	70.8	67.0	60.6	12.6
2000	528	1700	71.1	79.4	77.7	73.8	73.0	70.8	67.8	57.9	8.3
2000	528	1715	71.7	80.1	77.7	74.5	73.7	71.2	68.6	64.1	8.4
2000	528	1730	71.7	82.9	77.7	74.2	73.6	71.3	68.7	56.1	11.2
2000	528	1745	71.5	79.8	76.8	74.5	73.7	71.2	67.7	58.4	8.3
2000	528	1800	71.1	78.3	76.1	74.4	73.6	70.8	66.9	58.6	7.2
2000	528	1815	70.6	79.8	74.8	73.7	73.1	70.5	65.5	54.3	9.2
2000	528	1830	70.0	79.9	74.7	73.4	72.8	69.7	62.8	53.5	9.9
2000	528	1845	70.4	85.8	77.0	74.3	73.2	69.6	61.5	50.2	15.4
2000	528	1900	69.9	78.5	75.6	73.6	72.8	69.5	62.7	51.3	8.6
2000	528	1915	68.7	77.0	74.0	72.6	71.8	68.3	59.3	51.3	8.3
2000	528	1930	68.8	79.3	76.7	72.8	71.4	68.1	60.8	51.8	10.5
2000	528	1945	70.1	93.8	77.8	72.9	71.6	67.5	60.7	53.1	23.7
2000	528	2000	67.5	78.2	74.0	71.7	70.7	66.5	57.3	50.1	10.7
2000	528	2015	67.5	76.8	73.2	71.4	70.8	66.5	59.4	52.6	9.3
2000	528	2030	67.3	76.8	74.1	71.3	70.2	66.5	58.8	46.5	9.5
2000	528	2045	68.0	79.9	75.8	72.2	70.9	66.9	60.5	51.3	11.9
2000	528	2100	68.4	82.5	74.6	72.1	71.5	67.4	61.1	53.5	14.1
2000	528	2115	68.1	82.8	73.8	72.1	71.2	66.9	59.2	49.6	14.7
2000	528	2130	68.0	81.4	77.3	72.1	70.8	66.7	56.9	48.7	13.4
2000	528	2145	66.8	76.8	73.6	71.4	70.4	65.7	54.2	47.5	10.0
2000	528	2200	66.9	77.6	74.5	72.4	70.9	64.7	54.0	48.0	10.7
2000	528	2215	67.1	79.7	77.6	73.5	70.4	63.2	52.5	45.3	12.6
2000	528	2230	66.1	79.4	75.3	71.7	70.0	62.9	49.3	40.8	13.3
2000	528	2245	65.7	81.4	75.5	71.0	69.3	62.4	50.3	40.4	15.7
2000	528	2300	64.6	78.3	73.8	69.3	68.1	62.2	53.6	45.3	13.7
2000	528	2315	65.8	79.0	75.2	71.5	69.9	62.4	48.3	41.7	13.2
2000	528	2330	67.1	85.1	78.7	71.6	69.5	62.7	51.8	41.0	18.0
2000	528	2345	66.5	85.5	78.5	70.9	68.5	59.4	48.5	42.2	19.0

DAY 2	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**69.1**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**65.5**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**70.4**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**65.6**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**72.2**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**52.6**	dB(A)

17 Barila Place, Bonnyrigg Heights — DAY 3

Monday 29 May 2000 — RT&A S/N 65

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	528	2215	67.1	79.7	77.6	73.5	70.4	63.2	52.5	45.3	12.6
2000	528	2230	66.1	79.4	75.3	71.7	70.0	62.9	49.3	40.8	13.3
2000	528	2245	65.7	81.4	75.5	71.0	69.3	62.4	50.3	40.4	15.7
2000	528	2300	64.6	78.3	73.8	69.3	68.1	62.2	53.6	45.3	13.7
2000	528	2315	65.8	79.0	75.2	71.5	69.9	62.4	48.3	41.7	13.2
2000	528	2330	67.1	85.1	78.7	71.6	69.5	62.7	51.8	41.0	18.0
2000	528	2345	66.5	85.5	78.5	70.9	68.5	59.4	48.5	42.2	19.0
2000	528	0	62.5	74.7	71.2	68.6	67.3	57.6	45.9	38.5	12.2
2000	529	15	63.0	77.8	74.2	69.6	67.2	52.8	41.5	35.9	14.8
2000	529	30	64.2	79.4	75.2	70.4	68.4	56.5	44.6	36.3	15.2
2000	529	45	62.9	77.7	72.6	69.8	67.5	55.6	42.6	37.3	14.8
2000	529	100	65.5	79.1	77.2	72.9	69.3	56.4	43.0	37.4	13.6
2000	529	115	62.1	79.2	75.2	69.3	65.4	46.0	37.8	33.4	17.1
2000	529	130	64.2	80.2	78.1	70.0	67.3	50.8	39.3	33.6	16.0
2000	529	145	64.7	81.7	77.4	72.1	67.8	51.5	40.7	36.3	17.0
2000	529	200	64.8	81.5	77.1	72.6	68.6	49.8	39.2	34.5	16.7
2000	529	215	66.4	81.4	78.0	74.5	70.8	55.6	45.4	39.9	15.0
2000	529	230	66.9	80.0	78.0	74.4	71.1	59.4	52.5	49.1	13.1
2000	529	245	64.9	84.8	78.8	70.2	66.0	53.2	46.7	40.6	19.9
2000	529	300	66.9	80.7	78.1	74.5	71.6	57.5	45.9	40.5	13.8
2000	529	315	58.9	76.1	73.0	66.1	61.4	41.2	36.7	34.5	17.2
2000	529	330	62.5	78.5	75.2	68.8	66.0	46.9	37.2	33.7	16.0
2000	529	345	64.2	78.5	76.1	71.5	68.4	53.2	40.6	36.3	14.3
2000	529	400	64.4	78.4	76.7	71.2	68.5	51.5	39.8	35.9	14.0
2000	529	415	65.7	81.1	78.0	72.3	69.6	55.7	42.5	37.8	15.4
2000	529	430	68.1	80.4	78.0	75.3	72.8	61.9	51.0	42.3	12.3
2000	529	445	69.4	80.5	78.9	76.6	73.9	64.8	50.6	45.4	11.1
2000	529	500	67.7	81.2	77.6	74.9	72.0	62.0	49.3	45.2	13.5
2000	529	515	70.6	85.0	80.2	77.4	74.9	66.6	56.1	46.9	14.4
2000	529	530	73.3	89.0	81.4	78.7	77.0	71.1	61.7	51.3	15.7
2000	529	545	73.6	88.2	82.5	78.3	76.4	71.8	66.8	54.6	14.6
2000	529	600	72.3	82.7	78.6	77.1	75.9	71.0	65.4	54.4	10.4
2000	529	615	72.4	83.3	79.1	76.8	75.5	71.2	66.1	56.2	10.9
2000	529	630	73.2	79.8	78.2	76.8	75.9	72.5	69.7	66.1	6.6
2000	529	645	73.5	89.7	81.3	77.1	75.8	72.5	69.6	62.1	16.2
2000	529	700	71.9	82.0	78.3	76.3	75.1	70.8	66.3	60.0	10.1
2000	529	715	73.9	85.0	80.9	77.9	76.7	72.8	69.2	57.7	11.1
2000	529	730	73.9	90.7	82.0	78.0	76.5	72.1	69.1	62.6	16.8
2000	529	745	73.5	84.4	81.0	77.9	76.3	72.4	68.8	61.3	10.9
2000	529	800	74.3	95.6	82.5	77.9	76.3	71.8	67.6	61.9	21.3
2000	529	815	70.2	83.7	76.5	74.8	73.6	69.1	63.5	57.8	13.5
2000	529	830	71.7	86.6	82.6	75.6	73.9	69.5	65.4	54.6	14.9
2000	529	845	74.3	97.8	83.7	76.8	74.9	69.7	66.0	59.0	23.5
2000	529	900	73.4	88.0	80.5	77.5	76.1	71.7	68.9	58.3	14.6
2000	529	915	72.6	88.0	80.2	76.8	75.5	70.8	65.1	55.1	15.4
2000	529	930	73.3	85.7	82.9	78.3	76.5	70.9	66.3	58.8	12.4
2000	529	945	74.6	93.8	84.8	78.6	76.9	71.6	65.9	50.2	19.2
2000	529	1000	72.9	85.5	81.6	77.7	76.0	71.1	65.7	55.9	12.6
2000	529	1015	72.7	86.1	79.9	77.5	75.9	71.4	66.8	55.4	13.4
2000	529	1030	73.2	85.6	81.5	77.9	76.5	71.3	65.1	55.1	12.4
2000	529	1045	73.2	84.6	80.6	78.4	76.9	71.3	67.1	60.6	11.4
2000	529	1100	71.8	80.3	78.3	76.6	75.1	70.6	65.2	52.9	8.5
2000	529	1115	73.2	87.1	80.6	77.9	76.8	71.8	62.8	49.6	13.9
2000	529	1130	72.9	84.9	80.4	77.5	76.2	71.2	65.1	54.5	12.0
2000	529	1145	72.3	84.6	79.5	77.3	75.9	70.7	65.4	57.3	12.3
2000	529	1200	72.8	88.5	81.6	77.7	76.2	70.8	62.6	51.0	15.7
2000	529	1215	74.0	87.5	84.8	79.5	77.4	71.0	63.3	56.0	13.5
2000	529	1230	72.6	85.8	80.4	77.3	75.9	71.1	64.3	52.2	13.2
2000	529	1245	72.2	84.6	80.6	76.7	75.5	70.8	64.4	54.1	12.4
2000	529	1300	72.6	84.1	80.1	77.2	75.8	71.1	64.8	56.3	11.5
2000	529	1315	73.7	90.8	83.2	78.4	77.0	71.3	65.2	54.7	17.1
2000	529	1330	74.4	86.9	84.1	79.2	77.4	72.4	67.1	57.6	12.5
2000	529	1345	72.8	85.3	80.1	77.7	75.9	71.4	66.6	57.7	12.5
2000	529	1400	73.3	83.4	80.2	78.4	77.1	71.8	64.8	58.2	10.1
2000	529	1415	74.4	92.4	82.4	78.5	77.3	72.2	65.5	57.4	18.0
2000	529	1430	73.5	83.3	80.8	78.5	77.0	71.9	66.8	58.1	9.8
2000	529	1445	72.7	87.0	81.2	76.9	75.3	71.0	67.4	59.5	14.3
2000	529	1500	73.1	84.4	81.0	77.8	76.5	71.3	67.8	60.7	11.3
2000	529	1515	72.6	84.0	79.5	77.1	75.7	71.4	68.3	62.6	11.4
2000	529	1530	71.0	82.5	79.0	75.5	73.9	69.6	66.0	58.8	11.5
2000	529	1545	72.9	88.1	80.5	77.7	76.1	71.2	67.2	61.4	15.2
2000	529	1600	70.6	83.8	77.6	75.1	73.6	69.6	63.7	59.2	13.2
2000	529	1615	71.3	92.9	79.6	74.8	72.9	67.7	62.9	57.0	21.6
2000	529	1630	69.6	84.6	77.1	73.6	72.2	68.4	64.3	60.1	15.0
2000	529	1645	70.3	81.7	77.7	75.3	73.9	68.5	64.2	58.8	11.4
2000	529	1700	70.1	90.6	78.3	74.2	72.6	68.1	64.2	59.2	20.5
2000	529	1715	70.9	84.3	79.6	75.6	73.9	69.4	64.0	58.9	13.4
2000	529	1730	68.4	86.8	76.5	72.6	71.2	67.0	62.7	58.6	18.4
2000	529	1745	68.0	76.7	74.2	72.1	70.6	67.3	63.2	58.0	8.7
2000	529	1800	69.9	84.1	76.2	74.3	73.1	68.5	64.6	57.7	14.2
2000	529	1815	68.7	82.6	75.8	73.1	71.8	67.2	62.2	58.5	13.9
2000	529	1830	69.6	79.5	75.7	73.5	72.3	69.1	63.9	55.1	9.9
2000	529	1845	71.0	81.1	78.3	75.1	73.7	70.2	65.0	58.9	10.1
2000	529	1900	70.3	81.7	78.4	75.1	73.5	69.0	62.2	54.3	11.4
2000	529	1915	70.8	87.2	81.3	75.0	73.1	68.2	62.6	53.5	16.4
2000	529	1930	70.4	85.5	78.8	74.8	73.1	68.5	63.0	55.7	15.1
2000	529	1945	68.8	81.1	77.6	73.4	71.6	67.4	59.1	49.7	12.3
2000	529	2000	69.4	82.2	78.9	74.1	72.1	68.1	59.4	52.9	12.8
2000	529	2015	71.0	85.9	82.3	76.8	74.3	67.2	58.5	52.2	14.9
2000	529	2030	67.6	78.9	75.5	72.4	70.9	66.2	58.3	52.5	11.3
2000	529	2045	68.4	83.5	76.8	74.0	72.1	66.2	56.6	49.1	15.1
2000	529	2100	67.3	82.0	75.4	72.1	70.8	65.4	55.8	45.1	14.7
2000	529	2115	68.6	78.7	77.5	75.1	72.8	65.7	55.2	48.6	10.1
2000	529	2130	70.7	89.5	83.0	75.9	71.7	66.3	55.8	49.9	18.8
2000	529	2145	68.6	83.7	79.0	73.1	71.3	65.9	57.8	49.5	15.1
2000	529	2200	68.6	79.3	77.5	75.5	72.8	65.7	55.7	47.7	10.7
2000	529	2215	69.2	81.4	77.7	75.8	73.4	66.1	56.9	51.4	12.2
2000	529	2230	67.1	78.7	76.1	71.9	70.5	65.2	55.7	48.3	11.6
2000	529	2245	67.4	84.4	76.9	73.0	70.7	64.3	52.9	46.8	17.0
2000	529	2300	67.5	80.5	76.7	73.5	71.5	64.0	52.3	45.8	13.0
2000	529	2315	65.9	77.6	74.1	71.6	70.3	62.4	51.8	42.5	11.7
2000	529	2330	65.6	78.5	75.6	71.0	69.6	60.7	50.7	43.6	12.9
2000	529	2345	65.6	82.3	76.8	72.4	68.7	57.9	46.9	37.8	16.7
2000	529	0	65.0	79.3	77.5	71.9	68.3	55.8	43.6	38.7	14.3

DAY 3	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**71.0**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**67.2**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**72.0**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**68.4**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**74.2**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**62.6**	dB(A)

17 Barila Place, Bonnyrigg Heights — DAY 4

Tuesday 30 May 2000 — RT&A S/N 65

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	529	2215	69.2	81.4	77.7	75.8	73.4	66.1	56.9	51.4	12.2
2000	529	2230	67.1	78.7	76.1	71.9	70.5	65.2	55.7	48.3	11.6
2000	529	2245	67.4	84.4	76.9	73.0	70.7	64.3	52.9	46.8	17.0
2000	529	2300	67.5	80.5	76.7	73.5	71.5	64.0	52.3	45.8	13.0
2000	529	2315	65.9	77.6	74.1	71.6	70.3	62.4	51.8	42.5	11.7
2000	529	2330	65.6	78.5	75.6	71.0	69.6	60.7	50.7	43.6	12.9
2000	529	2345	65.6	82.3	76.8	72.4	68.7	57.9	46.9	37.8	16.7
2000	529	0	65.0	79.3	77.5	71.9	68.3	55.8	43.6	38.7	14.3
2000	530	15	63.5	80.4	76.1	69.4	67.2	53.5	42.6	36.7	16.9
2000	530	30	65.3	80.7	76.9	71.7	69.4	57.3	41.2	35.8	15.4
2000	530	45	63.8	78.5	75.6	71.7	67.9	53.3	41.5	36.1	14.7
2000	530	100	63.1	81.1	75.9	68.7	66.3	52.4	43.5	38.4	18.0
2000	530	115	63.7	80.1	76.9	71.5	65.6	49.6	41.4	36.9	16.4
2000	530	130	61.8	78.4	74.4	69.2	66.0	48.4	41.2	37.5	16.6
2000	530	145	63.1	77.1	75.1	71.2	67.1	50.2	41.0	36.2	14.0
2000	530	200	64.9	78.8	76.7	73.9	68.8	50.6	40.0	34.5	13.9
2000	530	215	63.9	78.2	75.0	71.2	68.4	53.5	41.0	37.3	14.3
2000	530	230	63.7	81.0	77.1	70.8	66.6	49.2	40.9	36.3	17.3
2000	530	245	65.4	85.1	78.7	71.9	68.1	50.9	41.6	38.0	19.7
2000	530	300	59.9	76.9	73.5	67.1	62.8	45.7	38.7	35.3	17.0
2000	530	315	63.9	80.3	77.7	71.2	65.5	49.1	38.4	34.4	16.4
2000	530	330	68.0	87.4	79.3	74.6	71.8	55.6	41.1	35.4	19.4
2000	530	345	65.7	83.2	79.5	71.5	66.7	52.5	42.1	35.7	17.5
2000	530	400	63.8	84.1	76.4	69.5	66.1	50.6	43.6	37.9	20.3
2000	530	415	64.6	82.5	77.0	71.3	68.2	53.4	39.5	36.2	17.9
2000	530	430	68.9	79.9	78.0	75.9	74.1	63.7	52.6	44.8	11.0
2000	530	445	67.1	79.2	76.8	74.2	71.3	62.0	53.6	45.2	12.1
2000	530	500	66.6	85.3	76.3	72.8	70.9	60.7	49.2	40.8	18.7
2000	530	515	68.9	84.2	78.6	75.5	73.0	65.1	54.5	48.2	15.3
2000	530	530	70.2	81.9	78.5	75.2	73.8	68.4	60.3	51.1	11.7
2000	530	545	71.5	82.6	78.6	76.5	75.1	70.1	62.6	51.6	11.1
2000	530	600	71.8	87.3	79.1	76.2	74.7	70.0	65.0	58.3	15.5
2000	530	615	71.4	81.8	77.4	75.4	74.3	70.6	66.5	60.6	10.4
2000	530	630	72.2	82.9	78.9	76.5	75.0	71.2	68.3	64.9	10.7
2000	530	645	71.8	86.6	79.7	75.8	74.5	70.6	67.3	64.9	14.8
2000	530	700	70.9	84.8	78.7	75.5	74.0	69.6	64.8	58.7	13.9
2000	530	715	70.6	81.5	78.4	75.1	73.8	69.4	62.8	59.6	10.9
2000	530	730	71.5	87.1	80.1	75.9	74.3	69.3	63.8	59.9	15.6
2000	530	745	71.8	85.2	78.7	75.7	74.3	70.9	67.1	61.1	13.4
2000	530	800	70.0	79.5	77.0	74.4	73.1	69.1	63.7	59.4	9.5
2000	530	815	72.3	92.7	85.7	75.5	73.0	67.1	60.8	57.3	20.4
2000	530	830	70.9	83.2	78.8	75.7	74.3	69.3	65.5	61.1	12.3
2000	530	845	70.1	81.0	76.5	74.6	72.9	69.2	65.1	59.5	10.9
2000	530	900	72.3	85.5	79.8	76.6	75.1	70.9	67.1	59.7	13.2
2000	530	915	71.6	82.4	79.5	76.2	74.8	70.2	64.1	54.4	10.8
2000	530	930	73.0	88.3	80.6	77.3	76.0	71.4	67.0	60.0	15.3
2000	530	945	73.7	87.5	81.6	78.4	77.1	71.7	66.1	55.8	13.8
2000	530	1000	72.5	80.8	79.4	77.5	75.9	71.4	65.1	54.4	8.3
2000	530	1015	73.8	88.7	82.3	78.1	76.9	71.8	66.9	60.8	14.9
2000	530	1030	72.9	86.2	81.5	77.6	76.3	70.9	65.0	56.6	13.3
2000	530	1045	74.0	92.8	82.0	77.9	76.4	71.2	65.5	55.5	18.8
2000	530	1100	72.4	84.8	79.4	77.0	75.9	70.8	65.5	57.1	12.4
2000	530	1115	72.4	83.0	79.5	77.3	75.9	70.9	64.3	53.7	10.6
2000	530	1130	73.5	81.9	80.1	78.1	76.8	72.4	66.7	54.3	8.4
2000	530	1145	73.7	86.7	81.4	78.2	76.9	72.1	65.2	57.7	13.0
2000	530	1200	72.7	82.8	80.3	77.7	76.0	71.1	64.8	56.3	10.1
2000	530	1215	76.1	96.1	87.0	79.1	77.7	71.4	64.5	55.4	20.0
2000	530	1230	73.3	85.9	81.9	78.1	76.6	71.3	65.6	55.7	12.6
2000	530	1245	73.0	82.8	80.1	78.0	76.6	71.4	65.6	55.0	9.8
2000	530	1300	72.5	82.8	79.9	78.0	76.9	70.1	62.8	53.6	10.3
2000	530	1315	73.6	88.1	82.5	78.4	76.8	71.6	64.8	54.3	14.5
2000	530	1330	73.5	89.4	81.0	78.7	77.2	71.3	66.1	54.6	15.9
2000	530	1345	72.1	85.8	78.6	76.6	75.6	70.5	64.9	56.3	13.7
2000	530	1400	73.0	89.4	80.3	77.7	76.2	71.2	65.7	55.2	16.4
2000	530	1415	72.4	86.7	79.4	77.1	75.7	71.1	65.1	57.3	14.3
2000	530	1430	73.6	87.9	82.1	78.6	77.0	71.8	63.5	55.5	14.3
2000	530	1445	73.8	90.4	83.4	78.0	76.2	71.7	67.0	56.9	16.6
2000	530	1500	72.8	85.3	79.9	77.3	75.8	71.7	68.1	61.5	12.5
2000	530	1515	75.5	97.8	84.9	77.6	75.9	71.2	67.1	58.9	22.3
2000	530	1530	70.9	85.2	78.8	75.5	74.1	69.4	65.6	60.0	14.3
2000	530	1545	73.2	90.2	84.3	78.4	75.7	69.6	66.3	62.9	17.0
2000	530	1600	71.2	90.6	79.6	75.5	73.8	69.4	64.2	56.1	19.4
2000	530	1615	71.2	95.7	76.6	74.2	73.0	68.9	64.6	59.2	24.5
2000	530	1630	71.6	91.7	81.3	76.0	74.5	69.1	65.2	60.7	20.1
2000	530	1645	73.5	94.6	84.3	79.4	76.2	69.7	64.8	58.3	21.1
2000	530	1700	70.4	82.7	77.9	75.5	73.7	68.8	65.1	59.1	12.3
2000	530	1715	70.7	87.4	78.3	74.6	73.2	69.5	65.4	60.1	16.7
2000	530	1730	70.3	80.0	78.1	75.4	73.5	68.9	64.7	57.2	9.7
2000	530	1745	71.6	92.1	81.1	75.8	74.1	69.2	65.5	60.0	20.5
2000	530	1800	71.9	92.6	80.1	77.2	75.3	69.2	65.3	59.7	20.7
2000	530	1815	70.1	82.7	78.4	75.1	73.0	68.5	64.8	59.8	12.6
2000	530	1830	71.7	87.1	79.3	75.9	74.1	70.3	66.3	55.0	15.4
2000	530	1845	70.8	80.5	78.0	75.5	74.0	69.8	63.7	52.7	9.7
2000	530	1900	70.7	81.4	78.4	75.7	73.9	69.4	62.8	56.2	10.7
2000	530	1915	73.4	92.6	84.6	76.9	74.6	69.7	63.8	57.0	19.2
2000	530	1930	71.2	88.4	81.1	76.3	74.0	68.8	60.0	50.2	17.2
2000	530	1945	68.7	81.2	76.4	73.4	71.8	67.4	59.7	51.9	12.5
2000	530	2000	70.3	83.3	81.4	75.9	73.1	67.3	59.9	50.9	13.0
2000	530	2015	69.2	83.2	77.0	73.3	72.0	68.0	60.9	53.5	14.0
2000	530	2030	70.1	80.1	78.3	75.8	73.6	68.4	60.2	53.0	10.0
2000	530	2045	69.4	79.3	77.9	74.8	73.0	67.4	58.5	50.2	9.9
2000	530	2100	71.4	90.8	81.7	75.7	73.4	68.7	59.9	51.6	19.4
2000	530	2115	69.7	79.8	77.1	74.6	73.1	68.6	58.9	51.1	10.1
2000	530	2130	68.5	80.4	75.8	72.5	71.5	67.7	59.9	49.3	11.9
2000	530	2145	68.8	79.8	77.0	73.5	72.0	67.1	59.4	50.3	11.0
2000	530	2200	69.9	91.7	80.5	73.9	71.4	66.2	55.0	48.2	21.8
2000	530	2215	69.1	79.9	76.9	75.1	73.3	67.0	56.0	46.5	10.8
2000	530	2230	68.6	81.3	78.0	73.9	71.8	66.5	58.0	47.0	12.7
2000	530	2245	71.6	92.4	81.7	76.1	73.5	66.7	55.9	46.1	20.8
2000	530	2300	66.8	79.2	75.7	72.5	70.7	64.1	49.4	40.9	12.4
2000	530	2315	68.0	85.1	77.7	73.3	71.2	64.7	54.5	44.9	17.1
2000	530	2330	67.5	85.5	77.9	73.2	70.8	63.3	50.0	42.4	18.0
2000	530	2345	67.0	82.5	77.9	74.1	70.7	61.3	48.8	42.5	15.5
2000	530	0	66.0	83.6	78.4	71.8	68.9	57.3	43.6	38.9	17.6

DAY 4	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**71.0**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**66.6**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**72.2**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**67.6**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**74.4**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**60.8**	dB(A)

17 Barila Place, Bonnyrigg Heights — DAY 5

Wednesday 31 May 2000 — RT&A S/N 65

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	530	2215	69.1	79.9	76.9	75.1	73.3	67.0	56.0	46.5	10.8
2000	530	2230	68.6	81.3	78.0	73.9	71.8	66.5	58.0	47.0	12.7
2000	530	2245	71.6	92.4	81.7	76.1	73.5	66.7	55.9	46.1	20.8
2000	530	2300	66.8	79.2	75.7	72.5	70.7	64.1	49.4	40.9	12.4
2000	530	2315	68.0	85.1	77.7	73.3	71.2	64.7	54.5	44.9	17.1
2000	530	2330	67.5	85.5	77.9	73.2	70.8	63.3	50.0	42.4	18.0
2000	530	2345	67.0	82.5	77.9	74.1	70.7	61.3	48.8	42.5	15.5
2000	530	0	66.0	83.6	78.4	71.8	68.9	57.3	43.6	38.9	17.6
2000	531	15	62.9	77.5	73.5	69.2	67.1	55.1	40.9	36.6	14.6
2000	531	30	64.4	78.7	76.6	71.4	68.0	55.0	43.6	36.7	14.3
2000	531	45	62.4	82.0	75.2	68.1	65.2	52.3	38.3	34.3	19.6
2000	531	100	64.5	77.8	76.4	72.5	68.6	52.6	40.7	36.5	13.3
2000	531	115	65.1	84.8	79.5	70.9	65.6	46.3	38.2	35.7	19.7
2000	531	130	63.4	80.5	75.9	70.4	67.4	50.8	38.6	35.5	17.1
2000	531	145	65.6	81.1	79.2	72.9	67.7	52.9	36.7	34.2	15.5
2000	531	200	62.6	80.7	76.2	68.7	65.0	47.7	36.8	33.6	18.1
2000	531	215	61.1	78.3	72.9	67.9	65.7	47.2	36.2	33.9	17.2
2000	531	230	65.6	79.6	77.1	73.6	70.1	54.0	42.8	37.1	14.0
2000	531	245	63.3	80.4	76.2	69.9	66.8	48.9	40.0	36.0	17.1
2000	531	300	66.4	80.3	77.4	74.7	71.8	53.1	45.2	39.4	13.9
2000	531	315	65.8	79.7	77.5	74.1	70.4	51.6	43.0	37.3	13.9
2000	531	330	63.3	77.5	75.3	71.2	67.9	48.8	38.5	35.7	14.2
2000	531	345	67.9	83.8	79.1	75.7	72.4	56.3	45.6	39.7	15.9
2000	531	400	62.2	78.3	75.4	69.2	65.6	48.5	39.9	37.4	16.1
2000	531	415	62.3	79.0	75.2	68.8	66.4	50.2	41.0	38.8	16.7
2000	531	430	68.4	86.1	79.1	75.4	71.9	61.9	47.5	40.3	17.7
2000	531	445	69.5	83.4	79.2	76.7	74.2	63.7	51.1	42.6	13.9
2000	531	500	69.7	85.5	79.6	76.0	73.6	65.1	53.7	46.4	15.8
2000	531	515	69.9	81.8	78.5	75.9	74.5	66.0	53.9	45.6	11.9
2000	531	530	71.2	82.2	78.3	76.2	75.0	70.0	58.5	49.8	11.0
2000	531	545	72.6	85.1	80.1	77.2	75.6	71.4	65.4	54.2	12.5
2000	531	600	71.7	81.4	78.5	76.4	75.0	70.5	64.9	55.2	9.7
2000	531	615	73.3	89.7	81.4	77.7	76.3	71.8	67.4	54.0	16.4
2000	531	630	72.7	82.1	79.1	77.2	75.9	71.6	67.6	60.4	9.4
2000	531	645	72.1	85.3	81.0	76.6	74.9	70.4	66.3	59.3	13.2
2000	531	700	75.3	88.0	80.2	77.3	76.3	71.6	67.8	61.9	12.7
2000	531	715	75.2	86.4	83.4	76.4	75.0	70.9	66.2	60.7	11.2
2000	531	730	72.6	84.5	80.1	77.1	75.4	71.4	67.4	62.5	11.9
2000	531	745	72.6	84.9	80.8	77.4	75.7	70.8	66.7	61.7	12.3
2000	531	800	72.6	88.0	79.3	76.7	75.4	71.3	68.5	63.7	15.4
2000	531	815	72.3	80.8	78.8	76.3	75.0	71.5	68.5	63.5	8.5
2000	531	830	71.9	87.0	79.4	76.1	74.5	70.6	66.9	61.7	15.1
2000	531	845	72.9	87.8	81.5	77.9	76.0	70.9	67.2	61.1	14.9
2000	531	900	71.3	87.2	78.9	75.4	74.2	69.8	65.5	60.5	15.9
2000	531	915	72.5	85.3	80.9	77.3	75.7	71.0	65.4	53.5	12.8
2000	531	930	73.1	88.2	80.8	77.3	76.1	71.4	65.1	55.0	15.1
2000	531	945	73.6	91.0	83.8	77.7	76.0	71.1	66.1	55.5	17.4
2000	531	1000	72.2	87.0	79.7	76.9	75.3	70.5	66.3	55.5	14.8
2000	531	1015	72.9	86.7	80.5	77.8	76.3	71.1	65.2	56.3	13.8
2000	531	1030	72.6	86.6	80.5	77.8	76.4	71.3	65.3	56.3	14.0
2000	531	1045	72.9	87.5	80.4	77.9	76.5	71.9	65.0	55.9	14.6
2000	531	1100	73.6	90.3	81.2	77.9	76.4	71.7	64.4	56.2	16.7
2000	531	1115	72.3	82.2	79.6	77.1	75.8	70.6	64.8	58.2	9.9
2000	531	1130	73.4	87.1	81.2	78.5	77.4	70.9	65.4	58.3	13.7
2000	531	1145	73.6	88.9	80.9	78.4	77.1	72.1	66.8	60.9	15.3
2000	531	1200	72.7	85.7	80.3	77.4	75.7	71.2	66.9	61.8	13.0
2000	531	1215	71.9	83.6	78.9	76.7	75.4	70.6	65.1	60.3	11.7
2000	531	1230	72.6	81.8	78.8	77.0	75.8	71.5	66.7	59.4	9.2
2000	531	1245	73.3	81.8	78.8	77.4	75.9	74.5	69.9	60.0	8.5
2000	531	1300	72.9	81.2	78.2	77.3	76.6	74.3	66.2	59.8	8.3
2000	531	1315	73.6	82.6	78.3	77.4	75.8	72.1	66.8	55.8	9.0
2000	531	1330	73.2	82.2	77.9	76.5	75.9	73.3	66.4	60.7	9.0
2000	531	1345	73.1	81.8	78.6	76.8	76.1	73.9	65.1	59.9	8.7
2000	531	1400	73.5	81.4	78.4	77.0	76.0	74.1	65.8	57.7	7.9
2000	531	1415	72.9	82.9	77.6	77.2	76.2	74.4	66.9	57.3	10.0
2000	531	1430	72.8	82.3	79.2	77.8	75.4	73.6	67.1	56.6	9.5
2000	531	1445	73.0	81.8	79.1	77.3	75.6	71.3	67.6	59.3	8.8
2000	531	1500	71.6	81.9	78.7	75.9	74.7	70.3	67.0	58.8	10.3
2000	531	1515	71.5	82.2	78.0	76.2	75.2	70.0	65.4	59.3	10.7
2000	531	1530	69.3	80.0	76.7	74.3	72.5	67.6	62.6	57.8	10.7
2000	531	1545	69.4	79.8	77.4	74.2	72.6	67.9	63.5	60.4	10.4
2000	531	1600	70.4	80.6	77.4	74.7	73.6	69.1	64.8	61.2	10.2
2000	531	1615	69.5	84.0	78.2	74.7	72.7	67.5	61.5	57.0	14.5
2000	531	1630	69.9	87.5	77.8	73.7	72.3	67.8	63.2	56.5	17.6
2000	531	1645	70.5	83.3	78.9	75.9	73.7	68.6	64.4	59.4	12.8
2000	531	1700	70.0	81.6	78.2	75.5	73.3	68.1	63.5	57.0	11.6
2000	531	1715	70.6	83.8	78.9	75.0	73.6	69.0	63.9	58.4	13.2
2000	531	1730	69.3	82.4	77.7	74.4	72.4	67.9	63.9	59.7	13.1
2000	531	1745	69.1	81.3	77.4	74.4	72.0	67.4	61.8	54.9	12.2
2000	531	1800	69.7	84.4	77.9	75.1	72.9	67.7	63.0	56.8	14.7
2000	531	1815	69.2	84.9	77.2	73.6	72.0	67.8	63.7	60.0	15.7
2000	531	1830	70.7	80.2	78.0	75.5	74.0	69.6	64.7	56.0	9.5
2000	531	1845	70.9	85.3	79.6	75.0	73.0	69.7	64.1	55.4	14.4
2000	531	1900	71.5	90.9	80.4	75.4	73.2	69.1	63.8	54.9	19.4
2000	531	1915	72.2	90.7	84.6	75.9	73.4	68.7	62.9	51.9	18.5
2000	531	1930	69.8	80.8	77.0	74.2	72.4	69.0	63.4	55.7	11.0
2000	531	1945	72.6	88.2	84.3	77.0	75.0	69.2	64.1	56.4	15.6
2000	531	2000	69.6	80.0	76.8	74.3	72.8	68.3	61.4	53.8	10.4
2000	531	2015	69.5	86.1	77.7	74.1	72.8	67.5	61.5	51.4	16.6
2000	531	2030	69.2	84.9	78.5	73.2	72.0	67.6	58.9	51.5	15.7
2000	531	2045	68.8	79.1	77.2	74.1	72.1	67.2	58.5	50.8	10.3
2000	531	2100	68.9	87.1	77.0	72.7	71.5	66.4	56.3	50.2	18.2
2000	531	2115	70.1	88.0	77.9	75.2	73.1	67.6	60.1	50.9	17.9
2000	531	2130	68.5	78.7	76.7	73.8	72.1	66.8	57.2	49.6	10.2
2000	531	2145	68.3	78.3	76.6	73.4	71.6	66.7	59.0	49.5	10.0
2000	531	2200	68.8	84.0	78.9	74.0	71.7	66.4	56.1	48.7	15.2
2000	531	2215	68.3	80.5	77.6	73.1	71.4	66.5	57.4	50.6	12.2
2000	531	2230	67.5	78.9	76.4	72.1	70.9	65.8	57.8	46.2	11.4
2000	531	2245	69.1	80.7	78.4	75.3	72.9	66.2	55.6	46.7	11.6
2000	531	2300	66.9	81.2	77.1	72.5	69.9	63.5	52.4	44.3	14.3
2000	531	2315	67.6	79.7	77.0	72.7	71.0	65.5	55.1	46.3	12.1
2000	531	2330	67.5	79.7	77.5	73.5	70.9	64.3	53.9	46.1	12.2
2000	531	2345	66.2	82.0	77.1	72.3	69.8	61.0	50.0	45.6	15.8
2000	531	0	68.0	87.1	79.0	73.9	70.3	61.3	49.5	40.4	19.1

DAY 5	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**70.9**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**67.5**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**71.8**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**68.8**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**74.1**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**61.5**	dB(A)

17 Barila Place, Bonnyrigg Heights									DAY 6		
Thursday 1 June 2000									RT&A S/N 65		
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	531	2215	68.3	80.5	77.6	73.1	71.4	66.5	57.4	50.6	12.2
2000	531	2230	67.5	78.9	76.4	72.1	70.9	65.8	57.8	46.2	11.4
2000	531	2245	69.1	80.7	78.4	75.3	72.9	66.2	55.6	46.7	11.6
2000	531	2300	66.9	81.2	77.1	72.5	69.9	63.5	52.4	44.3	14.3
2000	531	2315	67.6	79.7	77.0	72.7	71.0	65.5	55.1	46.3	12.1
2000	531	2330	67.5	79.7	77.5	73.5	70.9	64.3	53.9	46.1	12.2
2000	531	2345	66.2	82.0	77.1	72.3	69.8	61.0	50.0	45.6	15.8
2000	531	0	68.0	87.1	79.0	73.9	70.3	61.3	49.5	40.4	19.1
2000	601	15	62.3	77.3	72.7	68.4	66.6	56.5	44.1	37.0	15.0
2000	601	30	64.6	82.3	77.0	69.9	67.7	58.8	49.2	40.4	17.7
2000	601	45	63.6	83.5	75.0	69.0	66.9	54.3	42.0	36.2	19.9
2000	601	100	65.6	84.1	77.8	73.2	68.5	53.7	41.8	36.6	18.5
2000	601	115	64.3	81.3	77.2	70.1	66.9	54.3	41.9	36.8	17.0
2000	601	130	63.7	81.9	75.9	70.4	67.1	51.1	40.2	36.1	18.2
2000	601	145	63.8	82.1	77.5	69.2	66.5	50.4	36.5	33.5	18.3
2000	601	200	64.9	79.5	77.0	72.7	68.6	50.6	40.1	35.9	14.6
2000	601	215	64.0	81.8	76.5	69.6	67.0	52.9	37.7	33.0	17.8
2000	601	230	63.5	83.3	76.2	68.9	66.1	48.0	39.1	35.6	19.8
2000	601	245	66.0	79.2	76.9	73.9	70.2	56.3	45.3	38.3	13.2
2000	601	300	65.6	81.3	76.6	73.7	70.1	54.6	42.3	36.8	15.7
2000	601	315	62.2	78.0	75.3	69.5	66.3	48.2	38.7	35.0	15.8
2000	601	330	67.0	78.8	76.7	74.2	72.0	60.9	49.2	42.0	11.8
2000	601	345	64.0	80.9	75.6	71.0	67.4	56.9	46.8	40.9	16.9
2000	601	400	64.6	78.4	76.1	72.4	68.9	54.2	43.7	40.0	13.8
2000	601	415	65.6	79.8	77.8	72.7	69.8	55.7	44.3	38.4	14.2
2000	601	430	68.6	84.7	78.6	75.5	72.2	64.2	52.9	42.5	16.1
2000	601	445	69.3	86.0	79.3	75.9	73.9	63.9	52.6	47.0	16.7
2000	601	500	69.4	87.2	79.1	75.9	73.3	64.5	53.8	47.2	17.8
2000	601	515	70.2	85.5	79.5	76.7	74.1	66.4	56.2	49.1	15.3
2000	601	530	73.2	92.1	83.7	78.0	75.4	70.0	63.7	55.5	18.9
2000	601	545	72.1	82.7	77.9	76.3	75.2	71.2	67.4	60.0	10.6
2000	601	600	72.0	86.6	79.1	76.2	75.3	70.5	64.7	57.5	14.6
2000	601	615	73.0	91.0	82.1	77.8	76.2	71.2	67.3	60.6	18.0
2000	601	630	73.2	90.1	79.8	76.9	75.5	71.7	68.7	64.1	16.9
2000	601	645	72.9	84.6	79.7	77.3	75.7	71.7	68.6	63.5	11.7
2000	601	700	71.5	83.9	78.3	75.5	74.2	70.6	65.7	52.6	12.4
2000	601	715	71.6	85.3	78.3	76.2	74.8	70.3	66.2	58.7	13.7
2000	601	730	71.8	81.7	78.7	76.4	75.0	70.5	66.3	59.2	9.9
2000	601	745	71.3	79.1	77.3	75.2	74.1	70.5	67.6	59.2	7.8
2000	601	800	71.9	86.4	79.2	76.0	74.6	70.6	67.0	62.4	14.5
2000	601	815	71.2	90.4	80.8	75.2	73.8	69.0	63.7	57.7	19.2
2000	601	830	70.9	82.9	77.1	75.1	73.8	70.1	66.2	58.7	12.0
2000	601	845	71.9	85.9	82.4	76.4	74.3	69.9	66.1	60.9	14.0
2000	601	900	71.7	84.2	79.7	76.5	75.0	70.0	65.7	56.4	12.5
2000	601	915	71.6	84.3	79.0	75.8	74.6	70.4	66.4	61.1	12.7
2000	601	930	71.8	83.9	79.0	76.2	75.1	70.4	64.2	57.9	12.1
2000	601	945	72.1	84.5	78.9	76.7	75.4	70.7	64.9	58.6	12.4
2000	601	1000	72.3	84.7	80.4	77.7	75.7	70.5	65.0	55.0	12.4
2000	601	1015	71.6	86.7	80.2	76.7	75.1	69.4	62.0	51.9	15.1
2000	601	1030	72.3	81.8	80.1	77.1	76.0	70.6	65.1	53.3	9.5
2000	601	1045	72.0	83.4	80.0	77.1	75.6	70.0	64.6	50.1	11.4
2000	601	1100	71.9	86.4	80.8	76.7	74.9	70.1	62.8	54.1	14.5
2000	601	1115	71.5	85.8	80.6	76.3	74.8	69.2	62.0	50.4	14.3
2000	601	1130	71.7	83.9	79.9	76.8	75.1	69.6	64.7	55.8	12.2
2000	601	1145	72.5	89.4	79.8	77.1	75.9	70.4	64.3	52.1	16.9
2000	601	1200	71.6	85.1	80.2	77.0	75.0	69.4	63.1	52.7	13.5
2000	601	1215	72.3	85.7	80.6	77.4	75.8	70.0	63.8	54.9	13.4
2000	601	1230	72.2	85.6	80.8	77.3	75.7	70.0	62.0	51.9	13.4
2000	601	1245	73.6	91.2	81.7	78.1	76.8	71.2	65.3	56.9	17.6
2000	601	1300	71.3	81.0	77.9	76.4	75.0	69.8	62.6	52.1	9.7
2000	601	1315	71.7	85.0	80.1	77.0	75.3	69.3	63.9	54.9	13.3
2000	601	1330	71.1	81.0	78.8	76.3	74.7	69.8	64.4	49.6	9.9
2000	601	1345	71.4	83.3	79.0	76.4	75.2	69.1	63.8	57.1	11.9
2000	601	1400	71.9	87.9	81.4	76.7	74.8	69.7	62.2	53.6	16.0
2000	601	1415	71.4	80.1	78.1	76.3	74.7	70.1	65.7	60.2	8.7
2000	601	1430	72.4	89.9	80.7	77.0	75.4	69.7	65.4	57.7	17.5
2000	601	1445	72.0	84.9	80.1	76.7	75.0	70.3	66.3	61.4	12.9
2000	601	1500	71.0	85.5	79.0	75.8	74.3	69.4	64.2	53.6	14.5
2000	601	1515	71.8	88.9	79.6	76.9	75.4	69.4	65.9	58.6	17.1
2000	601	1530	73.4	87.5	83.0	81.3	78.1	67.5	63.1	56.6	14.1
2000	601	1545	68.5	88.4	75.9	73.0	71.4	67.1	63.0	57.7	19.9
2000	601	1600	69.4	86.4	76.2	74.1	72.7	67.9	63.4	60.1	17.0
2000	601	1615	70.4	87.7	78.3	75.0	73.5	68.7	63.9	56.7	17.3
2000	601	1630	69.0	83.1	77.5	74.2	72.0	67.1	62.8	56.5	14.1
2000	601	1645	72.4	93.4	79.6	75.1	73.5	67.7	62.9	56.9	21.0
2000	601	1700	68.0	78.2	76.2	73.1	71.3	66.5	62.0	55.1	10.2
2000	601	1715	67.9	81.5	75.0	72.9	71.1	66.4	62.4	56.1	13.6
2000	601	1730	68.8	80.9	76.6	73.3	71.9	67.3	62.6	56.8	12.1
2000	601	1745	68.1	81.1	75.8	72.3	70.6	67.0	61.9	55.7	13.0
2000	601	1800	69.0	80.1	77.4	74.3	72.3	67.2	62.2	56.9	11.1
2000	601	1815	68.2	80.9	75.7	72.5	71.1	67.0	62.1	56.7	12.7
2000	601	1830	70.4	84.1	80.4	75.4	72.8	68.1	61.9	54.9	13.7
2000	601	1845	71.5	88.1	78.7	75.2	73.8	70.8	66.4	57.5	16.6
2000	601	1900	71.4	87.3	78.7	75.8	74.1	70.2	65.3	54.5	15.9
2000	601	1915	73.0	93.2	84.7	74.4	72.5	68.9	62.7	49.4	20.2
2000	601	1930	70.0	79.9	77.3	74.6	73.1	69.0	64.0	55.3	9.9
2000	601	1945	69.9	80.0	77.6	75.3	73.1	68.5	62.2	53.7	10.1
2000	601	2000	69.9	80.8	77.5	74.9	73.2	68.6	60.5	52.2	10.9
2000	601	2015	69.6	84.7	78.2	73.8	72.2	67.7	61.9	52.7	15.1
2000	601	2030	69.1	82.7	78.1	74.1	72.3	67.3	58.7	51.1	13.6
2000	601	2045	69.6	85.8	78.8	73.7	72.2	67.6	58.0	50.5	16.2
2000	601	2100	69.6	88.0	77.1	74.5	73.0	67.6	59.0	49.6	18.4
2000	601	2115	69.9	86.0	79.9	73.9	72.1	68.2	61.9	53.4	16.1
2000	601	2130	69.0	84.0	77.1	73.8	72.2	67.6	60.2	50.6	15.0
2000	601	2145	68.8	78.6	76.8	73.6	71.7	67.5	62.1	54.9	9.8
2000	601	2200	68.8	83.0	78.1	73.7	71.5	67.2	59.3	52.7	14.2
2000	601	2215	68.0	79.7	77.7	73.7	71.2	65.6	56.4	45.4	11.7
2000	601	2230	68.8	79.1	77.7	74.2	71.9	66.9	57.7	48.6	10.3
2000	601	2245	68.2	79.0	76.6	74.2	72.2	65.5	55.3	49.3	10.8
2000	601	2300	68.2	81.8	78.6	74.3	71.5	65.0	53.0	44.9	13.6
2000	601	2315	68.2	85.5	77.1	74.0	71.0	65.7	55.0	47.0	17.3
2000	601	2330	66.6	79.7	76.3	73.0	70.2	63.0	51.8	44.8	13.1
2000	601	2345	67.0	80.5	77.1	72.9	70.2	63.7	52.4	43.9	13.5
2000	601	0	65.2	79.4	76.8	70.3	68.6	59.0	45.3	40.1	14.2

DAY 6	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**70.3**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**67.5**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**71.1**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**68.6**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**73.7**	dB(A)
Daytime	**minimum L90, 15 min**	between 07.00 and 18:00 hours	**61.9**	dB(A)

17 Barila Place, Bonnyrigg Heights — DAY 7

Friday 2 May 2000 — RT&A S/N 65

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	601	2215	68.0	79.7	77.7	73.7	71.2	65.6	56.4	45.4	11.7
2000	601	2230	68.8	79.1	77.7	74.2	71.9	66.9	57.7	48.6	10.3
2000	601	2245	68.2	79.0	76.6	74.2	72.2	65.5	55.3	49.3	10.8
2000	601	2300	68.2	81.8	78.6	74.3	71.5	65.0	53.0	44.9	13.6
2000	601	2315	68.2	85.5	77.1	74.0	71.0	65.7	55.0	47.0	17.3
2000	601	2330	66.6	79.7	76.3	73.0	70.2	63.0	51.8	44.8	13.1
2000	601	2345	67.0	80.5	77.1	72.9	70.2	63.7	52.4	43.9	13.5
2000	601	0	65.2	79.4	76.8	70.3	68.6	59.0	45.3	40.1	14.2
2000	602	15	65.5	79.8	75.9	71.7	69.4	59.8	48.6	40.7	14.3
2000	602	30	63.8	78.6	75.1	69.3	67.5	59.2	45.5	37.4	14.8
2000	602	45	64.8	81.8	76.2	70.5	68.1	59.1	45.4	37.4	17.0
2000	602	100	62.2	80.9	74.7	68.2	65.7	52.4	38.4	35.0	18.7
2000	602	115	63.8	78.7	74.9	69.6	67.4	57.2	43.2	36.7	14.9
2000	602	130	65.0	82.6	76.6	72 0	68.4	55.5	43.7	34.6	17.6
2000	602	145	65.2	80.8	78.0	72.7	69.1	53.5	43.3	36.6	15.6
2000	602	200	64.3	79.8	76.5	71.8	68.1	51.0	38.1	35.6	15.5
2000	602	215	63.5	80.7	76.0	70.4	67.6	51.9	40.9	35.3	17.2
2000	602	230	66.0	79.5	76.5	74.5	71.5	53.2	45.0	38.5	13.5
2000	602	245	60.1	76.5	74.3	67.1	63.5	43.4	38.2	34.7	16.4
2000	602	300	65.2	78.8	77.0	73.1	69.1	51.8	42.7	38.1	13.6
2000	602	315	65.6	81.9	78.1	72.5	69.5	53.2	41.7	37.8	16.3
2000	602	330	67.1	85.7	79.7	73.4	69.4	55.3	42.4	36.2	18.6
2000	602	345	63.2	78.3	74.4	70.3	67.7	54.6	43.0	38.3	15.1
2000	602	400	65.8	80.0	77.9	73.3	69.5	57.1	42.3	36.8	14.2
2000	602	415	67.1	80.8	78.6	74.3	71.0	59.1	47.2	39.3	13.7
2000	602	430	68.6	80.1	78.4	76.4	73.9	61.2	50.6	42.4	11.5
2000	602	445	70.4	89.2	81.3	76.0	73.8	64.2	49.7	42.4	18.8
2000	602	500	68.8	79.1	77.8	75.3	73.4	64.9	51.4	45.1	10.3
2000	602	515	69.8	81.5	79.2	76.1	74.0	65.9	55.1	42.7	11.7
2000	602	530	71.3	82.5	79.4	76.6	74.9	69.4	62.5	52.6	11.2
2000	602	545	72.1	82.6	79.4	76.7	75.2	71.0	65.7	57.9	10.5
2000	602	600	72.6	84.7	80.1	77.5	76.3	71.1	65.1	54.0	12.1
2000	602	615	72.4	80.5	78.4	76.6	75.3	71.6	67.7	57.5	8.1
2000	602	630	72.8	84.9	79.4	76.7	75.4	71.9	68.2	61.1	12.1
2000	602	645	72.7	83.4	79.3	77.0	76.0	71.4	67.1	57.5	10.7
2000	602	700	72.3	83.0	78.7	76.9	75.5	71.3	66.3	60.3	10.7
2000	602	715	71.9	85.6	79.3	76.4	75.1	70.4	64.2	57.4	13.7
2000	602	730	72.4	81.9	78.7	76.2	75.0	71.5	68.5	63.7	9.5
2000	602	745	72.3	82.4	78.9	76.7	75.3	71.4	67.6	61.9	10.1
2000	602	800	70.2	82.2	77.5	74.9	73.6	69.1	62.4	55.3	12.0
2000	602	815	72.3	90.2	80.3	76.3	74.6	70.1	65.3	60.1	17.9
2000	602	830	72.2	85.6	79.5	76.5	75.1	70.9	65.9	59.0	13.4
2000	602	845	71.8	84.7	80.2	76.7	74.6	70.2	67.3	59.7	12.9
2000	602	900	73.2	86.4	81.4	78.2	76.3	71.3	67.9	62.5	13.2
2000	602	915	71.5	83.1	78.8	76.6	75.1	69.7	63.4	56.5	11.6
2000	602	930	73.4	92.9	81.8	78.4	76.5	71.1	66.9	56.7	19.5
2000	602	945	73.0	89.3	82.7	77.9	76.2	70.5	64.8	58.4	16.3
2000	602	1000	72.2	85.2	79.9	76.9	75.6	70.6	63.1	53.6	13.0
2000	602	1015	72.2	87.8	78.5	76.8	75.5	71.0	65.9	56.3	15.6
2000	602	1030	72.8	83.3	81.4	78.1	76.2	70.9	65.1	53.2	10.5
2000	602	1045	75.7	94.3	88.2	79.3	77.1	71.3	67.6	57.4	18.6
2000	602	1100	70.8	83.4	77.8	75.4	74.0	69.7	64.3	57.3	12.6
2000	602	1115	73.0	91.2	81.8	77.4	75.6	71.0	65.9	56.6	18.2
2000	602	1130	71.5	85.2	79.2	76.6	74.8	70.0	63.8	52.2	13.7
2000	602	1145	71.3	82.0	78.2	76.3	75.1	69.7	63.7	53.6	10.7
2000	602	1200	72.4	87.0	81.6	77.5	75.9	69.9	65.1	54.0	14.6
2000	602	1215	71.6	86.6	79.7	76.0	74.4	69.5	63.8	57.3	15.0
2000	602	1230	71.0	83.2	77.8	75.5	74.3	69.7	65.8	55.5	12.2
2000	602	1245	70.5	79.7	77.3	75.4	73.9	69.4	62.8	55.3	9.2
2000	602	1300	70.7	83.1	78.2	75.4	74.1	69.4	63.2	54.5	12.4
2000	602	1315	71.1	87.9	79.2	75.6	74.2	69.3	63.7	56.5	16.8
2000	602	1330	72.5	88.0	82.3	77.1	75.1	69.9	64.1	53.4	15.5
2000	602	1345	71.1	86.1	78.6	75.9	74.2	69.7	64.5	57.2	15.0
2000	602	1400	71.1	84.4	78.2	75.6	74.3	70.0	62.1	48.7	13.3
2000	602	1415	71.4	83.9	79.0	75.9	74.5	70.1	64.5	54.6	12.5
2000	602	1430	71.5	84.0	78.8	75.5	74.3	71.6	65.7	56.5	12.5
2000	602	1445	71.6	83.9	78.4	75.0	74.6	73.4	68.7	61.7	12.3
2000	602	1500	71.9	84.1	77.0	76.0	74.0	74.3	68.8	61.5	12.2
2000	602	1515	72.4	84.4	76.8	75.8	73.4	68.9	64.8	57.5	12.0
2000	602	1530	70.1	83.9	76.7	74.9	72.3	66.9	63.4	59.6	13.8
2000	602	1545	70.5	84.6	76.8	75.5	72.9	67.4	63.6	55.3	14.1
2000	602	1600	69.3	79.5	76.5	74.3	72.9	67.6	62.9	57.4	10.2
2000	602	1615	68.6	79.1	76.6	73.9	72.0	66.9	61.5	57.1	10.5
2000	602	1630	68.9	84.4	77.8	74.6	72.6	66.5	62.2	54.6	15.5
2000	602	1645	68.5	77.0	75.2	73.0	71.7	67.4	63.2	55.9	8.5
2000	602	1700	69.9	81.8	78.1	74.1	72.3	68.7	64.9	58.7	11.9
2000	602	1715	68.9	81.5	76.4	73.5	71.9	67.6	62.4	53.9	12.6
2000	602	1730	67.8	84.1	76.0	72.6	70.7	66.1	61.8	57.0	16.3
2000	602	1745	67.1	77.1	74.8	71.4	69.8	66.0	61.9	55.9	10.0
2000	602	1800	68.3	82.7	77.4	73.0	71.0	66.6	61.3	57.0	14.4
2000	602	1815	67.8	76.7	74.6	71.8	70.5	67.1	63.0	57.8	8.9
2000	602	1830	67.4	80.7	75.6	71.3	70.2	66.0	60.3	52.9	13.3
2000	602	1845	69.7	80.3	77.3	74.1	72.3	68.5	65.4	56.6	10.6
2000	602	1900	69.3	83.7	77.0	74.1	71.8	68.2	63.1	54.4	14.4
2000	602	1915	69.2	78.6	75.7	73.4	72.1	68.5	62.7	50.9	9.4
2000	602	1930	69.7	79.9	76.8	73.8	72.1	68.8	64.5	57.1	10.2
2000	602	1945	69.6	79.1	77.0	74.3	72.6	68.6	60.5	50.7	9.5
2000	602	2000	70.9	88.6	83.1	74.5	72.4	67.9	61.2	52.2	17.7
2000	602	2015	69.2	81.2	77.5	74.1	72.0	67.8	60.6	50.4	12.0
2000	602	2030	68.3	80.8	75.7	72.7	71.1	67.3	61.1	49.5	12.5
2000	602	2045	68.9	82.1	76.8	73.7	72.1	67.2	61.3	52.6	13.2
2000	602	2100	67.6	78.1	75.1	72.1	70.7	66.4	58.9	52.1	10.5
2000	602	2115	67.7	80.9	75.0	71.8	70.5	66.7	57.9	50.0	13.2
2000	602	2130	67.3	80.4	74.6	71.6	70.2	66.4	57.5	49.5	13.1
2000	602	2145	67.7	77.8	75.6	72.1	71.1	66.4	59.1	50.3	10.1
2000	602	2200	67.5	77.2	75.3	73.0	71.4	65.7	58.0	50.6	9.7
2000	602	2215	67.2	79.3	76.2	72.0	70.5	65.3	55.8	47.1	12.1
2000	602	2230	68.8	79.7	77.1	74.7	72.4	66.7	57.2	50.3	10.9
2000	602	2245	67.5	78.0	75.3	72.3	71.2	66.2	55.9	47.1	10.5
2000	602	2300	68.6	79.6	76.6	73.0	71.6	67.2	60.8	52.8	11.0
2000	602	2315	68.2	79.8	77.2	74.0	71.5	65.8	55.9	45.0	11.6
2000	602	2330	66.9	81.3	75.2	71.5	70.4	65.2	56.9	47.0	14.4
2000	602	2345	66.8	85.4	75.4	70.8	69.8	64.1	54.6	46.3	18.6
2000	602	0	67.2	81.4	78.7	71.8	70.4	64.1	51.8	44.4	14.2

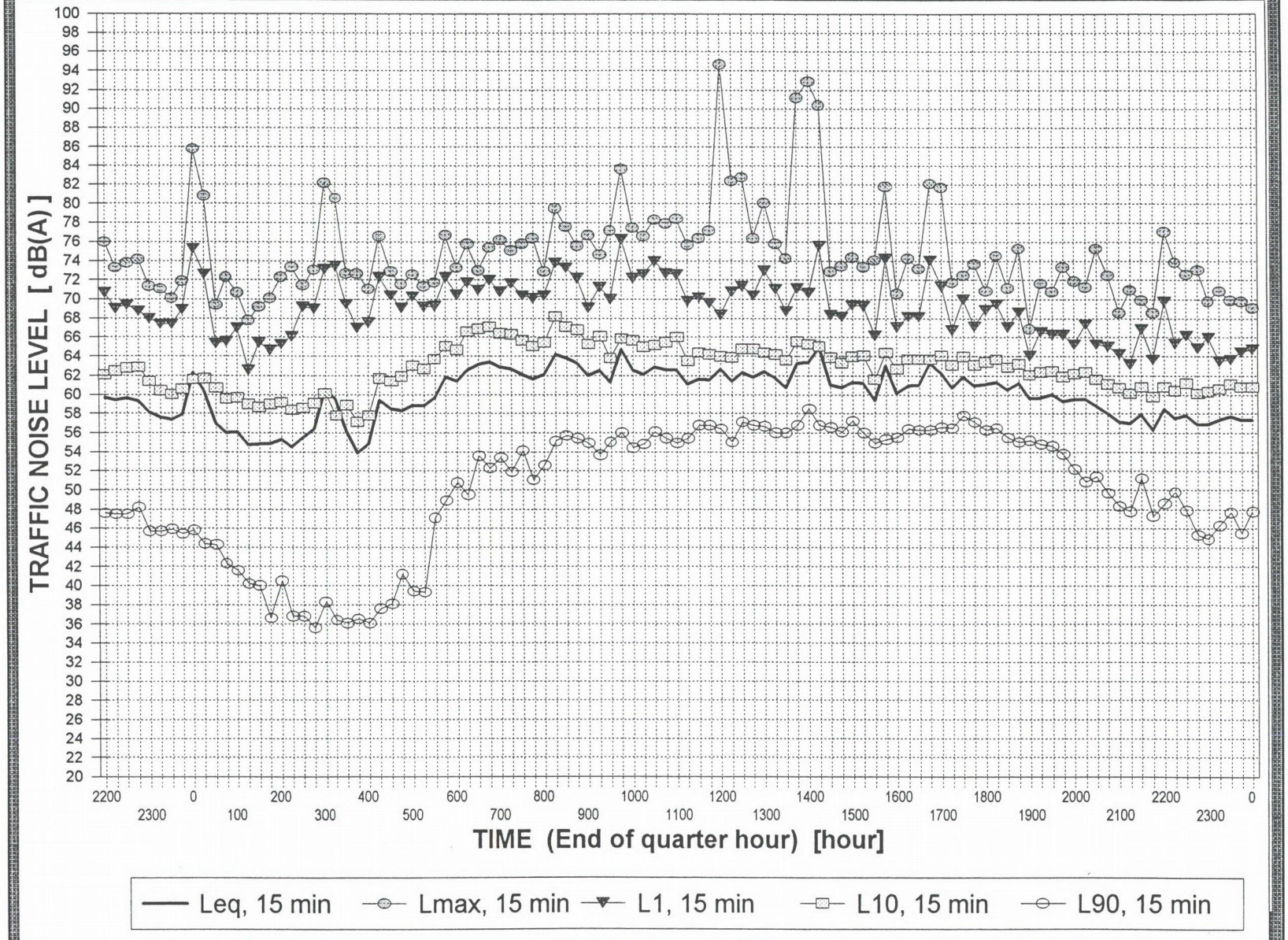
DAY 7	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**70.2**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**67.4**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**70.9**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**68.5**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**73.3**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**61.3**	dB(A)

54 Davina Crescent, Cecil Hills

DAY 1

Saturday 27 May 2000

RT&A S/N 81



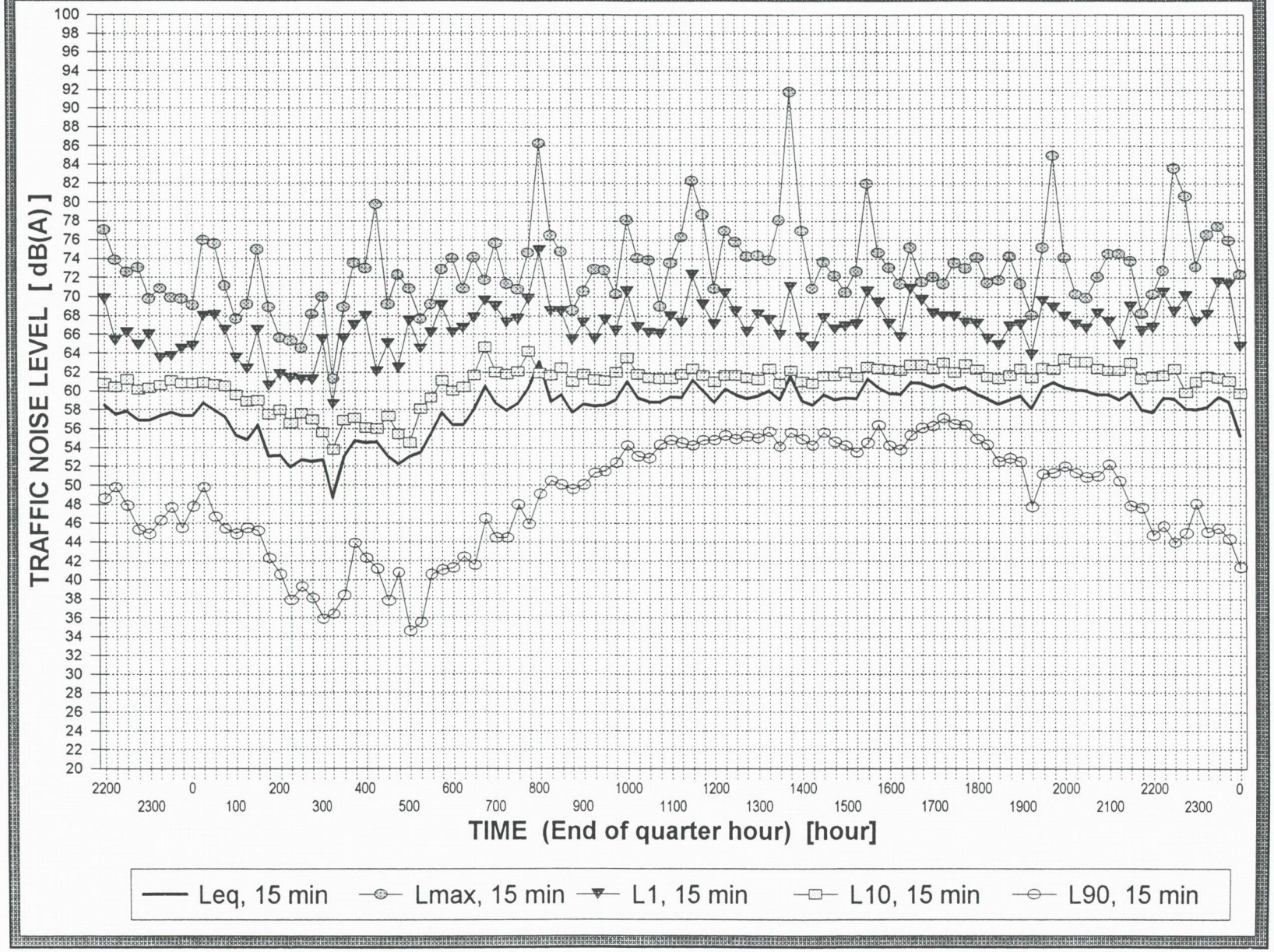
KOIKAS ACOUSTICS PTY LTD

54 Davina Crescent, Cecil Hills

DAY 2

Sunday 28 May 2000

RT&A S/N 81



KOIKAS ACOUSTICS PTY LTD

54 Davina Crescent, Cecil Hills

DAY 3

Monday 29 May 2000

RT&A S/N 81

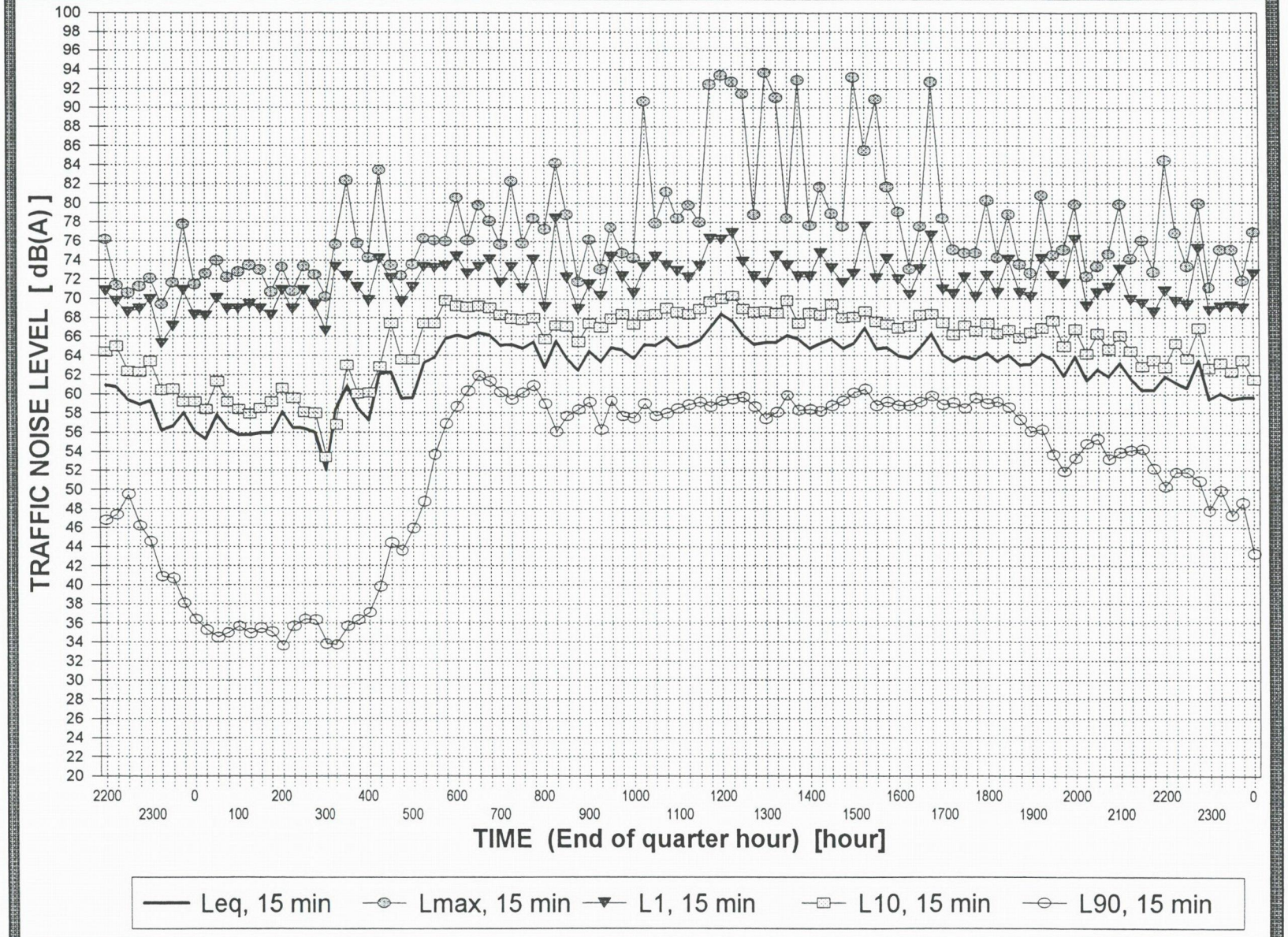
KOIKAS ACOUSTICS PTY LTD

54 Davina Crescent, Cecil Hills

DAY 4

Tuesday 30 May 2000

RT&A S/N 81



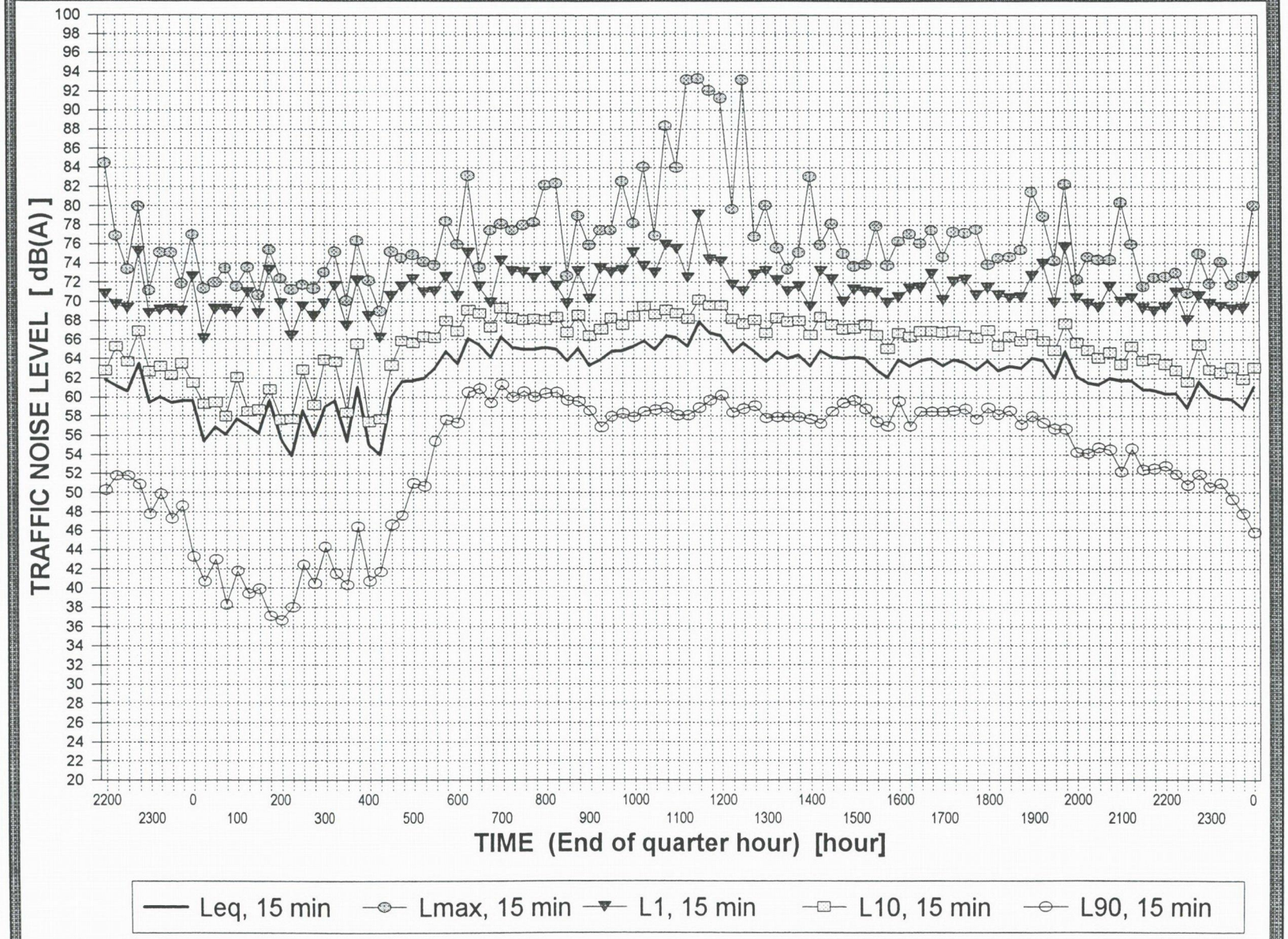
KOIKAS ACOUSTICS PTY LTD

54 Davina Crescent, Cecil Hills

DAY 5

Wednesday 31 May 2000

RT&A S/N 81



KOIKAS ACOUSTICS PTY LTD

54 Davina Crescent, Cecil Hills

DAY 6

Thursday 1 June 2000

RT&A S/N 81

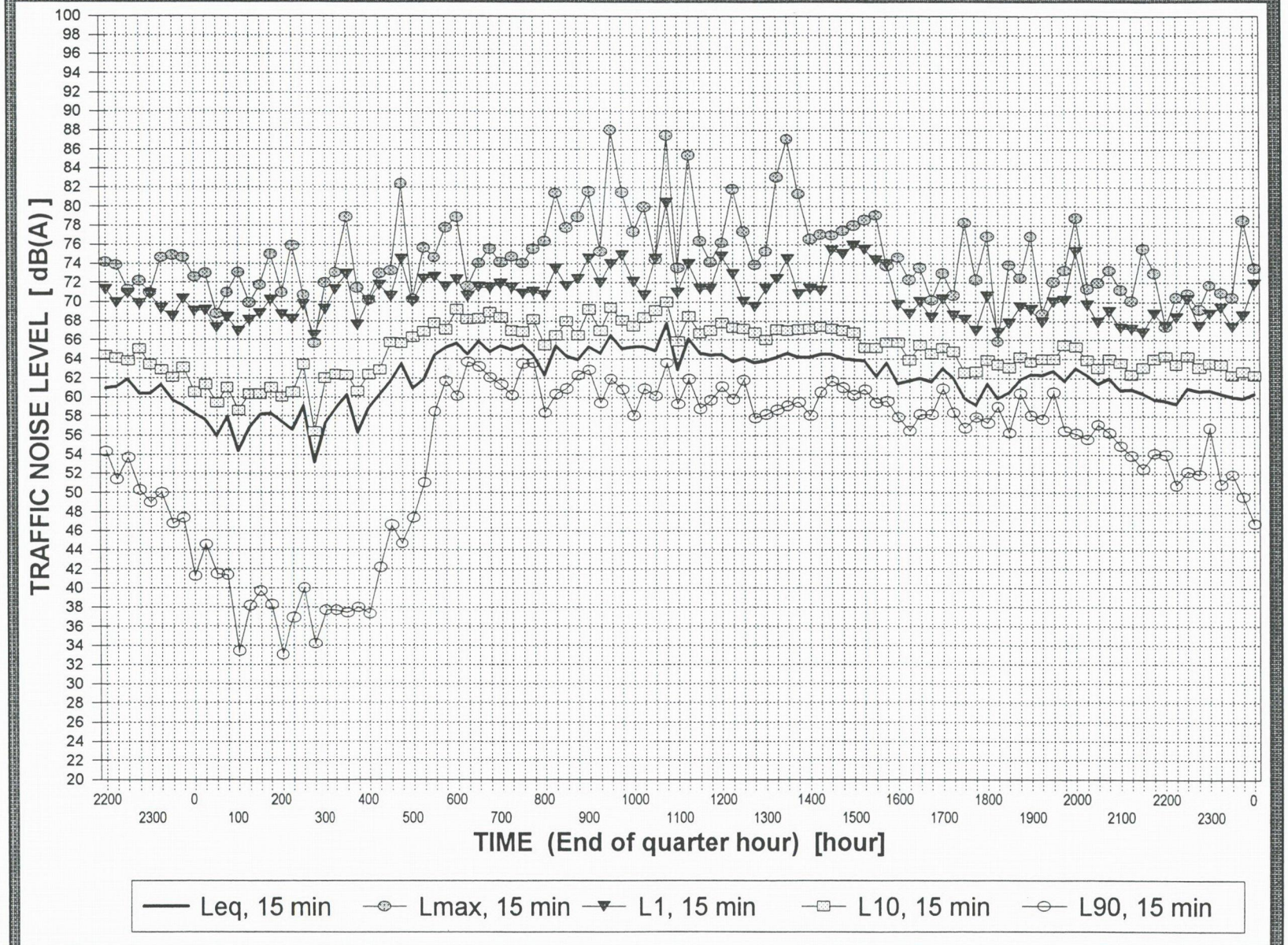
KOIKAS ACOUSTICS PTY LTD

54 Davina Crescent, Cecil Hills

DAY 7

Friday 2 June 2000

RT&A S/N 81



KOIKAS ACOUSTICS PTY LTD

54 Davina Crescent, Cecil Hills — DAY 1

Saturday 27 May 2000 — RT&A S/N 81

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	526	2215	59.4	73.3	69.0	64.6	62.5	57.0	47.5	37.6	13.9
2000	526	2230	59.6	73.8	69.4	65.3	62.8	56.5	47.5	40.6	14.2
2000	526	2245	59.3	74.2	68.8	66.3	62.9	56.2	48.2	42.5	14.9
2000	526	2300	58.1	71.4	68.0	63.2	61.4	55.8	45.7	36.6	13.3
2000	526	2315	57.6	71.1	67.4	62.3	60.4	55.3	45.7	38.1	13.5
2000	526	2330	57.3	70.1	67.4	61.4	60.0	55.6	45.9	39.4	12.8
2000	526	2345	57.9	71.9	68.9	62.6	60.6	55.0	45.4	38.2	14.0
2000	526	0	62.3	85.8	75.3	64.9	61.6	55.4	45.8	37.4	23.5
2000	527	15	60.3	80.8	72.6	65.2	61.7	55.9	44.4	37.5	20.5
2000	527	30	57.0	69.4	65.4	61.8	60.7	54.6	44.3	36.7	12.4
2000	527	45	56.0	72.3	65.6	61.3	59.6	52.4	42.3	37.0	16.3
2000	527	100	56.1	70.7	67.0	61.3	59.7	52.3	41.6	35.2	14.6
2000	527	115	54.7	67.8	62.6	60.5	59.0	51.3	40.2	34.9	13.1
2000	527	130	54.8	69.2	65.5	60.6	58.7	50.1	40.0	35.3	14.4
2000	527	145	54.8	70.1	64.7	60.6	59.0	49.5	36.6	32.3	15.3
2000	527	200	55.3	72.3	65.3	60.6	59.2	51.3	40.5	33.5	17.0
2000	527	215	54.5	73.4	66.1	60.2	58.4	47.0	36.8	32.9	18.9
2000	527	230	55.5	71.5	69.2	60.8	58.6	46.8	36.8	33.9	16.0
2000	527	245	56.4	73.1	69.0	62.9	59.1	45.1	35.6	33.3	16.7
2000	527	300	60.5	82.2	73.2	63.1	60.1	47.6	38.3	35.0	21.7
2000	527	315	59.5	80.6	73.5	61.2	57.8	42.6	36.4	33.4	21.1
2000	527	330	56.1	72.7	69.5	61.5	58.9	46.6	36.1	33.8	16.6
2000	527	345	53.9	72.7	67.0	59.4	57.1	44.7	36.5	33.7	18.8
2000	527	400	54.8	71.1	67.6	61.5	57.8	44.6	36.1	32.5	16.3
2000	527	415	59.4	76.6	72.3	66.0	61.7	48.8	37.6	33.6	17.2
2000	527	430	58.5	72.9	70.4	66.7	61.4	49.6	38.1	35.1	14.4
2000	527	445	58.3	71.6	69.1	66.2	61.9	52.9	41.2	36.5	13.3
2000	527	500	58.9	72.6	70.3	66.0	63.0	51.8	39.4	35.6	13.7
2000	527	515	58.8	71.4	69.2	66.1	62.7	53.0	39.3	34.4	12.6
2000	527	530	59.7	71.8	69.3	65.8	63.7	56.2	47.1	37.0	12.1
2000	527	545	61.8	76.7	72.3	67.7	65.1	58.1	48.9	43.2	14.9
2000	527	600	61.4	73.3	70.5	66.7	64.7	59.4	50.8	43.7	11.9
2000	527	615	62.6	75.8	71.8	68.5	66.6	60.0	49.5	42.4	13.2
2000	527	630	63.1	73.0	71.0	68.7	66.9	61.2	53.6	44.3	9.9
2000	527	645	63.4	75.4	72.0	69.3	67.1	61.1	52.3	45.7	12.0
2000	527	700	62.9	76.2	70.8	68.6	66.4	60.8	53.4	45.7	13.3
2000	527	715	62.7	75.1	71.7	68.7	66.3	60.1	51.9	44.6	12.4
2000	527	730	62.1	75.8	70.4	67.8	65.7	60.0	54.1	48.2	13.7
2000	527	745	61.6	76.4	70.1	67.7	65.1	59.3	51.1	44.3	14.8
2000	527	800	62.1	72.9	70.4	67.7	65.5	60.1	52.6	43.0	10.8
2000	527	815	64.2	79.5	73.8	69.7	68.2	60.8	55.1	47.0	15.3
2000	527	830	63.8	77.6	73.3	68.8	67.1	61.5	55.7	48.3	13.8
2000	527	845	63.3	75.6	72.2	68.8	66.8	61.0	55.4	43.7	12.3
2000	527	900	62.0	76.7	69.1	66.9	65.3	60.5	54.9	47.4	14.7
2000	527	915	62.5	74.7	71.3	68.1	66.1	60.2	53.7	46.1	12.2
2000	527	930	61.3	77.2	70.0	65.2	63.8	59.8	55.0	47.9	15.9
2000	527	945	64.7	83.7	76.3	67.9	65.9	60.6	56.0	50.1	19.0
2000	527	1000	62.6	77.5	72.2	67.9	65.7	59.7	54.4	47.7	14.9
2000	527	1015	62.1	76.6	72.6	67.2	65.0	59.8	54.8	45.3	14.5
2000	527	1030	62.9	78.3	74.0	68.3	65.2	60.1	56.1	49.5	15.4
2000	527	1045	62.6	77.9	72.7	67.5	65.5	60.0	55.4	48.7	15.3
2000	527	1100	62.6	78.4	72.6	68.5	66.0	59.5	54.9	47.4	15.8
2000	527	1115	61.1	75.7	69.8	65.9	63.5	59.3	55.4	48.2	14.6
2000	527	1130	61.6	76.4	70.2	66.1	64.4	59.8	56.8	51.2	14.8
2000	527	1145	61.5	77.2	69.6	66.1	64.2	59.8	56.8	51.4	15.7
2000	527	1200	62.7	94.7	68.4	65.6	64.0	59.5	56.4	51.9	32.0
2000	527	1215	61.4	82.4	70.8	66.0	63.9	58.8	55.0	49.8	21.0
2000	527	1230	62.3	82.8	71.4	67.0	64.8	59.8	57.1	53.2	20.5
2000	527	1245	61.8	76.4	70.4	66.7	64.8	59.7	56.8	50.0	14.6
2000	527	1300	62.4	80.1	73.0	67.0	64.4	59.6	56.7	51.5	17.7
2000	527	1315	61.7	75.8	71.1	66.8	64.2	59.6	56.0	48.7	14.1
2000	527	1330	60.7	74.3	68.8	65.2	63.6	59.1	56.0	52.4	13.6
2000	527	1345	63.2	91.2	71.2	67.4	65.6	60.3	56.8	50.3	28.0
2000	527	1400	63.4	92.9	70.7	67.0	65.3	61.1	58.5	54.7	29.5
2000	527	1415	65.0	90.4	75.6	67.1	65.1	60.4	56.8	50.1	25.4
2000	527	1430	61.0	72.9	68.4	65.6	63.9	59.8	56.6	49.5	11.9
2000	527	1445	60.7	73.5	68.2	65.0	63.3	59.8	56.1	51.2	12.8
2000	527	1500	61.3	74.4	69.4	65.7	64.0	60.1	57.2	52.4	13.1
2000	527	1515	61.2	73.4	69.3	66.0	64.1	59.7	56.0	52.1	12.2
2000	527	1530	59.4	74.1	66.2	62.8	61.6	58.8	54.9	49.3	14.7
2000	527	1545	63.0	81.8	74.3	67.2	64.4	58.9	55.3	47.9	18.8
2000	527	1600	60.1	70.6	67.1	64.1	62.7	59.3	55.5	49.1	10.5
2000	527	1615	60.9	74.3	68.2	65.1	63.7	59.9	56.4	48.7	13.4
2000	527	1630	61.0	73.2	68.2	64.9	63.7	59.9	56.3	50.0	12.2
2000	527	1645	63.3	82.1	74.1	66.3	63.7	60.2	56.3	44.5	18.8
2000	527	1700	62.2	81.7	71.4	66.6	64.1	60.5	56.6	48.1	19.5
2000	527	1715	60.7	71.8	66.8	64.2	63.1	60.1	56.5	49.6	11.1
2000	527	1730	61.9	72.5	70.0	65.7	64.0	61.0	57.8	48.4	10.6
2000	527	1745	60.9	73.7	67.2	64.1	63.1	60.4	57.1	48.1	12.8
2000	527	1800	61.1	70.9	68.9	65.0	63.4	60.3	56.3	48.9	9.8
2000	527	1815	61.3	74.6	69.5		63.7	60.1	56.5	47.8	13.3
2000	527	1830	60.5	71.2	67.1	64.0	62.9	60.0	55.5	48.3	10.7
2000	527	1845	61.2	75.3	68.7	65.2	63.2	60.1	55.0	48.0	14.1
2000	527	1900	59.6	66.9	64.1	62.9	62.1	59.3	55.2	48.9	7.3
2000	527	1915	59.7	71.7	66.6	63.4	62.4	58.9	54.8	49.3	12.0
2000	527	1930	60.0	70.8	66.3	63.7	62.5	59.4	54.6	47.2	10.8
2000	527	1945	59.3	73.4	66.3	63.0	61.9	58.5	53.8	46.7	14.1
2000	527	2000	59.5	71.9	65.3	63.1	62.2	58.7	52.2	45.4	12.4
2000	527	2015	59.5	71.3	67.4	63.5	62.4	58.5	50.9	43.0	11.8
2000	527	2030	58.8	75.3	65.3	62.7	61.6	57.5	51.4	43.0	16.5
2000	527	2045	58.0	72.5	65.1	62.0	61.1	56.9	49.7	44.9	14.5
2000	527	2100	57.1	68.6	64.3	61.8	60.7	55.4	48.3	43.6	11.5
2000	527	2115	57.0	71.0	63.2	60.9	60.1	55.8	47.8	41.0	14.0
2000	527	2130	57.9	69.9	66.9	62.1	60.8	56.6	51.2	42.9	12.0
2000	527	2145	56.3	68.6	63.7	60.8	59.8	54.6	47.3	41.9	12.3
2000	527	2200	58.5	77.1	69.8	62.5	60.8	55.1	48.6	41.6	18.6
2000	527	2215	57.5	73.9	65.4	61.7	60.4	56.1	49.8	43.2	16.4
2000	527	2230	57.8	72.6	66.2	62.5	61.2	55.6	47.9	40.5	14.8
2000	527	2245	56.9	73.1	64.9	61.3	60.1	55.4	45.3	40.5	16.2
2000	527	2300	56.9	69.8	66.0	61.7	60.3	54.9	44.9	39.6	12.9
2000	527	2315	57.3	70.9	63.5	61.4	60.6	56.4	46.3	37.6	13.6
2000	527	2330	57.7	69.9	63.7	62.1	61.1	56.5	47.7	39.2	12.2
2000	527	2345	57.3	69.8	64.5	62.1	60.8	55.8	45.5	37.6	12.5
2000	527	0	57.3	69.1	64.8	61.8	60.8	55.5	47.8	39.3	11.8

DAY 1	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**60.8**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**58.2**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**61.6**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**59.2**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**63.7**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**51.1**	dB(A)

54 Davina Crescent, Cecil Hills — DAY 2

Sunday 28 May 2000 — RT&A S/N 81

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	527	2200	58.5	77.1	69.8	62.5	60.8	55.1	48.6	41.6	18.6
2000	527	2215	57.5	73.9	65.4	61.7	60.4	56.1	49.8	43.2	16.4
2000	527	2230	57.8	72.6	66.2	62.5	61.2	55.6	47.9	40.5	14.8
2000	527	2245	56.9	73.1	64.9	61.3	60.1	55.4	45.3	40.5	16.2
2000	527	2300	56.9	69.8	66.0	61.7	60.3	54.9	44.9	39.6	12.9
2000	527	2315	57.3	70.9	63.5	61.4	60.6	56.4	46.3	37.6	13.6
2000	527	2330	57.7	69.9	63.7	62.1	61.1	56.5	47.7	39.2	12.2
2000	527	2345	57.3	69.8	64.5	62.1	60.8	55.8	45.5	37.6	12.5
2000	527	0	57.3	69.1	64.8	61.8	60.8	55.5	47.8	39.3	11.8
2000	528	15	58.7	76.0	68.0	62.1	60.9	56.4	49.8	39.4	17.3
2000	528	30	57.9	75.6	68.1	61.8	60.7	55.4	46.7	37.6	17.7
2000	528	45	57.2	71.2	66.5	62.0	60.5	55.1	45.4	39.2	14.0
2000	528	100	55.3	67.7	63.5	60.6	59.6	52.5	44.9	39.8	12.4
2000	528	115	54.8	69.2	62.4	60.2	58.9	51.7	45.5	41.9	14.4
2000	528	130	56.4	75.0	66.5	60.6	59.0	52.6	45.2	40.7	18.6
2000	528	145	53.1	68.9	60.6	58.7	57.5	49.6	42.3	37.8	15.8
2000	528	200	53.2	65.7	61.8	59.8	58.0	48.2	40.6	37.4	12.5
2000	528	215	51.9	65.4	61.4	57.9	56.6	47.1	37.9	34.3	13.5
2000	528	230	52.7	64.6	61.2	59.0	57.6	47.3	39.3	35.9	11.9
2000	528	245	52.5	68.2	61.2	58.6	57.0	47.7	38.1	35.3	15.7
2000	528	300	52.7	70.0	65.5	58.6	55.6	43.4	35.9	32.8	17.3
2000	528	315	48.7	61.3	58.6	56.1	53.8	41.1	36.4	33.7	12.6
2000	528	330	53.1	68.9	65.6	59.3	56.9	45.2	38.4	33.8	15.8
2000	528	345	54.7	73.6	67.0	59.8	57.1	48.4	43.9	40.2	18.9
2000	528	400	54.5	73.0	68.0	58.9	56.1	46.4	42.3	39.1	18.5
2000	528	415	54.6	79.8	62.1	58.2	56.0	47.0	41.2	38.0	25.2
2000	528	430	53.1	69.2	65.1	59.7	57.3	43.2	37.8	34.3	16.1
2000	528	445	52.2	72.3	62.5	57.2	55.4	45.4	40.8	36.9	20.1
2000	528	500	53.0	70.9	67.5	57.7	54.5	41.5	34.6	32.2	17.9
2000	528	515	53.5	67.7	64.5	60.1	58.1	45.3	35.5	31.7	14.2
2000	528	530	55.5	69.2	66.2	61.0	59.3	50.7	40.6	33.6	13.7
2000	528	545	57.7	72.9	69.1	63.6	61.1	52.5	41.1	35.9	15.2
2000	528	600	56.4	74.1	66.2	61.9	60.0	50.7	41.3	35.4	17.7
2000	528	615	56.4	70.9	66.7	61.9	60.4	52.1	42.4	35.5	14.5
2000	528	630	58.0	74.2	67.8	63.2	61.7	54.1	41.6	36.8	16.2
2000	528	645	60.5	71.8	69.6	66.8	64.7	56.9	46.5	36.6	11.3
2000	528	700	58.7	75.7	69.0	64.4	62.0	54.4	44.5	37.9	17.0
2000	528	715	57.9	71.4	67.3	64.0	61.8	54.1	44.5	37.5	13.5
2000	528	730	58.7	70.8	67.7	63.9	62.1	56.6	48.0	41.9	12.1
2000	528	745	60.3	74.7	69.8	66.5	64.2	56.5	45.9	38.8	14.4
2000	528	800	63.1	86.3	74.9	64.7	61.9	56.7	49.1	44.1	23.2
2000	528	815	58.9	76.5	68.5	63.2	61.7	56.7	50.5	43.5	17.6
2000	528	830	59.6	74.8	68.5	64.7	62.5	57.9	50.1	42.9	15.2
2000	528	845	57.7	68.6	65.5	62.4	61.0	56.2	49.6	40.5	10.9
2000	528	900	58.6	70.6	67.3	63.3	61.8	56.9	50.1	43.7	12.0
2000	528	915	58.4	72.9	65.6	62.4	61.2	57.5	51.3	45.5	14.5
2000	528	930	58.5	72.8	67.6	62.5	61.1	57.2	51.5	45.6	14.3
2000	528	945	59.1	70.3	66.4	63.3	62.0	58.2	52.4	45.6	11.2
2000	528	1000	61.0	78.1	70.6	66.3	63.5	58.7	54.2	47.1	17.1
2000	528	1015	59.3	74.1	66.8	63.0	61.8	58.1	53.1	47.1	14.8
2000	528	1030	58.9	73.9	66.2	62.8	61.4	58.1	52.9	45.5	15.0
2000	528	1045	58.8	69.0	66.1	62.9	61.3	57.9	54.3	45.3	10.2
2000	528	1100	59.4	73.6	68.0	63.2	61.3	58.2	54.8	47.1	14.2
2000	528	1115	59.3	76.3	67.3	63.4	61.8	58.1	54.5	47.0	17.0
2000	528	1130	61.2	82.3	72.3	64.7	62.4	58.5	54.2	48.5	21.1
2000	528	1145	60.0	78.7	69.2	63.4	61.7	58.2	54.8	49.2	18.7
2000	528	1200	58.8	70.9	67.1	62.2	61.0	57.9	54.8	48.8	12.1
2000	528	1215	60.2	77.0	70.4	64.0	61.7	58.3	55.3	48.5	16.8
2000	528	1230	59.6	75.8	68.5	63.3	61.7	58.2	54.9	46.7	16.2
2000	528	1245	59.2	74.3	66.3	62.5	61.4	58.2	55.2	49.3	15.1
2000	528	1300	59.5	74.4	68.2	63.2	61.2	58.1	55.0	50.1	14.9
2000	528	1315	60.0	73.9	67.6	64.5	62.4	58.6	55.7	52.4	13.9
2000	528	1330	59.1	78.1	66.0	62.1	60.8	57.9	54.1	49.6	19.0
2000	528	1345	61.6	91.8	71.1	64.3	62.2	58.2	55.6	51.1	30.2
2000	528	1400	59.0	77.0	65.8	62.6	61.0	58.0	54.9	48.2	18.0
2000	528	1415	58.5	70.9	64.8	62.1	60.8	57.9	54.2	49.5	12.4
2000	528	1430	59.6	73.7	67.8	63.3	61.6	58.5	55.6	49.4	14.1
2000	528	1445	59.1	72.2	66.6	63.4	61.6	58.1	54.6	47.7	13.1
2000	528	1500	59.3	70.5	66.9	63.2	62.0	58.2	54.2	49.7	11.2
2000	528	1515	59.2	72.7	67.1	63.0	61.5	58.1	53.5	47.9	13.5
2000	528	1530	61.3	82.0	70.6	65.1	62.6	58.8	54.5	48.3	20.7
2000	528	1545	60.4	74.7	69.4	64.2	62.4	59.2	56.4	52.2	14.3
2000	528	1600	59.8	73.1	67.2	63.7	62.3	59.0	54.2	42.3	13.3
2000	528	1615	59.7	71.4	65.8	63.2	62.2	59.2	53.8	45.2	11.7
2000	528	1630	60.9	75.2	70.9	64.8	62.8	59.1	55.3	47.4	14.3
2000	528	1645	60.8	71.6	69.7	64.2	62.8	59.8	56.1	49.9	10.8
2000	528	1700	60.3	72.1	68.3	63.5	62.4	59.4	56.3	47.1	11.8
2000	528	1715	60.7	71.4	68.0	64.4	63.0	59.8	57.1	53.0	10.7
2000	528	1730	60.1	73.6	68.0	63.5	62.0	59.2	56.5	51.2	13.5
2000	528	1745	60.4	73.0	67.3	64.4	62.9	59.7	56.4	49.7	12.6
2000	528	1800	59.7	74.2	67.2	63.6	62.3	58.8	54.9	47.8	14.5
2000	528	1815	59.2	71.5	65.6	62.5	61.5	58.7	54.3	48.1	12.3
2000	528	1830	58.6	71.8	64.9	62.3	61.3	58.1	52.5	47.9	13.2
2000	528	1845	59.1	74.3	66.9	63.1	61.7	57.9	52.9	45.7	15.2
2000	528	1900	59.5	71.4	67.1	63.8	62.4	58.5	52.5	44.8	11.9
2000	528	1915	58.1	68.1	63.9	62.1	61.4	57.7	47.8	39.7	10.0
2000	528	1930	60.4	75.2	69.6	64.1	62.5	58.8	51.2	43.9	14.8
2000	528	1945	60.9	85.0	68.9	64.0	62.3	58.1	51.3	44.0	24.1
2000	528	2000	60.4	74.2	68.0	64.8	63.4	59.3	52.0	45.6	13.8
2000	528	2015	60.1	70.3	67.1	64.2	63.1	59.2	51.3	45.3	10.2
2000	528	2030	60.0	69.9	66.7	64.1	63.1	59.2	50.9	41.5	9.9
2000	528	2045	59.6	72.1	68.3	64.7	62.4	58.0	51.0	44.1	12.5
2000	528	2100	59.6	74.6	67.4	63.3	62.2	58.6	52.2	44.0	15.0
2000	528	2115	59.1	74.6	65.0	63.2	62.2	58.0	50.5	44.6	15.5
2000	528	2130	59.9	73.8	69.0	64.9	63.0	58.0	47.9	40.6	13.9
2000	528	2145	58.0	68.3	66.4	62.6	61.3	56.4	47.7	43.0	10.3
2000	528	2200	57.7	70.3	66.8	63.1	61.6	55.1	44.8	40.3	12.6
2000	528	2215	59.3	72.8	70.5	65.6	61.7	55.1	45.7	39.1	13.5
2000	528	2230	59.2	83.7	68.5	64.5	62.4	56.0	44.0	38.3	24.5
2000	528	2245	58.1	80.7	70.1	61.7	59.9	53.0	45.0	37.7	22.6
2000	528	2300	58.0	73.2	67.4	63.2	61.0	55.6	48.1	39.3	15.2
2000	528	2315	58.3	76.6	68.2	64.1	61.6	54.7	45.1	38.8	18.3
2000	528	2330	59.4	77.5	71.6	65.1	61.4	54.0	45.5	40.8	18.1
2000	528	2345	58.9	76.0	71.4	63.9	61.1	52.2	44.4	37.6	17.1

DAY 2	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**58.8**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**55.6**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**59.7**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**56.1**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**61.9**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**44.5**	dB(A)

54 Davina Crescent, Cecil Hills											DAY 3
Monday 29 May 2000										RT&A S/N 81	
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	528	2215	59.3	72.8	70.5	65.6	61.7	55.1	45.7	39.1	13.5
2000	528	2230	59.2	83.7	68.5	64.5	62.4	56.0	44.0	38.3	24.5
2000	528	2245	58.1	80.7	70.1	61.7	59.9	53.0	45.0	37.7	22.6
2000	528	2300	58.0	73.2	67.4	63.2	61.0	55.6	48.1	39.3	15.2
2000	528	2315	58.3	76.6	68.2	64.1	61.6	54.7	45.1	38.8	18.3
2000	528	2330	59.4	77.5	71.6	65.1	61.4	54.0	45.5	40.8	18.1
2000	528	2345	58.9	76.0	71.4	63.9	61.1	52.2	44.4	37.6	17.1
2000	528	0	55.3	72.4	64.8	61.5	59.8	50.3	41.4	35.8	17.1
2000	529	15	56.4	72.0	68.7	63.1	60.2	48.4	38.2	35.4	15.6
2000	529	30	58.6	80.8	70.0	64.3	60.9	50.6	40.9	34.0	22.2
2000	529	45	58.7	80.9	71.4	63.0	60.3	49.2	38.1	34.2	22.2
2000	529	100	58.0	73.7	69.5	64.4	61.1	49.9	39.2	34.6	15.7
2000	529	115	54.1	70.7	66.9	60.7	57.3	45.0	36.6	32.8	16.6
2000	529	130	55.7	72.7	69.6	60.8	58.3	45.8	37.1	32.7	17.0
2000	529	145	58.6	76.1	72.2	65.0	59.6	46.6	37.7	33.5	17.5
2000	529	200	56.8	70.4	68.4	64.7	60.8	46.4	37.7	35.2	13.6
2000	529	215	59.4	73.7	70.2	66.9	63.8	52.0	44.0	40.9	14.3
2000	529	230	62.8	90.8	73.0	68.9	66.2	56.0	50.7	46.8	28.0
2000	529	245	60.7	78.7	73.1	67.4	63.9	51.8	44.5	40.5	18.0
2000	529	300	60.2	75.4	71.1	67.8	64.5	52.0	44.4	38.6	15.2
2000	529	315	52.9	73.4	65.7	57.9	54.4	40.2	36.5	33.7	20.5
2000	529	330	53.4	69.7	65.8	60.2	56.8	43.1	35.2	33.2	16.3
2000	529	345	57.4	73.3	69.7	63.7	60.5	47.5	39.7	35.4	15.9
2000	529	400	56.3	70.5	68.1	62.9	60.1	46.7	40.0	35.2	14.2
2000	529	415	58.7	72.9	70.8	65.9	62.5	51.2	41.3	36.8	14.2
2000	529	430	60.1	72.0	70.5	67.6	64.1	54.9	47.1	37.9	11.9
2000	529	445	61.5	76.2	70.9	68.2	66.1	57.3	48.1	42.0	14.7
2000	529	500	60.1	73.4	70.5	67.2	63.5	55.3	48.1	43.8	13.3
2000	529	515	63.8	81.1	75.0	69.7	67.4	59.0	51.4	45.0	17.3
2000	529	530	65.5	79.3	73.6	70.9	69.4	62.9	56.9	48.4	13.8
2000	529	545	65.9	77.3	74.8	70.9	69.0	63.7	59.2	51.5	11.4
2000	529	600	64.3	75.7	71.6	69.4	68.0	62.9	58.1	52.3	11.4
2000	529	615	65.0	74.3	71.6	69.8	68.5	63.7	59.3	54.8	9.3
2000	529	630	65.3	74.7	71.9	69.6	68.4	64.1	61.5	57.9	9.4
2000	529	645	66.1	77.5	74.6	70.2	68.4	64.7	61.7	57.5	11.4
2000	529	700	64.3	75.7	70.7	68.6	67.5	62.9	58.9	55.3	11.4
2000	529	715	65.8	76.0	72.8	70.4	69.0	64.3	60.7	54.7	10.2
2000	529	730	65.5	81.0	72.8	69.8	68.3	63.9	60.9	56.5	15.5
2000	529	745	65.5	79.5	72.8	70.0	68.2	64.0	60.8	57.2	14.0
2000	529	800	65.5	82.8	75.1	70.0	68.5	62.9	59.3	55.7	17.3
2000	529	815	62.4	70.8	69.2	67.4	65.8	61.1	56.5	52.2	8.4
2000	529	830	62.8	73.5	71.1	67.8	66.3	60.6	56.5	49.8	10.7
2000	529	845	64.6	85.3	72.9	68.7	67.0	61.3	57.7	53.0	20.7
2000	529	900	65.1	82.6	74.1	68.5	67.0	61.6	58.3	51.5	17.5
2000	529	915	63.2	77.8	71.0	67.6	66.4	61.4	55.7	47.4	14.6
2000	529	930	65.7	85.3	76.7	69.2	66.9	60.6	55.2	47.7	19.6
2000	529	945	64.2	79.2	73.0	69.0	67.6	61.9	55.1	44.6	15.0
2000	529	1000	63.5	75.7	71.0	68.6	67.1	61.7	57.1	44.3	12.2
2000	529	1015	63.9	82.7	72.0	69.2	67.3	61.1	56.6	51.1	18.8
2000	529	1030	64.6	77.6	74.7	69.5	67.8	61.8	56.8	50.8	13.0
2000	529	1045	65.0	80.3	73.2	69.9	68.3	63.0	58.5	52.9	15.3
2000	529	1100	62.8	77.6	71.4	67.4	65.9	61.1	56.3	48.3	14.8
2000	529	1115	63.4	75.0	70.2	68.5	67.3	61.5	54.6	46.9	11.6
2000	529	1130	64.7	82.2	74.0	69.2	67.5	61.8	56.1	50.5	17.5
2000	529	1145	63.8	80.1	75.1	68.3	66.4	60.6	55.7	50.5	16.3
2000	529	1200	63.1	76.9	72.7	68.9	66.8	59.9	53.3	46.5	13.8
2000	529	1215	64.3	78.5	74.8	69.6	67.8	61.0	55.0	49.0	14.2
2000	529	1230	63.1	77.6	71.7	68.7	67.2	60.3	54.2	47.9	14.5
2000	529	1245	61.8	73.6	70.5	66.9	65.3	59.7	54.3	48.6	11.8
2000	529	1300	65.6	92.6	75.0	70.6	68.3	61.9	57.1	51.9	27.0
2000	529	1315	65.6	79.4	74.1	71.2	69.4	63.0	58.0	51.8	13.8
2000	529	1330	68.3	93.3	76.8	71.9	70.1	64.4	60.2	54.1	25.0
2000	529	1345	65.2	92.8	72.7	69.4	68.0	62.8	59.3	54.5	27.6
2000	529	1400	66.2	85.7	75.3	71.0	69.1	63.7	58.7	53.6	19.5
2000	529	1415	70.2	92.2	81.0	72.9	70.2	64.7	59.9	54.4	22.0
2000	529	1430	66.5	92.7	75.1	70.9	69.4	63.8	59.9	53.7	26.2
2000	529	1445	64.7	80.1	73.5	69.6	67.8	62.7	59.0	54.0	15.4
2000	529	1500	67.3	93.1	75.5	71.5	69.4	63.7	60.5	56.3	25.8
2000	529	1515	66.6	92.6	74.2	70.8	69.0	63.8	60.3	56.6	26.0
2000	529	1530	66.9	92.0	75.8	70.1	68.4	62.5	59.1	55.3	25.1
2000	529	1545	66.2	85.5	75.3	70.8	68.9	63.3	59.1	55.1	19.3
2000	529	1600	65.3	92.1	73.3	68.6	66.7	62.2	57.5	52.0	26.8
2000	529	1615	64.3	84.5	72.5	68.8	67.1	61.6	57.9	52.9	20.2
2000	529	1630	63.4	77.4	70.2	67.5	66.1	62.3	58.8	55.0	14.0
2000	529	1645	64.5	81.3	72.8	69.3	67.5	62.1	58.2	54.0	16.8
2000	529	1700	63.7	77.9	72.6	68.9	66.7	61.3	58.0	54.3	14.2
2000	529	1715	63.9	78.9	72.5	68.5	67.0	61.9	57.9	54.0	15.0
2000	529	1730	61.9	74.4	69.7	66.4	65.0	60.4	56.5	52.3	12.5
2000	529	1745	61.6	71.5	68.2	66.2	64.6	60.6	57.3	52.5	9.9
2000	529	1800	62.5	75.5	70.3	67.2	65.4	61.1	57.2	51.8	13.0
2000	529	1815	62.3	76.9	71.3	67.1	65.4	60.4	55.7	52.1	14.6
2000	529	1830	60.6	69.5	67.3	64.9	63.4	59.8	54.2	48.5	8.9
2000	529	1845	61.5	76.0	70.9	65.8	64.4	59.8	55.3	48.3	14.5
2000	529	1900	61.2	72.7	69.4	66.3	64.4	59.8	52.0	45.2	11.5
2000	529	1915	62.9	76.8	73.8	68.3	65.8	60.2	53.3	43.9	13.9
2000	529	1930	62.4	77.2	70.9	67.6	65.7	60.2	53.3	46.7	14.8
2000	529	1945	60.7	73.7	71.1	65.2	63.4	58.7	49.0	40.5	13.0
2000	529	2000	60.9	74.0	71.8	66.2	63.7	58.5	49.3	42.2	13.1
2000	529	2015	63.4	79.1	74.2	69.4	67.0	58.9	50.5	44.1	15.7
2000	529	2030	59.7	71.7	68.9	65.0	62.9	57.5	48.2	43.5	12.0
2000	529	2045	59.8	71.7	68.9	65.6	63.2	57.3	47.1	40.1	11.9
2000	529	2100	59.4	72.9	69.3	64.6	62.4	56.5	47.9	39.5	13.5
2000	529	2115	61.4	73.3	70.8	68.7	65.8	57.2	45.8	40.2	11.9
2000	529	2130	62.9	82.1	74.8	69.4	63.1	56.7	47.1	39.3	19.2
2000	529	2145	59.9	73.7	70.9	66.0	62.5	56.3	47.0	39.8	13.8
2000	529	2200	60.9	76.2	70.8	67.6	64.4	56.8	46.8	38.8	15.3
2000	529	2215	60.7	71.4	69.7	67.7	65.0	57.0	47.4	41.4	10.7
2000	529	2230	59.4	70.6	68.6	64.7	62.4	57.5	49.5	39.8	11.2
2000	529	2245	58.9	71.3	68.9	64.9	62.3	55.9	46.2	38.8	12.4
2000	529	2300	59.3	72.1	69.9	65.6	63.4	55.2	44.6	37.4	12.8
2000	529	2315	56.2	69.4	65.3	62.0	60.4	52.3	40.9	36.4	13.2
2000	529	2330	56.7	71.7	67.1	62.3	60.5	52.0	40.7	37.0	15.0
2000	529	2345	58.0	77.8	70.9	63.4	59.2	47.4	38.1	33.9	19.8
2000	529	0	56.1	71.5	68.3	62.8	59.2	46.6	36.4	33.9	15.4

DAY 3	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**63.4**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**60.0**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**64.3**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**61.1**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**66.1**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**53.3**	dB(A)

54 Davina Crescent, Cecil Hills — DAY 4

Tuesday 30 May 2000 — RT&A S/N 81

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	529	2215	60.7	71.4	69.7	67.7	65.0	57.0	47.4	41.4	10.7
2000	529	2230	59.4	70.6	68.6	64.7	62.4	57.5	49.5	39.8	11.2
2000	529	2245	58.9	71.3	68.9	64.9	62.3	55.9	46.2	38.8	12.4
2000	529	2300	59.3	72.1	69.9	65.6	63.4	55.2	44.6	37.4	12.8
2000	529	2315	56.2	69.4	65.3	62.0	60.4	52.3	40.9	36.4	13.2
2000	529	2330	56.7	71.7	67.1	62.3	60.5	52.0	40.7	37.0	15.0
2000	529	2345	58.0	77.8	70.9	63.4	59.2	47.4	38.1	33.9	19.8
2000	529	0	56.1	71.5	68.3	62.8	59.2	46.6	36.4	33.9	15.4
2000	530	15	55.3	72.6	68.2	61.6	58.4	44.8	35.3	32.5	17.3
2000	530	30	57.8	74.0	70.0	64.9	61.3	49.0	34.5	32.0	16.2
2000	530	45	56.4	72.2	68.9	64.4	59.2	42.1	35.0	33.0	15.8
2000	530	100	55.7	72.8	68.9	61.6	58.4	44.4	35.7	33.6	17.1
2000	530	115	55.7	73.5	69.4	62.4	57.9	39.2	34.9	33.3	17.8
2000	530	130	55.9	73.0	68.9	62.9	58.5	40.7	35.5	33.8	17.1
2000	530	145	55.9	70.7	68.3	63.9	59.2	42.2	35.1	32.3	14.8
2000	530	200	58.1	73.3	70.9	66.6	60.6	40.6	33.6	31.9	15.2
2000	530	215	56.5	70.8	68.9	64.1	59.6	44.5	35.7	32.9	14.3
2000	530	230	56.4	73.4	70.9	62.3	58.1	41.9	36.4	33.4	17.0
2000	530	245	56.0	72.5	69.3	63.5	58.0	41.0	36.3	33.4	16.5
2000	530	300	52.0	70.2	66.6	58.2	53.4	36.6	33.8	32.5	18.2
2000	530	315	58.3	75.7	73.3	63.2	56.8	38.6	33.7	32.1	17.4
2000	530	330	60.8	82.4	72.3	67.0	63.0	47.2	35.7	31.9	21.6
2000	530	345	58.5	75.8	71.2	65.7	60.0	45.8	36.3	33.4	17.3
2000	530	400	57.2	74.3	69.8	63.8	60.1	48.3	37.1	34.1	17.1
2000	530	415	62.1	83.5	74.2	66.3	62.9	51.2	39.8	35.7	21.4
2000	530	430	62.3	73.5	72.1	69.4	67.4	57.3	44.4	38.9	11.2
2000	530	445	59.5	72.4	69.7	66.5	63.6	54.6	43.6	38.6	12.9
2000	530	500	59.6	73.6	71.2	65.6	63.6	54.8	45.9	39.1	14.0
2000	530	515	63.2	76.3	73.3	70.5	67.4	58.4	48.7	40.0	13.1
2000	530	530	63.8	76.1	73.2	69.4	67.4	61.6	53.7	46.8	12.3
2000	530	545	65.8	76.0	73.4	70.9	69.8	63.9	56.9	47.6	10.2
2000	530	600	66.1	80.6	74.4	70.9	69.2	64.0	58.7	52.0	14.5
2000	530	615	65.9	76.1	72.6	70.2	69.1	64.6	60.3	53.1	10.2
2000	530	630	66.4	79.8	73.3	70.6	69.2	65.1	61.9	56.5	13.4
2000	530	645	66.1	78.1	74.1	70.3	69.0	64.6	61.3	57.5	12.0
2000	530	700	65.1	75.7	71.7	69.5	68.3	63.8	60.2	56.4	10.6
2000	530	715	65.2	82.3	73.3	69.3	67.9	63.2	59.4	55.5	17.1
2000	530	730	64.8	75.8	71.1	69.0	67.8	63.5	60.1	57.3	11.0
2000	530	745	65.5	78.4	74.1	69.5	68.0	64.2	60.9	57.2	12.9
2000	530	800	62.8	77.3	69.1	67.0	65.8	61.8	59.0	54.2	14.5
2000	530	815	65.6	84.2	78.4	69.2	67.2	60.8	56.1	53.1	18.6
2000	530	830	63.7	78.8	72.2	68.9	67.1	61.6	57.7	53.9	15.1
2000	530	845	62.5	71.8	68.9	66.7	65.5	61.2	58.4	54.4	9.3
2000	530	900	64.5	76.2	71.5	68.5	67.4	63.4	59.2	52.9	11.7
2000	530	915	63.4	73.1	70.3	68.4	67.0	61.5	56.3	51.6	9.7
2000	530	930	64.9	77.5	74.4	69.9	67.9	62.5	59.3	53.5	12.6
2000	530	945	64.6	74.8	72.3	69.8	68.4	62.5	57.7	52.9	10.2
2000	530	1000	63.7	74.3	70.6	68.7	67.3	62.0	57.5	51.3	10.6
2000	530	1015	65.2	90.7	73.3	70.2	68.3	62.9	59.0	54.5	25.5
2000	530	1030	65.1	77.9	74.4	70.6	68.4	62.2	57.7	52.3	12.8
2000	530	1045	65.9	81.2	73.5	70.3	69.0	63.9	58.0	52.8	15.3
2000	530	1100	64.9	78.4	72.9	70.3	68.6	62.5	58.5	53.6	13.5
2000	530	1115	65.1	79.8	72.2	69.9	68.4	63.5	58.9	53.4	14.7
2000	530	1130	65.7	78.0	73.4	70.3	68.9	64.3	59.2	53.3	12.3
2000	530	1145	67.0	92.5	76.3	71.5	69.7	64.5	58.7	51.5	25.5
2000	530	1200	68.4	93.4	76.2	71.8	70.0	64.8	59.3	53.3	25.0
2000	530	1215	67.6	92.7	76.9	72.5	70.3	64.3	59.5	53.6	25.1
2000	530	1230	66.1	91.5	73.9	70.8	68.9	64.1	59.7	54.4	25.4
2000	530	1245	65.2	78.8	72.3	69.8	68.6	63.5	58.7	52.5	13.6
2000	530	1300	65.4	93.7	71.7	69.9	68.7	62.6	57.4	51.4	28.3
2000	530	1315	65.5	91.1	74.5	70.4	68.5	62.8	58.1	53.6	25.6
2000	530	1330	66.1	78.4	73.5	70.9	69.8	64.2	59.9	52.3	12.3
2000	530	1345	65.8	92.9	72.3	69.2	67.4	62.8	58.3	52.3	27.1
2000	530	1400	64.8	77.7	72.3	69.9	68.5	62.7	58.4	53.3	12.9
2000	530	1415	65.3	81.7	74.8	69.7	68.3	62.4	58.2	53.4	16.4
2000	530	1430	65.8	78.9	73.2	70.7	69.4	64.2	58.8	51.8	13.1
2000	530	1445	64.8	77.6	71.7	69.2	68.0	63.5	59.3	52.4	12.8
2000	530	1500	65.3	93.2	72.6	69.4	68.1	63.1	60.1	56.2	27.9
2000	530	1515	66.9	85.5	77.6	71.2	68.7	63.7	60.5	56.1	18.6
2000	530	1530	64.7	90.9	72.1	69.8	67.6	62.3	58.8	55.7	26.2
2000	530	1545	64.9	81.7	74.2	69.6	67.3	62.5	59.2	55.0	16.8
2000	530	1600	64.0	79.1	72.0	68.5	66.9	62.3	58.8	54.0	15.1
2000	530	1615	63.7	73.1	70.4	68.4	67.1	62.2	58.8	55.9	9.4
2000	530	1630	64.9	77.6	73.1	69.8	68.3	62.7	59.2	53.3	12.7
2000	530	1645	66.3	92.7	76.6	70.8	68.4	63.0	59.8	53.7	26.4
2000	530	1700	64.1	78.4	71.0	69.0	67.5	62.4	58.9	55.6	14.3
2000	530	1715	63.4	75.1	70.5	67.6	66.2	62.3	59.1	55.2	11.7
2000	530	1730	63.9	74.8	72.2	69.2	67.2	62.1	58.5	52.7	10.9
2000	530	1745	63.6	74.8	70.2	67.8	66.6	62.5	59.6	56.4	11.2
2000	530	1800	64.3	80.3	72.4	69.6	67.4	61.8	59.0	55.2	16.0
2000	530	1815	63.4	74.3	70.6	68.2	66.3	62.0	59.2	55.9	10.9
2000	530	1830	64.1	78.8	74.1	68.8	66.7	62.2	58.6	54.2	14.7
2000	530	1845	63.0	73.6	70.6	67.8	65.9	61.7	57.3	51.1	10.6
2000	530	1900	63.1	72.7	70.2	67.9	66.4	62.0	56.1	50.3	9.6
2000	530	1915	64.2	80.8	74.2	69.0	66.9	61.3	56.3	49.0	16.6
2000	530	1930	63.6	74.6	72.4	69.7	67.7	61.2	53.7	47.9	11.0
2000	530	1945	61.9	75.1	71.6	67.4	65.0	59.6	51.9	45.9	13.2
2000	530	2000	63.9	79.9	76.2	69.5	66.8	59.3	53.3	48.0	16.0
2000	530	2015	61.4	72.3	69.2	66.0	64.2	60.2	54.8	48.4	10.9
2000	530	2030	62.6	73.4	70.6	68.8	66.3	60.4	55.3	46.7	10.8
2000	530	2045	61.8	74.7	71.2	67.1	64.7	59.8	53.2	46.3	12.9
2000	530	2100	63.2	79.9	73.1	68.7	66.1	60.4	53.9	49.4	16.7
2000	530	2115	61.6	74.2	69.9	66.8	64.5	60.0	54.1	47.0	12.6
2000	530	2130	60.4	76.1	69.5	64.7	62.9	59.1	54.2	48.3	15.7
2000	530	2145	60.4	72.8	68.6	65.7	63.5	58.8	52.2	43.5	12.4
2000	530	2200	61.8	84.5	70.8	65.8	62.8	58.4	50.3	43.7	22.7
2000	530	2215	61.2	76.9	69.7	67.1	65.3	58.7	51.8	44.3	15.7
2000	530	2230	60.6	73.4	69.3	66.3	63.7	58.4	51.8	45.9	12.8
2000	530	2245	63.5	80.0	75.2	69.4	66.9	58.6	50.9	43.9	16.5
2000	530	2300	59.4	71.2	68.8	65.2	62.7	56.9	47.8	41.9	11.8
2000	530	2315	60.0	75.1	69.1	65.7	63.2	57.0	49.9	43.9	15.1
2000	530	2330	59.4	75.1	69.2	64.9	62.3	55.6	47.3	43.2	15.7
2000	530	2345	59.6	71.9	69.0	66.9	63.5	55.6	48.6	39.8	12.3
2000	530	0	59.6	77.0	72.6	65.6	61.5	52.8	43.3	38.6	17.4

DAY 4	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**63.7**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**59.8**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**64.6**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**61.1**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**67.0**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**56.1**	dB(A)

54 Davina Crescent, Cecil Hills											DAY 5
Wednesday 31 May 2000										RT&A S/N 81	
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	530	2215	61.2	76.9	69.7	67.1	65.3	58.7	51.8	44.3	15.7
2000	530	2230	60.6	73.4	69.3	66.3	63.7	58.4	51.8	45.9	12.8
2000	530	2245	63.5	80.0	75.2	69.4	66.9	58.6	50.9	43.9	16.5
2000	530	2300	59.4	71.2	68.8	65.2	62.7	56.9	47.8	41.9	11.8
2000	530	2315	60.0	75.1	69.1	65.7	63.2	57.0	49.9	43.9	15.1
2000	530	2330	59.4	75.1	69.2	64.9	62.3	55.6	47.3	43.2	15.7
2000	530	2345	59.6	71.9	69.0	66.9	63.5	55.6	48.6	39.8	12.3
2000	530	0	59.6	77.0	72.6	65.6	61.5	52.8	43.3	38.6	17.4
2000	531	15	55.4	71.4	66.1	61.5	59.3	49.0	40.7	36.8	16.0
2000	531	30	56.9	72.0	69.2	63.0	59.5	51.2	43.0	36.9	15.1
2000	531	45	56.1	73.5	69.2	61.2	58.0	48.2	38.3	35.2	17.4
2000	531	100	57.7	71.6	68.9	65.0	62.1	50.1	41.8	36.3	13.9
2000	531	115	57.0	73.6	71.0	63.8	58.5	44.7	39.4	36.9	16.6
2000	531	130	56.2	70.7	68.8	62.4	58.7	48.5	39.9	35.9	14.5
2000	531	145	59.6	75.4	73.3	66.6	60.8	49.6	37.1	34.1	15.8
2000	531	200	55.6	72.4	69.8	60.8	57.6	44.7	36.6	34.4	16.8
2000	531	215	53.9	71.3	66.4	60.1	57.7	44.2	38.0	35.6	17.4
2000	531	230	58.6	71.8	69.5	66.7	62.9	50.5	42.4	35.3	13.2
2000	531	245	55.9	71.4	68.5	63.1	59.2	46.0	40.5	38.1	15.5
2000	531	300	59.0	73.1	69.8	66.9	63.9	51.0	44.3	40.0	14.1
2000	531	315	59.6	75.2	71.7	67.3	63.7	49.1	41.5	37.9	15.6
2000	531	330	55.4	70.1	67.5	63.0	58.4	46.3	40.3	37.4	14.7
2000	531	345	61.0	76.4	72.2	68.5	65.6	53.7	46.4	41.7	15.4
2000	531	400	55.0	72.2	68.5	61.5	57.4	45.8	40.7	38.4	17.2
2000	531	415	54.0	69.0	66.2	60.2	57.7	46.5	41.7	38.3	15.0
2000	531	430	60.0	75.2	70.6	67.3	63.3	55.0	46.6	41.9	15.2
2000	531	445	61.6	74.6	71.6	68.4	65.9	57.0	47.6	40.8	13.0
2000	531	500	61.7	74.9	72.3	67.8	65.7	57.6	51.0	45.2	13.2
2000	531	515	62.0	74.2	71.0	68.3	66.3	58.3	50.7	43.9	12.2
2000	531	530	63.0	73.8	71.1	68.1	66.2	61.3	55.4	49.4	10.8
2000	531	545	64.8	78.4	72.6	69.3	68.0	63.1	57.6	50.3	13.6
2000	531	600	63.5	76.0	70.6	68.6	66.9	62.2	57.3	50.6	12.5
2000	531	615	66.1	83.2	75.1	70.8	69.1	64.0	60.5	53.7	17.1
2000	531	630	65.5	73.6	71.6	70.2	68.8	64.4	60.9	55.8	8.1
2000	531	645	64.2	77.5	69.9	68.2	67.3	63.0	59.4	55.7	13.3
2000	531	700	66.3	78.1	74.3	70.5	69.3	64.7	61.3	55.9	11.8
2000	531	715	65.2	77.5	73.2	69.5	68.3	63.6	60.0	55.9	12.3
2000	531	730	65.0	78.0	73.1	69.2	68.1	63.5	60.6	57.0	13.0
2000	531	745	65.0	78.3	72.5	69.6	68.2	63.1	60.0	56.7	13.3
2000	531	800	65.2	82.2	73.2	69.6	68.1	63.3	60.4	55.9	17.0
2000	531	815	65.0	82.4	71.7	69.7	68.4	63.2	60.5	56.6	17.4
2000	531	830	63.8	72.7	69.8	67.9	66.8	62.7	59.7	56.0	8.9
2000	531	845	65.1	79.0	73.2	70.1	68.6	63.2	59.6	56.1	13.9
2000	531	900	63.3	75.9	70.3	67.9	66.4	61.5	58.6	54.1	12.6
2000	531	915	63.9	77.5	73.5	68.8	67.1	61.4	56.9	48.2	13.6
2000	531	930	64.8	77.5	73.1	69.7	68.3	62.6	58.0	51.9	12.7
2000	531	945	64.9	82.6	73.3	68.9	67.6	62.0	58.3	52.6	17.7
2000	531	1000	65.3	78.2	75.1	70.8	68.5	62.6	57.9	50.7	12.9
2000	531	1015	65.9	84.1	73.7	70.9	69.5	63.4	58.5	53.3	18.2
2000	531	1030	65.0	76.9	73.0	70.5	68.7	62.9	58.7	54.0	11.9
2000	531	1045	66.4	88.4	75.9	71.1	69.1	63.2	58.9	53.6	22.0
2000	531	1100	66.2	84.0	75.5	70.3	68.8	63.1	58.1	51.8	17.8
2000	531	1115	65.3	93.2	72.5	69.7	68.2	62.9	58.1	51.7	27.9
2000	531	1130	67.9	93.3	79.1	72.4	70.2	64.0	58.9	53.0	25.4
2000	531	1145	66.7	92.1	74.4	71.0	69.6	64.2	59.7	53.9	25.4
2000	531	1200	66.4	91.3	74.2	71.3	69.6	64.0	60.2	56.7	24.9
2000	531	1215	64.7	79.7	71.8	69.7	68.2	63.0	58.4	53.3	15.0
2000	531	1230	65.7	93.2	71.1	68.8	67.7	62.8	58.8	54.9	27.5
2000	531	1245	64.8	76.8	72.8	69.6	68.1	62.9	59.1	54.5	12.0
2000	531	1300	63.7	80.1	73.2	69.0	66.7	61.4	57.8	54.7	16.4
2000	531	1315	64.7	75.6	72.2	69.9	68.3	62.8	57.9	51.9	10.9
2000	531	1330	64.0	73.4	71.1	69.4	67.9	62.0	57.9	51.2	9.4
2000	531	1345	64.4	75.1	71.6	69.1	68.0	62.6	57.9	52.8	10.7
2000	531	1400	63.2	83.1	69.5	67.7	66.5	61.5	57.7	50.7	19.9
2000	531	1415	64.9	75.9	73.2	70.2	68.4	62.8	57.2	50.1	11.0
2000	531	1430	64.2	78.1	72.3	69.3	67.6	62.1	58.5	52.9	13.9
2000	531	1445	64.0	75.0	70.0	68.3	67.1	62.9	59.4	52.7	11.0
2000	531	1500	64.2	73.7	71.3	68.6	67.2	62.9	59.7	54.1	9.5
2000	531	1515	64.0	73.9	71.1	68.8	67.6	62.3	58.8	54.4	9.9
2000	531	1530	62.9	77.9	71.0	68.2	66.5	60.7	57.4	52.6	15.0
2000	531	1545	62.1	73.8	69.9	66.6	65.1	60.5	57.0	53.1	11.7
2000	531	1600	63.9	76.3	70.5	67.9	66.7	62.7	59.6	55.4	12.4
2000	531	1615	63.2	77.1	71.4	68.0	66.3	61.4	57.0	52.6	13.9
2000	531	1630	63.8	76.1	71.5	68.6	66.9	62.2	58.5	54.5	12.3
2000	531	1645	64.0	77.5	72.9	69.3	66.9	62.0	58.5	54.4	13.5
2000	531	1700	63.3	74.7	70.2	68.4	66.8	61.5	58.5	54.0	11.4
2000	531	1715	63.9	77.3	72.1	68.9	66.9	62.2	58.6	54.4	13.4
2000	531	1730	63.6	77.2	72.3	68.5	66.5	61.8	58.8	55.8	13.6
2000	531	1745	62.9	77.6	70.7	68.0	66.2	61.1	57.7	53.1	14.7
2000	531	1800	63.8	73.9	71.5	68.9	67.0	62.3	58.9	53.4	10.1
2000	531	1815	62.8	74.6	70.7	66.8	65.4	61.7	58.2	54.0	11.8
2000	531	1830	63.2	74.7	70.4	68.2	66.3	61.8	58.6	55.2	11.5
2000	531	1845	63.0	75.4	70.5	67.7	65.9	61.9	57.1	50.1	12.4
2000	531	1900	64.1	81.5	72.7	69.2	66.6	62.0	58.0	49.4	17.4
2000	531	1915	63.8	78.9	74.0	68.5	65.9	61.6	57.3	51.2	15.1
2000	531	1930	62.0	74.3	69.9	66.5	64.9	60.7	56.7	51.9	12.3
2000	531	1945	64.8	82.3	75.7	70.2	67.7	61.2	56.7	52.4	17.5
2000	531	2000	62.2	72.3	70.4	67.6	65.7	60.4	54.2	49.0	10.1
2000	531	2015	61.5	74.7	69.8	66.6	64.9	59.7	54.1	48.1	13.2
2000	531	2030	61.3	74.4	69.4	65.7	64.1	60.0	54.7	49.8	13.1
2000	531	2045	62.0	74.4	71.6	67.4	64.7	59.8	54.5	50.4	12.4
2000	531	2100	61.7	80.4	70.0	65.4	63.4	59.1	52.2	46.9	18.7
2000	531	2115	61.7	76.0	70.4	67.0	65.3	59.5	54.6	47.3	14.3
2000	531	2130	60.8	71.6	69.3	66.6	63.8	59.0	52.4	47.1	10.8
2000	531	2145	60.7	72.5	69.0	66.3	64.0	58.8	52.5	45.7	11.8
2000	531	2200	60.3	72.6	69.4	65.0	63.4	58.4	52.8	45.9	12.3
2000	531	2215	60.4	73.0	71.0	65.5	62.8	57.8	51.9	46.1	12.6
2000	531	2230	58.9	70.9	68.1	62.8	61.6	57.5	50.8	43.4	12.0
2000	531	2245	61.6	75.0	70.6	67.9	65.5	58.9	51.9	46.7	13.4
2000	531	2300	60.3	71.9	69.8	67.0	62.9	57.7	50.6	43.2	11.6
2000	531	2315	59.9	74.2	69.5	65.0	62.6	57.5	51.0	44.9	14.3
2000	531	2330	59.8	71.8	69.2	66.2	63.1	56.8	49.3	43.7	12.0
2000	531	2345	58.8	72.6	69.3	65.1	61.9	54.8	47.8	42.2	13.8
2000	531	0	61.1	80.1	72.7	67.3	63.1	54.8	45.8	38.2	19.0

DAY 5	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**63.2**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**59.8**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**64.2**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**61.0**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**66.7**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**56.9**	dB(A)

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YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	531	2215	60.4	73.0	71.0	65.5	62.8	57.8	51.9	46.1	12.6
2000	531	2230	58.9	70.9	68.1	62.8	61.6	57.5	50.8	43.4	12.0
2000	531	2245	61.6	75.0	70.6	67.9	65.5	58.9	51.9	46.7	13.4
2000	531	2300	60.3	71.9	69.8	67.0	62.9	57.7	50.6	43.2	11.6
2000	531	2315	59.9	74.2	69.5	65.0	62.6	57.5	51.0	44.9	14.3
2000	531	2330	59.8	71.8	69.2	66.2	63.1	56.8	49.3	43.7	12.0
2000	531	2345	58.8	72.6	69.3	65.1	61.9	54.8	47.8	42.2	13.8
2000	531	0	61.1	80.1	72.7	67.3	63.1	54.8	45.8	38.2	19.0
2000	601	15	55.2	70.2	65.8	60.4	58.6	50.9	42.2	36.7	15.0
2000	601	30	57.4	72.1	69.3	62.8	60.3	52.5	45.0	38.0	14.7
2000	601	45	56.0	73.8	68.2	61.2	58.8	49.6	41.2	36.8	17.8
2000	601	100	58.2	75.5	70.7	64.7	60.3	50.7	40.3	36.3	17.3
2000	601	115	58.3	75.0	72.0	64.1	60.7	50.0	42.8	36.7	16.7
2000	601	130	57.2	76.2	70.4	63.1	58.8	46.5	39.9	35.8	19.0
2000	601	145	55.9	71.5	69.4	60.9	57.9	47.0	36.7	33.5	15.6
2000	601	200	57.0	72.1	69.4	63.3	60.4	48.8	38.6	33.5	15.1
2000	601	215	59.1	77.5	72.9	63.8	60.5	48.3	37.3	34.8	18.4
2000	601	230	57.3	74.5	71.1	63.3	59.4	45.2	39.4	36.0	17.2
2000	601	245	60.6	76.3	72.0	69.2	63.9	50.2	41.3	36.5	15.7
2000	601	300	59.5	72.8	70.2	67.8	64.4	50.9	41.2	35.9	13.3
2000	601	315	55.2	70.8	68.5	61.6	58.0	46.4	38.7	34.9	15.6
2000	601	330	61.7	74.4	71.7	69.1	66.9	55.3	45.5	39.5	12.7
2000	601	345	59.0	72.2	70.5	66.0	62.7	52.2	42.3	36.7	13.2
2000	601	400	60.1	75.9	71.9	68.1	63.5	50.8	40.5	35.8	15.8
2000	601	415	61.0	78.8	73.5	68.4	64.5	50.8	41.0	38.4	17.8
2000	601	430	61.9	74.4	71.9	68.9	65.7	57.4	49.3	44.5	12.5
2000	601	445	63.1	78.9	72.6	69.9	67.5	57.5	49.6	43.6	15.8
2000	601	500	62.3	73.5	72.0	69.3	66.9	58.2	51.5	45.9	11.2
2000	601	515	64.1	81.4	75.6	70.4	67.1	58.4	52.0	46.3	17.3
2000	601	530	66.1	81.8	75.5	71.1	69.0	63.7	57.6	53.4	15.7
2000	601	545	66.0	76.3	72.6	70.3	69.2	64.8	60.7	53.6	10.3
2000	601	600	66.9	80.1	76.0	70.8	69.7	65.1	60.3	54.2	13.2
2000	601	615	67.5	80.5	75.3	72.6	70.8	65.7	62.0	55.6	13.0
2000	601	630	66.9	79.6	73.9	70.8	69.5	65.8	62.7	57.8	12.7
2000	601	645	66.4	76.6	72.5	70.5	69.3	65.2	62.7	58.1	10.2
2000	601	700	65.2	75.1	71.9	69.5	67.9	64.2	59.6	53.5	9.9
2000	601	715	65.6	75.5	72.2	69.8	68.9	64.4	61.1	55.9	9.9
2000	601	730	63.9	70.9	70.9	68.6	67.9	64.3	62.3	56.0	7.0
2000	601	745	63.4	71.3	70.5	68.4	66.0	63.3	63.6	56.0	7.9
2000	601	800	65.0	80.6	72.4	68.2	67.5	64.4	63.0	60.2	15.6
2000	601	815	63.3	85.6	74.0	68.4	65.7	62.8	58.7	55.5	22.3
2000	601	830	63.0	75.1	69.3	67.3	65.7	63.9	61.2	55.5	12.1
2000	601	845	64.0	75.1	74.6	68.6	67.2	62.7	62.1	57.7	11.1
2000	601	900	63.8	79.4	72.9	68.7	67.9	63.8	60.7	54.2	15.6
2000	601	915	63.7	79.5	71.2	69.0	67.5	63.2	61.4	58.9	15.8
2000	601	930	63.9	79.1	72.2	69.4	68.0	63.2	60.2	54.7	15.2
2000	601	945	65.2	79.7	71.1	69.9	67.3	63.5	60.9	55.4	14.5
2000	601	1000	64.4	77.9	72.6	70.9	68.6	64.3	61.0	51.8	13.5
2000	601	1015	63.7	79.9	73.4	68.9	67.0	63.2	57.0	48.7	16.2
2000	601	1030	64.4	76.0	73.3	70.3	67.9	63.4	60.1	51.1	11.6
2000	601	1045	65.1	73.6	73.2	70.3	68.5	63.8	59.6	46.9	8.5
2000	601	1100	64.0	77.6	73.0	69.9	67.8	62.9	58.8	50.9	13.6
2000	601	1115	63.6	77.0	72.8	68.5	66.7	62.0	58.0	47.2	13.4
2000	601	1130	64.8	78.1	73.1	69.0	68.0	62.4	60.7	52.6	13.3
2000	601	1145	65.6	79.6	73.0	69.3	68.8	63.2	60.3	48.9	14.0
2000	601	1200	64.7	76.3	72.4	69.2	67.9	62.2	58.1	49.5	11.6
2000	601	1215	64.4	74.9	72.8	70.6	68.7	62.8	59.8	51.7	10.5
2000	601	1230	65.3	76.8	73.0	69.5	68.6	62.8	58.0	49.7	11.5
2000	601	1245	65.7	85.4	74.9	70.3	69.7	64.0	61.3	53.7	19.7
2000	601	1300	64.4	72.2	71.1	69.6	66.9	63.6	57.6	49.9	7.8
2000	601	1315	63.8	76.2	72.3	69.2	68.2	62.1	58.9	51.7	12.4
2000	601	1330	63.2	73.2	71.0	68.5	66.6	62.6	59.4	47.4	10.0
2000	601	1345	63.5	76.5	72.2	69.6	68.1	61.9	59.8	54.9	13.0
2000	601	1400	64.0	79.1	73.6	69.9	67.7	63.5	57.2	50.4	15.1
2000	601	1415	63.5	70.3	71.3	69.5	66.6	62.9	61.7	58.0	6.8
2000	601	1430	64.5	79.1	72.9	69.2	68.3	63.5	60.4	55.5	14.6
2000	601	1445	64.1	74.1	72.3	68.9	67.9	64.1	62.3	59.2	10.0
2000	601	1500	64.1	76.7	72.2	68.0	66.2	62.2	59.2	51.4	12.6
2000	601	1515	64.9	83.1	71.8	70.1	68.3	62.2	60.9	55.4	18.2
2000	601	1530	65.5	82.7	76.2	73.5	71.0	60.3	58.1	53.4	17.2
2000	601	1545	60.6	78.6	69.1	65.2	63.3	60.9	58.0	55.5	18.0
2000	601	1600	61.5	80.6	68.4	67.3	64.6	60.7	58.4	57.9	19.1
2000	601	1615	62.5	81.9	71.5	68.2	65.4	61.5	59.9	53.5	19.4
2000	601	1630	61.1	77.3	69.7	66.4	64.9	60.9	58.8	53.3	16.2
2000	601	1645	64.5	88.6	71.8	68.3	66.4	61.5	58.9	54.7	24.1
2000	601	1700	61.1	70.4	69.4	66.3	64.2	59.3	58.0	51.9	9.3
2000	601	1715	61.0	73.7	68.2	65.1	63.0	60.2	58.4	53.9	12.7
2000	601	1730	60.9	74.1	69.8	66.5	64.8	61.1	57.6	53.6	13.2
2000	601	1745	60.2	73.3	69.0	65.5	62.5	59.8	57.9	52.5	13.1
2000	601	1800	62.1	70.3	70.6	67.5	64.2	61.0	57.2	53.7	8.2
2000	601	1815	60.3	72.1	68.9	64.7	63.0	60.8	58.1	54.5	11.8
2000	601	1830	63.5	76.3	73.6	67.6	65.7	60.9	57.9	52.7	12.8
2000	601	1845	64.6	83.3	70.9	68.4	66.7	63.6	62.4	54.3	18.7
2000	601	1900	64.5	79.5	70.9	69.0	67.0	63.0	61.3	52.3	15.0
2000	601	1915	65.1	85.4	76.9	67.6	64.4	62.7	58.7	46.2	20.3
2000	601	1930	62.1	71.1	70.5	66.8	65.0	62.8	59.0	53.1	9.0
2000	601	1945	63.0	74.2	70.8	67.5	66.0	61.3	58.2	51.5	11.2
2000	601	2000	62.0	71.0	70.7	67.1	66.1	62.4	55.5	50.0	9.0
2000	601	2015	61.7	78.9	71.4	67.0	65.1	61.5	57.9	49.5	17.2
2000	601	2030	62.2	77.9	70.3	67.3	65.2	60.1	54.7	48.9	15.7
2000	601	2045	62.7	80.0	72.0	65.9	64.1	61.4	53.0	47.3	17.3
2000	601	2100	61.7	80.2	70.3	66.7	65.9	61.4	54.0	46.4	18.5
2000	601	2115	62.0	81.2	73.1	66.1	65.0	62.0	56.9	51.2	19.2
2000	601	2130	61.1	75.2	69.3	66.0	65.1	60.4	55.2	47.4	14.1
2000	601	2145	61.9	71.8	70.0	66.8	64.6	60.3	57.1	52.7	9.9
2000	601	2200	60.9	74.2	71.3	65.9	64.4	60.0	54.3	49.5	13.3
2000	601	2215	61.1	73.9	69.9	66.9	64.1	59.4	51.4	42.2	12.8
2000	601	2230	61.9	71.3	70.9	66.4	63.8	60.7	53.7	46.4	9.4
2000	601	2245	60.3	72.2	69.8	66.4	65.1	58.3	50.3	46.1	11.9
2000	601	2300	60.3	71.0	70.8	66.5	63.4	58.8	49.0	42.7	10.7
2000	601	2315	61.3	74.7	69.3	66.2	62.9	59.5	50.0	43.8	13.4
2000	601	2330	59.7	74.9	68.5	65.2	62.1	55.8	46.8	41.6	15.2
2000	601	2345	59.1	74.7	70.3	66.1	63.1	56.5	47.4	40.7	15.6
2000	601	0	58.3	72.6	69.0	63.5	60.5	52.8	41.3	37.9	14.3

DAY 6	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**63.1**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**61.0**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**63.6**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**62.2**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**66.3**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**57.0**	dB(A)

54 Davina Crescent, Cecil Hills — DAY 7

Friday 2 June 2000 — RT&A S/N 81

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	601	2215	61.1	73.9	69.9	66.9	64.1	59.4	51.4	42.2	12.8
2000	601	2230	61.9	71.3	70.9	66.4	63.8	60.7	53.7	46.4	9.4
2000	601	2245	60.3	72.2	69.8	66.4	65.1	58.3	50.3	46.1	11.9
2000	601	2300	60.3	71.0	70.8	66.5	63.4	58.8	49.0	42.7	10.7
2000	601	2315	61.3	74.7	69.3	66.2	62.9	59.5	50.0	43.8	13.4
2000	601	2330	59.7	74.9	68.5	65.2	62.1	55.8	46.8	41.6	15.2
2000	601	2345	59.1	74.7	70.3	66.1	63.1	56.5	47.4	40.7	15.6
2000	601	0	58.3	72.6	69.0	63.5	60.5	52.8	41.3	37.9	14.3
2000	602	15	57.6	73.0	69.1	63.9	61.3	52.6	44.6	37.5	15.4
2000	602	30	55.9	68.8	67.3	62.5	59.4	52.0	41.5	34.2	12.9
2000	602	45	57.9	71.0	68.4	62.7	61.0	51.9	41.4	34.2	13.1
2000	602	100	54.3	73.1	66.9	61.4	58.6	45.2	33.4	31.8	18.8
2000	602	115	56.9	69.9	68.1	61.8	60.3	50.0	38.2	33.5	13.0
2000	602	130	58.1	71.8	68.8	64.2	60.3	48.3	39.7	31.4	13.7
2000	602	145	58.3	75.0	70.2	65.9	61.0	46.3	38.3	33.4	16.7
2000	602	200	57.4	71.0	68.7	65.0	60.0	43.8	33.1	33.4	13.6
2000	602	215	56.6	75.9	68.2	62.6	60.5	45.7	36.9	32.1	19.3
2000	602	230	59.1	70.7	69.7	66.7	63.4	46.0	40.0	35.3	11.6
2000	602	245	53.2	65.7	66.5	59.3	56.4	36.2	34.2	31.5	12.5
2000	602	300	57.3	72.0	69.2	66.3	62.0	44.6	37.7	34.9	14.7
2000	602	315	58.7	73.1	71.3	64.7	62.4	47.0	37.7	34.6	14.4
2000	602	330	60.2	78.9	72.9	66.6	62.3	48.1	37.4	33.0	18.7
2000	602	345	56.3	71.5	67.6	62.5	60.6	48.4	38.0	36.1	15.2
2000	602	400	58.9	70.2	70.1	66.5	62.4	50.9	37.3	34.6	11.3
2000	602	415	60.2	73.0	71.8	66.5	62.9	51.9	42.2	36.1	12.8
2000	602	430	61.7	73.3	70.6	68.6	65.8	55.0	46.6	40.2	11.6
2000	602	445	63.5	82.4	74.5	69.2	65.7	57.0	44.7	40.2	18.9
2000	602	500	60.9	70.3	70.0	68.5	66.3	57.7	47.4	42.9	9.4
2000	602	515	61.9	75.7	72.4	68.3	66.9	59.7	51.1	39.5	13.8
2000	602	530	64.4	74.7	72.6	68.8	67.8	63.2	58.5	49.4	10.3
2000	602	545	65.2	77.8	71.6	68.9	67.1	64.8	61.7	54.7	12.6
2000	602	600	65.7	78.9	72.3	70.7	69.2	64.9	60.1	51.8	13.2
2000	602	615	64.5	71.7	70.6	69.8	68.2	64.4	63.7	55.3	7.2
2000	602	630	65.9	74.1	71.6	69.9	68.3	64.7	63.2	57.9	8.2
2000	602	645	64.8	75.6	71.5	69.2	68.9	65.2	62.1	55.3	10.8
2000	602	700	65.4	74.2	71.9	70.1	68.4	64.1	61.3	58.1	8.8
2000	602	715	65.0	74.8	71.5	69.6	67.0	63.2	60.2	55.2	9.8
2000	602	730	65.5	74.1	70.9	68.4	66.9	64.3	63.5	61.5	8.6
2000	602	745	64.4	75.6	71.1	69.9	68.2	65.2	63.6	59.7	11.2
2000	602	800	62.3	76.4	70.7	68.1	65.5	61.9	58.4	52.1	14.1
2000	602	815	65.4	81.4	73.5	69.5	66.5	62.9	60.3	56.9	16.0
2000	602	830	64.3	77.8	71.7	68.7	68.0	64.7	60.9	55.8	13.5
2000	602	845	63.9	78.9	72.4	68.9	66.5	64.0	62.3	56.5	15.0
2000	602	900	65.3	81.6	74.6	71.4	69.2	65.1	62.9	60.3	16.3
2000	602	915	64.6	75.3	72.0	69.8	67.0	62.5	59.4	53.3	10.7
2000	602	930	66.5	88.1	74.0	70.6	69.4	64.9	61.9	53.5	21.6
2000	602	945	65.1	81.5	74.9	70.1	68.1	64.3	60.8	56.2	16.4
2000	602	1000	65.3	77.4	72.1	69.1	67.5	64.4	58.1	51.4	12.1
2000	602	1015	65.3	80.0	70.7	70.0	68.4	63.8	60.9	54.1	14.7
2000	602	1030	64.9	74.5	74.6	71.3	69.1	63.7	60.1	50.0	9.6
2000	602	1045	67.8	87.5	80.4	72.5	70.0	64.1	63.6	54.2	19.7
2000	602	1100	62.9	73.6	71.0	68.6	65.9	62.5	59.3	55.1	10.7
2000	602	1115	66.1	85.4	74.0	70.6	68.5	63.8	61.9	53.4	19.3
2000	602	1130	64.6	76.4	71.4	69.8	66.7	63.8	58.8	49.0	11.8
2000	602	1145	64.4	74.2	71.4	68.5	67.0	62.5	59.7	50.4	9.8
2000	602	1200	64.5	76.2	74.8	69.7	67.8	62.7	61.1	51.8	11.7
2000	602	1215	63.7	81.8	72.9	68.2	67.3	63.3	59.8	54.1	18.1
2000	602	1230	64.1	77.4	70.0	67.7	67.2	63.5	61.8	53.3	13.3
2000	602	1245	63.6	73.9	69.5	68.6	66.8	63.2	57.8	52.1	10.3
2000	602	1300	63.8	75.3	71.4	67.6	66.0	63.2	58.2	51.3	11.5
2000	602	1315	64.2	83.1	72.4	67.8	67.1	62.1	58.7	53.3	18.9
2000	602	1330	64.6	87.1	74.5	70.3	67.0	62.7	59.1	50.2	22.5
2000	602	1345	64.2	81.3	70.8	69.1	67.1	63.5	59.5	54.0	17.1
2000	602	1400	64.2	76.6	71.4	68.8	67.2	62.8	58.1	46.5	12.4
2000	602	1415	64.5	77.1	71.2	68.1	67.4	63.9	60.5	51.4	12.6
2000	602	1430	64.5	77.0	75.4	69.0	67.2	64.0	61.7	53.3	12.5
2000	602	1445	64.0	77.5	75.0	69.4	67.0	63.8	61.0	53.8	13.5
2000	602	1500	63.9	78.0	75.9	68.8	66.8	62.0	60.2	53.3	14.1
2000	602	1515	63.8	78.6	75.5	68.1	65.2	61.7	60.8	55.3	14.8
2000	602	1530	62.2	79.1	74.4	67.1	65.2	59.7	59.4	56.4	16.9
2000	602	1545	63.6	73.8	74.0	67.7	65.8	61.2	59.6	53.1	10.2
2000	602	1600	61.4	74.7	69.7	67.5	65.8	60.4	57.9	55.2	13.3
2000	602	1615	61.7	72.3	68.8	66.1	63.9	59.7	56.5	53.9	10.6
2000	602	1630	62.0	73.6	70.0	66.8	65.5	59.3	58.2	51.4	11.6
2000	602	1645	61.6	70.2	68.4	65.2	64.6	60.2	58.2	53.7	8.6
2000	602	1700	63.0	73.0	70.3	67.3	65.2	61.5	60.9	56.5	10.0
2000	602	1715	62.0	70.7	68.6	66.7	64.8	61.4	58.4	50.7	8.7
2000	602	1730	59.9	78.3	68.2	64.8	62.6	59.9	56.8	54.8	18.4
2000	602	1745	59.2	72.3	67.0	63.6	62.7	59.8	57.9	52.7	13.1
2000	602	1800	61.4	76.9	70.6	65.2	63.9	59.4	57.3	53.8	15.5
2000	602	1815	59.9	65.9	66.8	64.0	63.4	59.9	59.0	54.6	6.0
2000	602	1830	60.5	73.9	67.8	63.5	63.1	58.8	56.3	49.7	13.4
2000	602	1845	61.8	72.5	69.5	67.3	64.2	62.3	60.4	53.4	10.7
2000	602	1900	62.4	76.9	69.2	67.3	63.7	62.0	58.1	51.2	14.5
2000	602	1915	62.3	68.8	67.9	66.6	64.0	61.3	57.7	47.7	6.5
2000	602	1930	62.8	72.1	70.0	66.0	64.0	61.6	60.5	53.9	9.3
2000	602	1945	61.7	73.3	70.2	66.5	65.5	62.4	56.5	48.5	11.6
2000	602	2000	63.0	78.8	75.3	66.7	65.3	60.7	56.2	50.0	15.8
2000	602	2015	62.3	71.4	69.7	67.3	63.9	60.6	55.6	48.2	9.1
2000	602	2030	61.4	72.0	67.9	65.9	63.0	61.1	57.1	47.3	10.6
2000	602	2045	62.0	73.3	69.0	65.9	64.0	60.0	56.3	50.4	11.3
2000	602	2100	60.7	71.3	67.3	65.3	63.6	60.2	54.9	49.9	10.6
2000	602	2115	60.8	70.1	67.2	64.0	62.4	59.5	53.9	46.8	9.3
2000	602	2130	60.4	75.6	66.8	64.8	63.1	60.2	52.5	46.3	15.2
2000	602	2145	59.8	73.0	68.8	64.3	64.0	60.2	54.1	47.1	13.2
2000	602	2200	59.6	67.4	67.5	66.2	64.3	58.5	54.0	48.4	7.8
2000	602	2215	59.3	70.5	68.4	65.2	63.4	59.1	50.8	43.9	11.2
2000	602	2230	60.9	70.9	70.3	66.9	64.3	60.5	52.2	48.1	10.0
2000	602	2245	60.6	69.2	67.5	65.5	63.1	59.0	51.9	44.9	8.6
2000	602	2300	60.7	71.8	68.8	66.2	63.5	61.0	56.8	49.6	11.1
2000	602	2315	60.3	71.0	69.4	66.2	63.4	58.6	50.9	41.8	10.7
2000	602	2330	60.0	70.5	67.4	63.7	62.3	58.0	51.9	43.8	10.5
2000	602	2345	59.9	78.6	68.6	64.0	62.7	56.9	49.6	43.1	18.7
2000	602	0	60.3	73.6	71.9	64.0	62.3	56.9	46.8	42.2	13.3

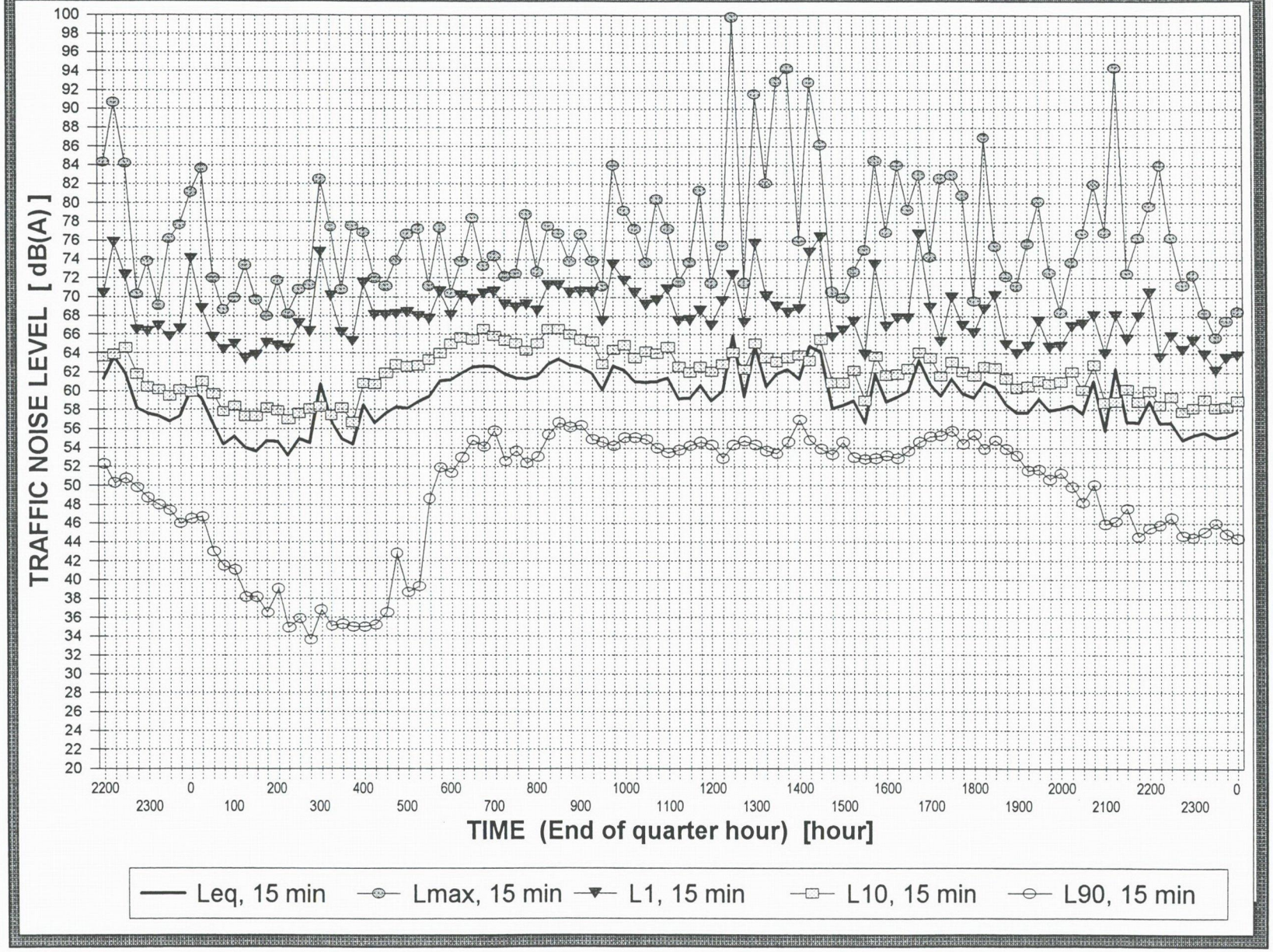
DAY 7	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**62.8**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**60.3**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**63.6**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**61.3**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**65.7**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**56.5**	dB(A)

75 Helena Road, Cecil Hills

DAY 1

Saturday 27 May 2000

Norsonics S/N 20244



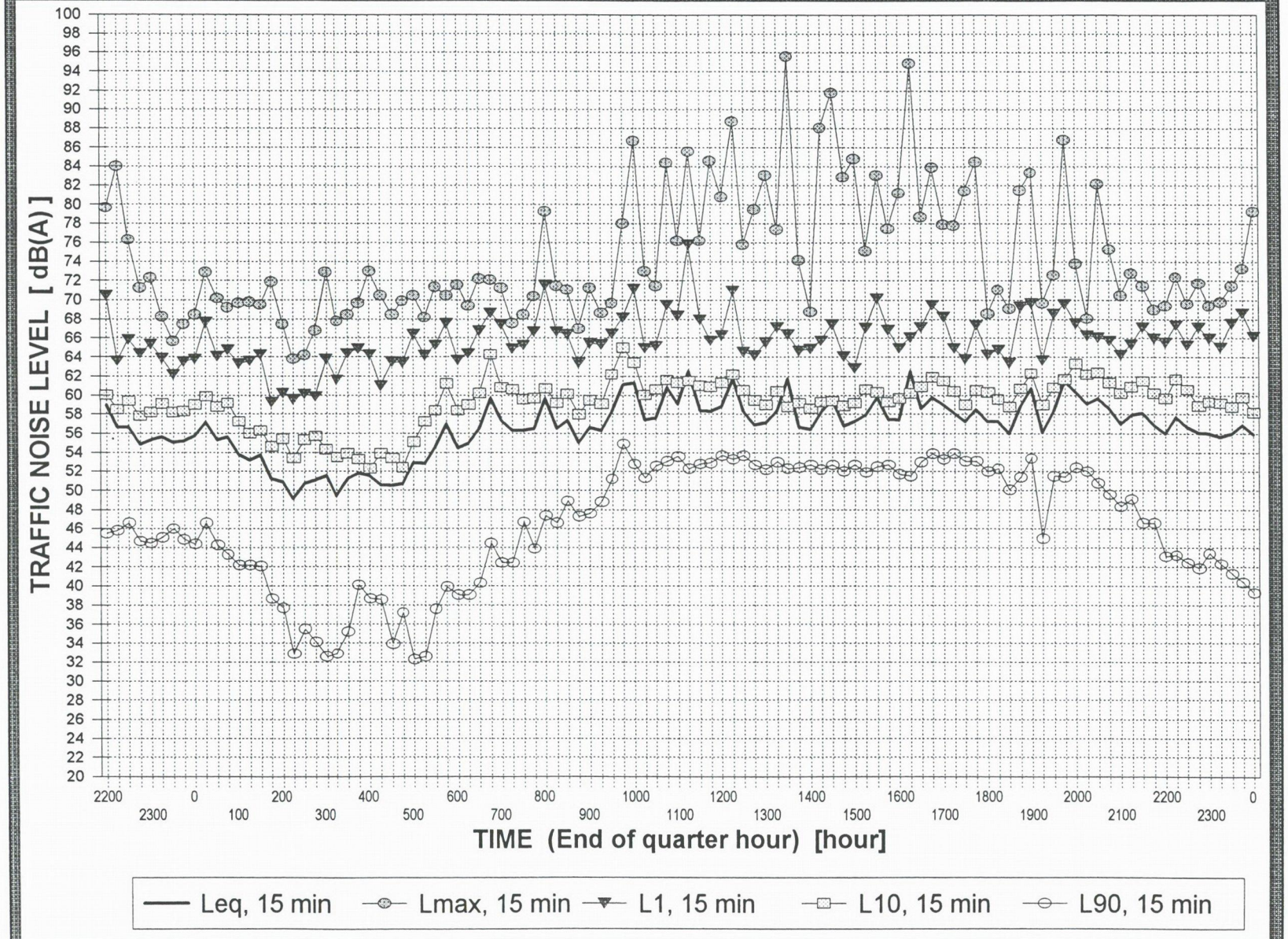
KOIKAS ACOUSTICS PTY LTD

75 Helena Road, Cecil Hills

DAY 2

Sunday 28 May 2000

Norsonics S/N 20244



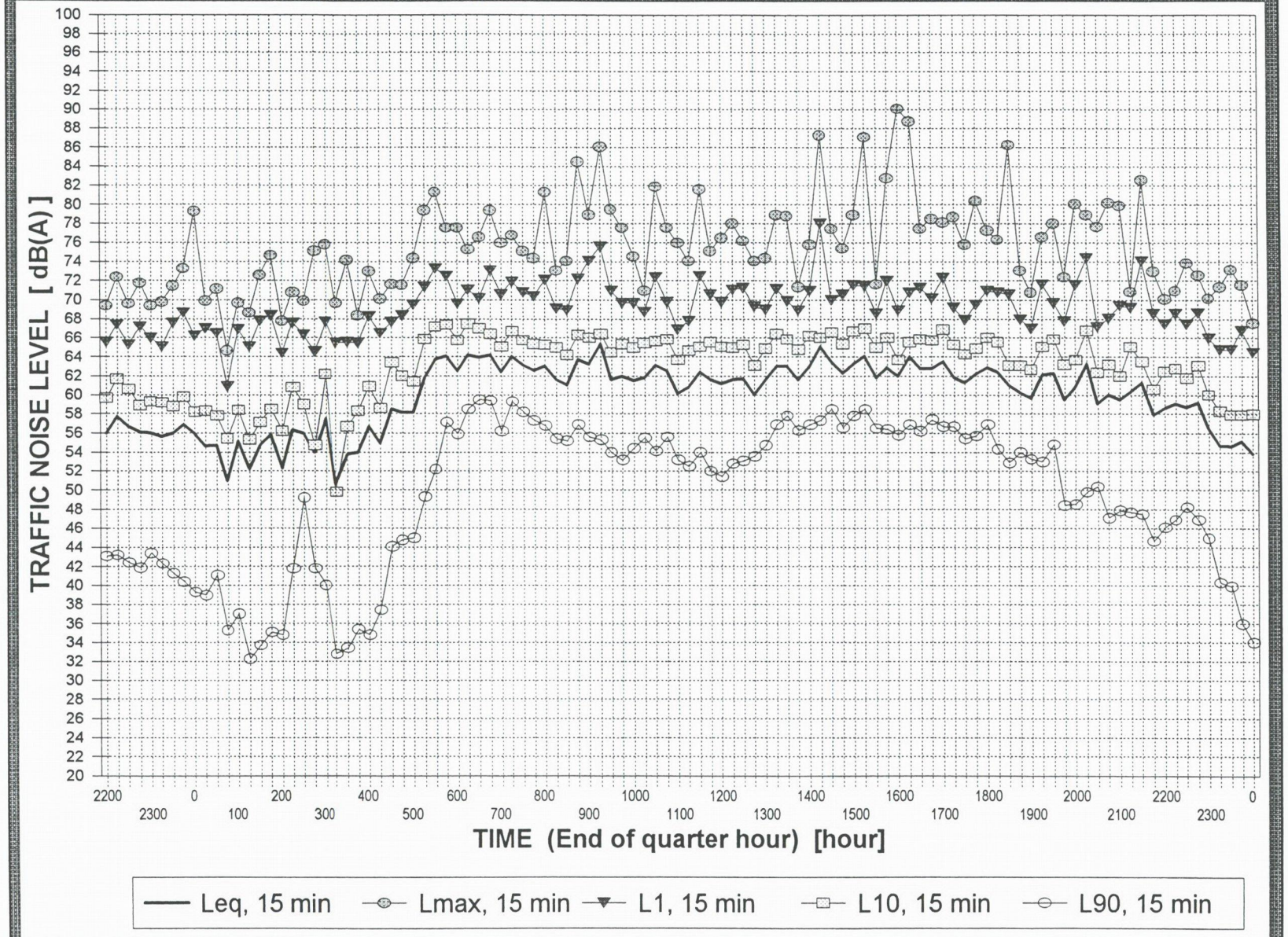
KOIKAS ACOUSTICS PTY LTD

75 Helena Road, Cecil Hills

DAY 3

Monday 29 May 2000

Norsonics S/N 20244



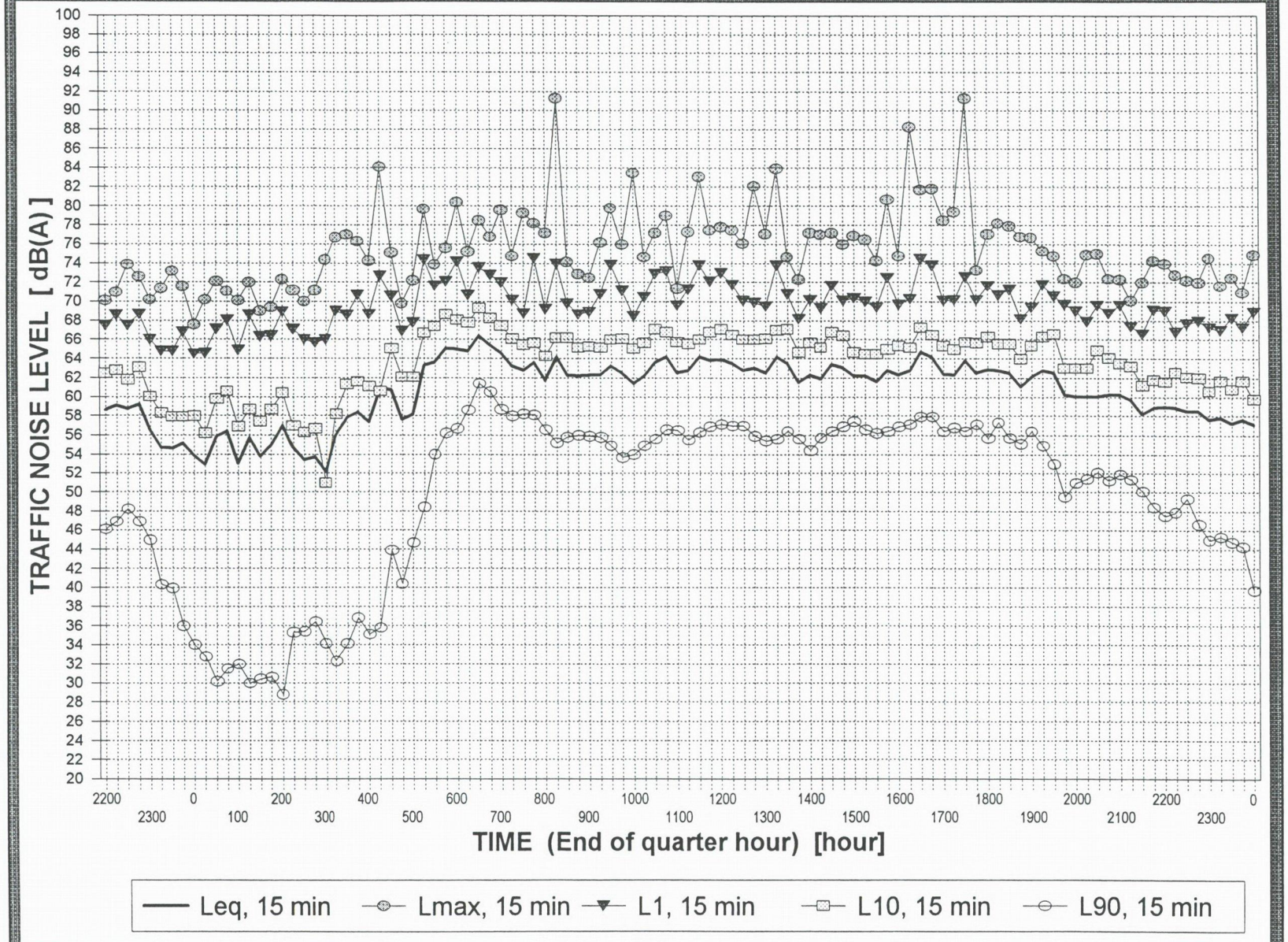
KOIKAS ACOUSTICS PTY LTD

75 Helena Road, Cecil Hills

DAY 4

Tuesday 30 May 2000

Norsonics S/N 20244



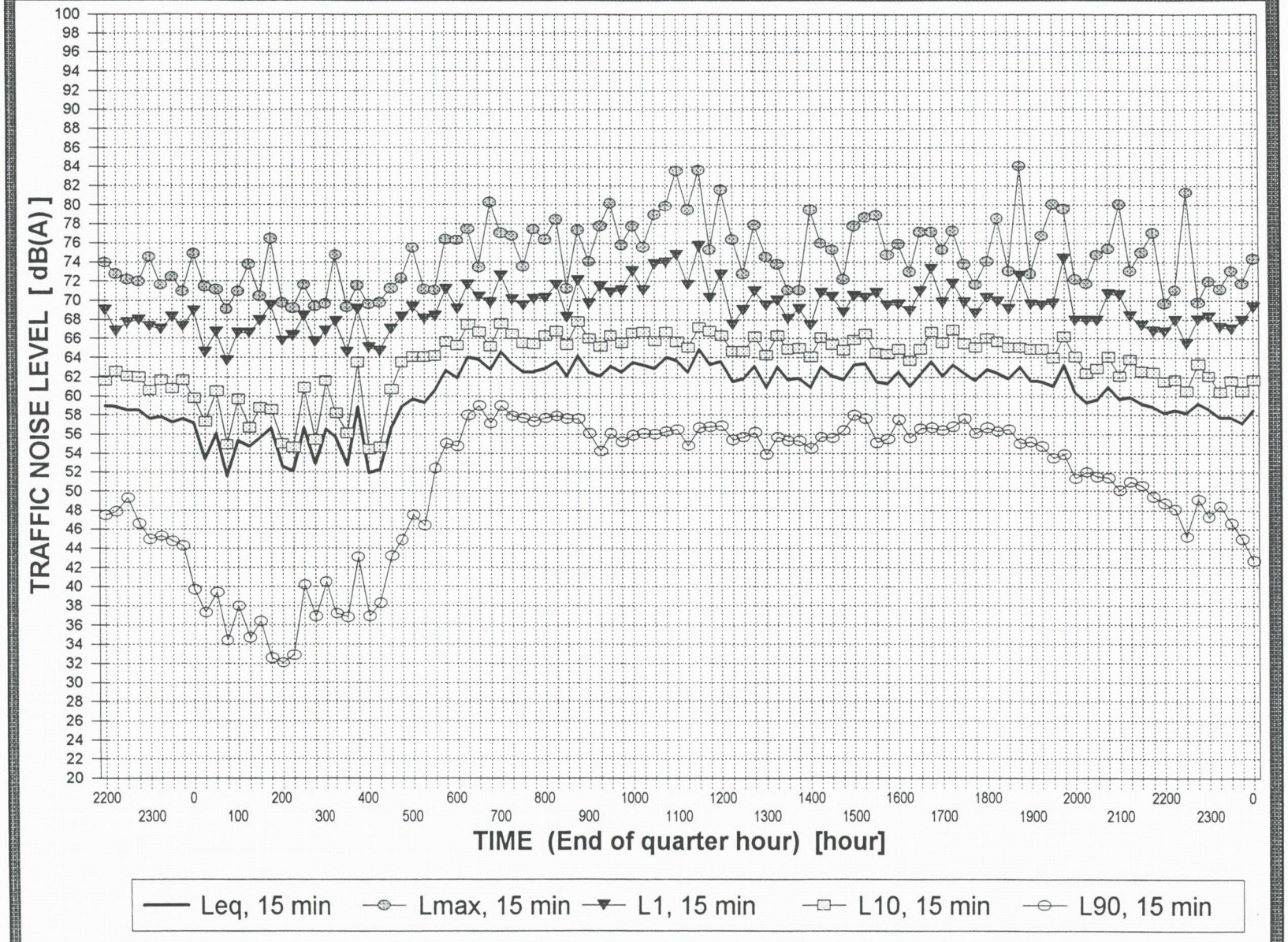
KOIKAS ACOUSTICS PTY LTD

75 Helena Road, Cecil Hills

DAY 5

Wednesday 31 May 2000

Norsonics S/N 20244



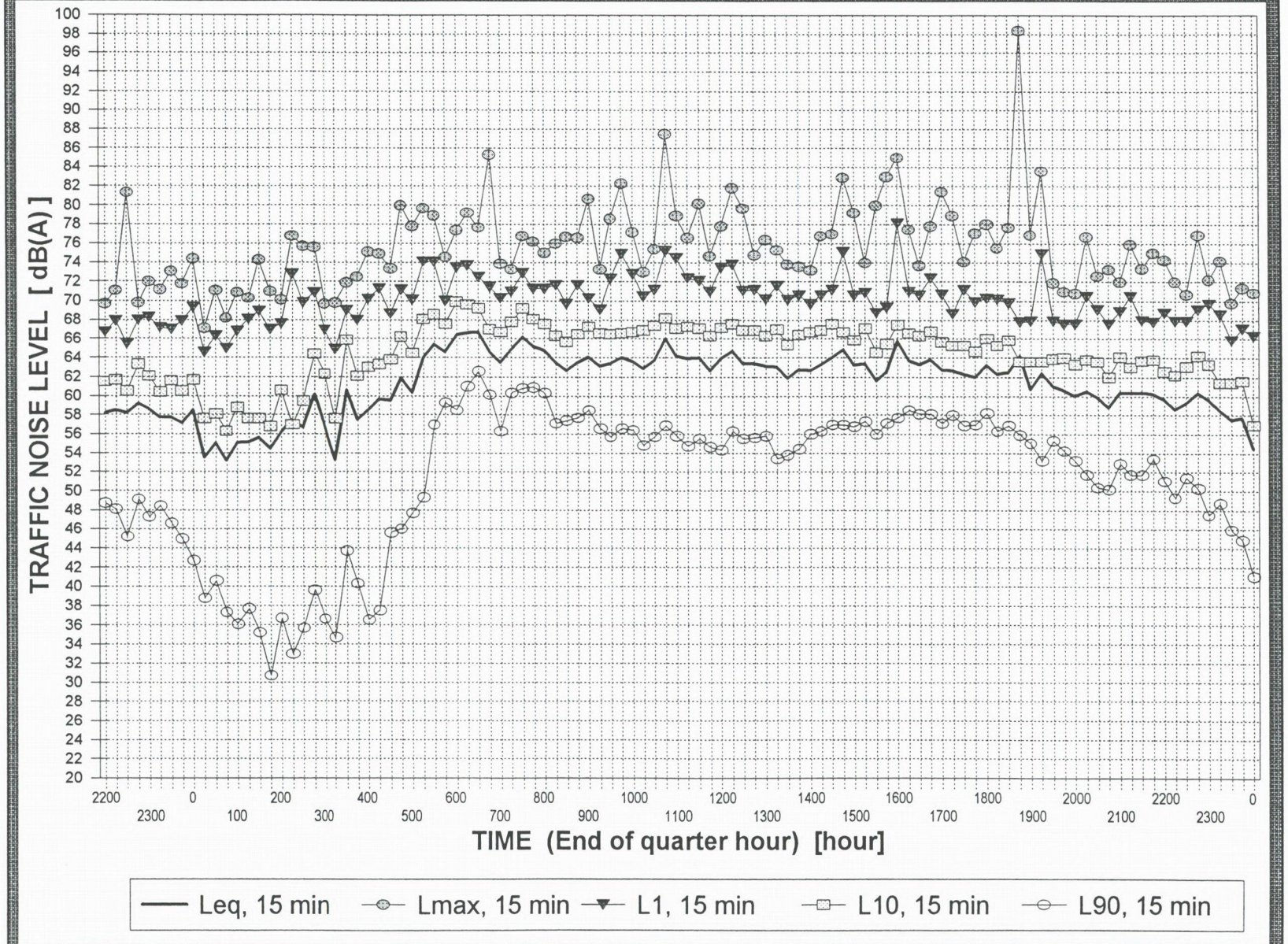
KOIKAS ACOUSTICS PTY LTD

75 Helena Road, Cecil Hills

DAY 6

Thursday 1 June 2000

Norsonics S/N 20244



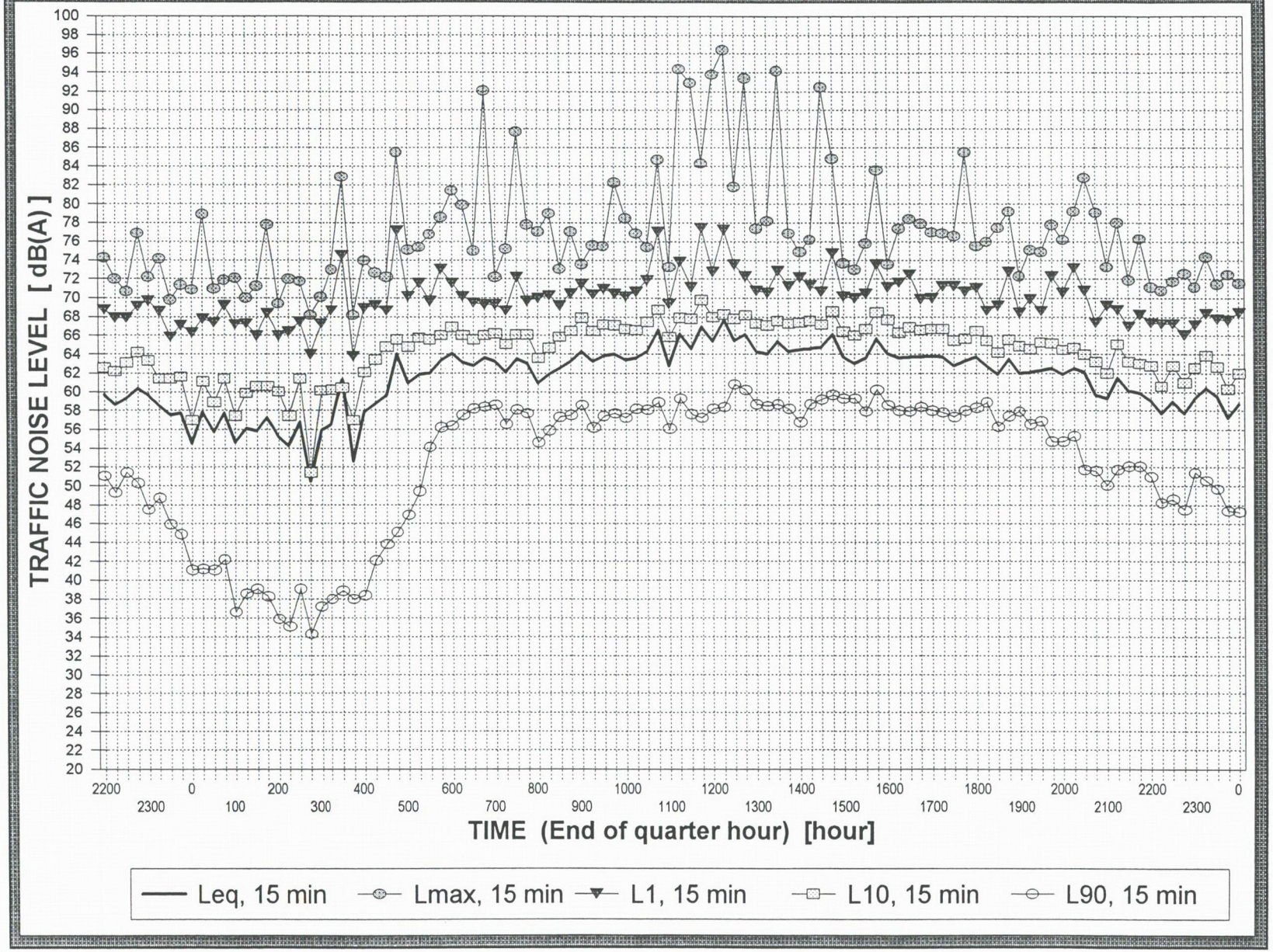
KOIKAS ACOUSTICS PTY LTD

75 Helena Road, Cecil Hills

DAY 7

Friday 2 June 2000

Norsonics S/N 20244



KOIKAS ACOUSTICS PTY LTD

75 Helena Road, Cecil Hills											DAY 1
Saturday 27 May 2000											Norsonics S/N 20244
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	526	2215	63.6	90.7	75.8	67.3	63.9	57.0	50.3	40.2	27.1
2000	526	2230	61.9	84.2	72.3	67.3	64.6	57.0	50.8	44.4	22.3
2000	526	2245	58.2	70.3	66.5	63.6	61.8	56.1	49.8	43.1	12.1
2000	526	2300	57.6	73.8	66.3	62.4	60.4	55.4	48.7	39.8	16.2
2000	526	2315	57.3	69.1	66.9	62.7	60.1	54.8	48.0	42.1	11.8
2000	526	2330	56.8	76.2	65.8	61.7	59.5	54.3	47.4	40.7	19.4
2000	526	2345	57.3	77.7	66.6	63.0	60.1	54.8	46.0	39.7	20.4
2000	526	0	60.1	81.1	74.1	63.5	59.9	53.6	46.5	37.0	21.0
2000	527	15	59.2	83.7	68.8	63.5	61.0	54.4	46.7	35.8	24.5
2000	527	30	56.5	72.0	65.7	61.7	59.7	53.8	43.0	34.8	15.5
2000	527	45	54.3	68.7	64.4	59.3	57.8	51.3	41.5	36.7	14.4
2000	527	100	55.2	69.9	65.0	61.1	58.4	51.7	41.1	32.9	14.7
2000	527	115	54.0	73.4	63.4	59.2	57.3	50.9	38.2	32.9	19.4
2000	527	130	53.6	69.7	63.8	59.3	57.3	49.1	38.2	33.8	16.1
2000	527	145	54.7	68.0	65.1	60.8	58.2	50.5	36.5	30.4	13.3
2000	527	200	54.6	71.8	64.8	59.8	57.9	49.7	39.1	32.7	17.2
2000	527	215	53.2	68.2	64.5	59.1	57.0	45.9	34.9	29.6	15.0
2000	527	230	54.9	70.8	67.2	60.2	57.6	49.2	35.9	31.0	15.9
2000	527	245	54.5	71.3	66.3	61.8	58.1	44.8	33.6	30.6	16.8
2000	527	300	60.7	82.5	74.8	62.9	58.3	47.6	36.8	34.1	21.8
2000	527	315	57.0	77.5	70.1	61.4	57.4	43.8	35.1	31.3	20.5
2000	527	330	54.9	70.8	66.2	62.3	58.2	46.2	35.3	32.5	15.9
2000	527	345	54.3	77.6	65.3	59.5	56.7	44.9	35.0	31.3	23.3
2000	527	400	58.5	76.9	71.5	64.5	60.8	47.8	35.0	28.4	18.4
2000	527	415	56.6	72.0	68.1	63.9	60.7	46.8	35.2	30.1	15.4
2000	527	430	57.6	71.2	68.1	64.7	61.9	51.0	36.5	32.7	13.6
2000	527	445	58.3	73.9	68.2	65.1	62.8	53.5	42.8	34.6	15.6
2000	527	500	58.1	76.7	68.4	65.3	62.6	51.0	38.7	34.3	18.6
2000	527	515	58.9	77.3	68.0	65.5	62.7	54.1	39.3	33.5	18.4
2000	527	530	59.4	71.2	67.7	65.2	63.3	56.7	48.6	37.9	11.8
2000	527	545	61.0	77.4	70.6	66.5	64.0	58.2	51.9	41.6	16.4
2000	527	600	61.2	70.4	68.1	66.4	65.0	59.6	51.3	42.5	9.2
2000	527	615	61.9	73.8	70.2	67.3	65.7	59.8	53.0	42.9	11.9
2000	527	630	62.5	78.4	69.8	66.9	65.5	60.4	54.8	45.5	15.9
2000	527	645	62.7	73.3	70.4	68.2	66.6	60.4	54.1	45.5	10.6
2000	527	700	62.6	74.4	70.6	67.6	65.9	60.7	55.8	48.2	11.8
2000	527	715	61.8	72.2	69.2	66.8	65.4	60.0	52.6	45.9	10.4
2000	527	730	61.4	72.5	68.9	66.6	65.1	59.4	53.7	48.6	11.1
2000	527	745	61.3	78.8	69.2	65.7	64.3	59.4	52.4	46.5	17.5
2000	527	800	61.6	72.7	68.6	66.6	65.1	60.1	53.1	44.9	11.1
2000	527	815	62.9	77.6	71.3	68.8	66.6	60.1	55.4	46.5	14.7
2000	527	830	63.4	76.8	71.3	68.3	66.6	61.1	56.7	49.1	13.4
2000	527	845	62.8	73.8	70.5	67.7	66.0	61.0	56.2	48.1	11.0
2000	527	900	62.5	76.7	70.6	67.4	65.5	60.3	56.4	48.9	14.2
2000	527	915	61.9	73.9	70.6	67.3	65.3	59.6	54.9	47.1	12.0
2000	527	930	60.1	71.2	67.5	64.5	62.9	58.8	54.6	48.4	11.1
2000	527	945	62.7	84.0	73.5	67.0	64.4	58.8	54.2	46.6	21.3
2000	527	1000	62.2	79.2	71.8	67.1	64.9	59.1	55.1	49.5	17.0
2000	527	1015	61.0	77.3	70.5	65.5	63.5	58.6	55.1	48.5	16.3
2000	527	1030	60.9	73.7	69.2	65.8	64.2	58.5	54.9	48.9	12.8
2000	527	1045	61.0	80.4	69.7	65.7	64.0	58.6	54.0	46.5	19.4
2000	527	1100	61.4	77.3	70.9	66.1	64.7	58.4	53.5	47.9	15.9
2000	527	1115	59.2	71.6	67.5	64.1	62.6	57.0	53.8	47.4	12.4
2000	527	1130	59.3	73.7	67.6	63.7	62.0	57.1	54.2	50.9	14.4
2000	527	1145	60.6	81.3	68.6	64.4	62.6	57.9	54.6	50.8	20.7
2000	527	1200	59.0	71.5	67.0	63.9	62.1	56.9	54.3	50.5	12.5
2000	527	1215	60.0	75.5	69.6	65.1	62.9	56.9	52.9	47.4	15.5
2000	527	1230	65.9	99.8	72.4	66.5	64.1	57.4	54.3	51.6	33.9
2000	527	1245	59.4	71.5	67.3	63.9	62.3	57.6	54.7	50.5	12.1
2000	527	1300	64.7	91.6	75.7	68.6	65.1	57.7	54.3	48.7	26.9
2000	527	1315	60.5	82.1	70.1	65.8	63.5	57.2	53.7	49.7	21.6
2000	527	1330	61.8	92.9	69.0	64.7	63.1	57.5	53.4	48.3	31.1
2000	527	1345	62.3	94.3	68.4	64.9	63.5	58.6	54.6	50.5	32.0
2000	527	1400	61.3	76.0	68.8	65.3	63.8	59.9	57.0	54.3	14.7
2000	527	1415	64.8	92.8	74.8	65.6	63.2	58.1	54.8	49.9	28.0
2000	527	1430	64.2	86.2	76.4	68.8	65.5	57.7	53.9	48.6	22.0
2000	527	1445	58.1	70.6	65.8	62.4	60.9	56.5	53.3	48.9	12.5
2000	527	1500	58.5	69.9	66.5	62.4	60.9	57.1	54.6	51.3	11.4
2000	527	1515	59.0	72.7	67.4	64.1	62.2	56.8	53.0	47.0	13.7
2000	527	1530	56.7	75.0	63.9	60.9	59.0	55.4	52.8	47.9	18.3
2000	527	1545	61.8	84.5	73.5	66.2	63.7	56.8	52.9	47.4	22.7
2000	527	1600	58.9	76.9	66.9	63.2	61.7	56.9	53.2	47.8	18.0
2000	527	1615	59.4	84.0	67.8	63.8	61.8	56.7	52.9	47.5	24.6
2000	527	1630	60.0	79.3	67.8	63.9	62.4	57.9	53.7	45.1	19.3
2000	527	1645	63.3	83.0	76.7	66.9	64.1	58.0	54.6	48.1	19.7
2000	527	1700	60.7	74.3	68.9	65.2	63.5	59.0	55.2	48.1	13.6
2000	527	1715	59.5	82.6	65.3	62.9	61.6	58.5	55.3	45.4	23.1
2000	527	1730	61.3	83.0	70.0	65.1	63.1	58.9	55.8	48.9	21.7
2000	527	1745	59.8	80.8	67.0	63.6	62.1	57.8	54.4	47.9	21.0
2000	527	1800	59.3	69.6	66.2	63.1	61.6	58.3	55.4	47.3	10.3
2000	527	1815	60.9	87.0	68.8	64.2	62.6	58.0	53.9	46.0	26.1
2000	527	1830	60.4	75.4	70.2	64.3	62.5	58.4	54.8	46.5	15.0
2000	527	1845	58.6	72.2	65.0	62.5	61.3	57.5	53.9	46.0	13.6
2000	527	1900	57.7	71.2	64.0	61.6	60.3	56.8	53.2	44.6	13.5
2000	527	1915	57.7	75.7	64.8	61.8	60.5	56.5	51.6	45.0	18.0
2000	527	1930	59.2	80.2	67.5	63.0	61.1	56.9	51.7	40.9	21.0
2000	527	1945	57.9	72.6	64.7	62.2	60.8	56.6	50.7	41.7	14.7
2000	527	2000	58.1	68.4	64.8	61.9	61.0	57.3	51.3	42.9	10.3
2000	527	2015	58.5	73.7	66.9	63.7	62.1	56.1	49.9	40.1	15.2
2000	527	2030	57.6	76.8	67.2	61.8	60.1	55.3	48.2	38.9	19.2
2000	527	2045	61.1	82.0	68.1	63.9	62.8	57.6	50.1	43.3	20.9
2000	527	2100	55.8	76.9	64.0	60.1	58.8	53.7	45.9	39.8	21.1
2000	527	2115	62.4	94.4	68.1	60.9	58.9	53.4	46.2	39.7	32.0
2000	527	2130	56.8	72.5	65.6	61.9	60.2	54.2	47.6	41.8	15.7
2000	527	2145	56.7	76.3	68.0	61.1	58.9	53.1	44.6	39.5	19.6
2000	527	2200	59.0	79.7	70.5	62.4	60.0	53.9	45.5	38.8	20.7
2000	527	2215	56.6	84.0	63.6	59.7	58.5	53.7	45.8	38.6	27.4
2000	527	2230	56.7	76.3	65.9	60.9	59.4	54.2	46.6	37.6	19.6
2000	527	2245	54.8	71.3	64.4	59.5	57.8	52.8	44.7	39.9	16.5
2000	527	2300	55.3	72.3	65.4	60.3	58.2	52.4	44.5	38.3	17.0
2000	527	2315	55.6	68.3	63.9	60.7	59.1	53.6	45.1	34.2	12.7
2000	527	2330	55.0	65.7	62.2	59.7	58.2	53.4	46.0	39.3	10.7
2000	527	2345	55.2	67.5	63.5	59.8	58.3	53.7	44.9	35.8	12.3
2000	527	0	55.7	68.5	63.8	60.1	59.0	54.1	44.4	37.1	12.8

DAY 1	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**60.1**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**58.0**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**61.0**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**58.9**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**62.5**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**52.4**	dB(A)

75 Helena Road, Cecil Hills — DAY 2

Sunday 28 May 2000 — Norsonics S/N 20244

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	527	2200	59.0	79.7	70.5	62.4	60.0	53.9	45.5	38.8	20.7
2000	527	2215	56.6	84.0	63.6	59.7	58.5	53.7	45.8	38.6	27.4
2000	527	2230	56.7	76.3	65.9	60.9	59.4	54.2	46.6	37.6	19.6
2000	527	2245	54.8	71.3	64.4	59.5	57.8	52.8	44.7	39.9	16.5
2000	527	2300	55.3	72.3	65.4	60.3	58.2	52.4	44.5	38.3	17.0
2000	527	2315	55.6	68.3	63.9	60.7	59.1	53.6	45.1	34.2	12.7
2000	527	2330	55.0	65.7	62.2	59.7	58.2	53.4	46.0	39.3	10.7
2000	527	2345	55.2	67.5	63.5	59.8	58.3	53.7	44.9	35.8	12.3
2000	527	0	55.7	68.5	63.8	60.1	59.0	54.1	44.4	37.1	12.8
2000	528	15	57.1	72.9	67.7	62.3	59.9	54.1	46.6	35.9	15.8
2000	528	30	55.3	70.2	64.1	60.1	58.8	52.4	44.3	34.9	14.9
2000	528	45	55.6	69.2	64.8	61.1	59.2	52.8	43.3	38.2	13.6
2000	528	100	53.8	69.7	63.3	58.8	57.2	50.2	42.2	37.6	15.9
2000	528	115	53.2	69.8	63.6	57.7	56.0	50.1	42.2	38.7	16.6
2000	528	130	53.7	69.5	64.3	58.5	56.3	50.2	42.1	36.9	15.8
2000	528	145	51.2	71.9	59.3	55.9	54.6	45.8	38.7	35.5	20.7
2000	528	200	50.9	67.5	60.2	57.2	55.4	45.0	37.7	33.5	16.6
2000	528	215	49.1	63.8	59.6	55.0	53.4	42.7	32.9	28.6	14.7
2000	528	230	50.7	64.2	60.1	56.8	55.3	44.5	35.5	32.4	13.5
2000	528	245	51.1	66.8	59.9	57.1	55.7	45.0	34.1	30.2	15.7
2000	528	300	51.5	72.9	63.8	56.9	54.3	38.9	32.6	28.2	21.4
2000	528	315	49.4	67.8	61.6	55.8	53.5	38.5	32.9	30.1	18.4
2000	528	330	51.2	68.5	64.4	56.3	53.9	41.3	35.2	30.8	17.3
2000	528	345	51.8	69.7	64.9	56.4	53.3	44.6	40.1	37.1	17.9
2000	528	400	51.5	73.0	64.3	55.4	52.3	42.5	38.7	34.7	21.5
2000	528	415	50.6	70.5	61.0	56.1	53.9	43.9	38.6	35.4	19.9
2000	528	430	50.5	68.5	63.5	56.2	53.4	40.8	33.9	30.8	18.0
2000	528	445	50.7	69.9	63.4	55.3	52.4	43.6	37.2	32.4	19.2
2000	528	500	52.9	70.5	66.4	59.0	55.1	40.5	32.3	27.0	17.6
2000	528	515	52.8	68.2	64.2	59.3	57.2	42.9	32.6	26.6	15.4
2000	528	530	54.6	71.4	65.3	60.1	58.4	48.9	37.6	28.7	16.8
2000	528	545	57.0	70.5	67.6	63.4	61.2	51.4	39.9	32.9	13.5
2000	528	600	54.4	71.6	63.7	60.2	58.4	46.9	39.1	31.8	17.2
2000	528	615	54.9	69.4	64.4	60.8	59.0	50.7	39.1	31.6	14.5
2000	528	630	56.5	72.2	66.8	61.9	60.2	51.4	40.3	34.5	15.7
2000	528	645	59.7	72.1	68.7	66.2	64.3	55.2	44.5	31.8	12.4
2000	528	700	57.3	71.3	67.5	62.7	60.8	53.5	42.4	37.4	14.0
2000	528	715	56.3	67.6	64.9	62.5	60.6	52.2	42.4	35.3	11.3
2000	528	730	56.3	68.5	65.3	61.2	59.6	54.0	46.7	39.5	12.2
2000	528	745	56.5	70.4	66.7	62.6	59.7	52.6	43.9	38.5	13.9
2000	528	800	59.7	79.3	71.6	64.6	60.7	53.3	47.4	42.1	19.6
2000	528	815	56.5	71.5	66.7	61.7	59.2	53.5	46.6	42.0	15.0
2000	528	830	57.3	71.1	66.4	62.5	60.1	55.2	48.9	41.2	13.8
2000	528	845	55.0	67.0	63.4	59.5	58.0	53.4	47.3	37.6	12.0
2000	528	900	56.6	71.3	65.5	61.8	59.5	54.4	47.6	40.4	14.7
2000	528	915	56.3	68.7	65.4	61.5	59.1	54.3	48.8	41.7	12.4
2000	528	930	58.3	69.7	66.5	64.4	62.2	55.6	51.2	44.1	11.4
2000	528	945	61.1	78.0	68.2	65.7	65.0	58.1	54.9	49.2	16.9
2000	528	1000	61.3	86.7	71.2	65.6	63.4	57.4	52.8	47.2	25.4
2000	528	1015	57.4	73.0	65.0	61.7	60.0	55.7	51.3	46.8	15.6
2000	528	1030	57.6	71.5	65.2	62.0	60.6	55.9	52.6	47.0	13.9
2000	528	1045	60.8	84.4	69.5	64.7	61.6	56.4	53.1	46.6	23.6
2000	528	1100	59.1	76.2	68.4	63.1	61.3	57.3	53.6	47.0	17.1
2000	528	1115	62.5	85.6	75.8	65.0	61.5	55.4	52.3	48.4	23.1
2000	528	1130	58.4	76.2	68.0	62.9	61.0	55.9	52.8	46.8	17.8
2000	528	1145	58.3	84.6	65.8	62.5	60.9	56.0	52.9	48.2	26.3
2000	528	1200	58.8	80.8	66.3	62.8	61.3	56.8	53.7	50.2	22.0
2000	528	1215	61.7	88.8	71.0	64.4	62.2	56.4	53.3	49.8	27.1
2000	528	1230	58.3	75.8	64.6	61.7	60.5	57.0	53.7	50.4	17.5
2000	528	1245	56.9	79.5	64.2	61.3	59.5	55.2	52.7	48.1	22.6
2000	528	1300	57.1	83.1	65.6	61.6	59.0	54.6	52.2	46.8	26.0
2000	528	1315	58.4	77.4	67.2	62.7	60.4	56.0	53.0	48.0	19.0
2000	528	1330	61.7	95.6	66.4	60.6	58.8	54.7	52.3	47.0	33.9
2000	528	1345	56.7	74.2	64.7	61.1	59.2	55.0	52.4	48.7	17.5
2000	528	1400	56.4	68.8	64.9	60.3	58.6	54.9	52.7	48.7	12.4
2000	528	1415	58.2	88.1	65.8	61.2	59.3	55.4	52.2	47.9	29.9
2000	528	1430	59.6	91.8	67.5	61.6	59.4	55.3	52.7	49.0	32.2
2000	528	1445	56.8	82.9	64.1	60.6	58.9	55.0	52.0	47.9	26.1
2000	528	1500	57.2	84.8	62.9	60.5	59.2	55.3	52.7	48.2	27.6
2000	528	1515	57.9	75.1	67.1	62.9	60.6	55.6	51.9	46.9	17.2
2000	528	1530	59.8	83.1	70.2	62.3	60.3	55.9	52.5	47.3	23.3
2000	528	1545	57.5	77.5	66.9	60.8	59.3	55.5	52.7	46.1	20.0
2000	528	1600	57.4	81.2	65.0	61.2	59.7	56.0	51.7	42.9	23.8
2000	528	1615	62.5	94.9	66.1	61.7	60.2	56.4	51.5	46.6	32.4
2000	528	1630	58.6	78.7	67.2	63.3	60.9	56.5	53.0	45.6	20.1
2000	528	1645	59.8	83.9	69.5	64.7	61.9	56.8	53.9	47.5	24.1
2000	528	1700	59.0	77.9	68.3	63.6	61.5	57.0	53.3	48.5	18.9
2000	528	1715	58.1	77.8	65.0	61.9	60.4	56.4	53.9	50.7	19.7
2000	528	1730	57.2	81.4	63.8	60.2	59.0	55.8	53.1	49.3	24.2
2000	528	1745	58.5	84.5	67.4	62.1	60.5	56.4	53.1	47.4	26.0
2000	528	1800	57.2	68.6	64.3	61.6	60.3	55.6	52.0	45.0	11.4
2000	528	1815	57.2	71.1	64.8	61.4	59.6	55.7	52.3	47.1	13.9
2000	528	1830	56.0	69.1	63.4	60.4	58.8	54.5	50.1	43.4	13.1
2000	528	1845	58.9	81.5	69.3	63.0	60.7	55.0	51.4	43.2	22.6
2000	528	1900	60.7	83.4	69.7	64.5	62.3	57.9	53.4	45.3	22.7
2000	528	1915	56.1	69.7	63.7	60.0	59.0	54.9	45.0	37.9	13.6
2000	528	1930	58.4	72.6	68.6	63.0	60.8	56.3	51.5	45.1	14.2
2000	528	1945	61.5	86.8	69.6	64.0	61.7	56.1	51.4	40.8	25.3
2000	528	2000	60.3	73.8	67.6	64.7	63.3	59.2	52.4	42.3	13.5
2000	528	2015	59.1	68.1	66.3	63.4	62.2	58.0	52.0	43.2	9.0
2000	528	2030	59.7	82.2	66.1	63.5	62.4	58.0	50.8	39.2	22.5
2000	528	2045	58.6	75.3	65.8	63.1	61.3	57.3	49.6	41.4	16.7
2000	528	2100	57.0	70.5	64.3	61.6	60.2	55.6	48.3	40.1	13.5
2000	528	2115	57.9	72.8	65.4	62.4	60.9	56.3	49.1	40.3	14.9
2000	528	2130	58.1	71.5	67.2	62.9	61.5	56.0	46.6	38.9	13.4
2000	528	2145	56.9	69.0	66.0	61.7	60.2	54.9	46.6	38.4	12.1
2000	528	2200	56.0	69.4	65.6	61.7	59.7	52.5	43.1	36.7	13.4
2000	528	2215	57.7	72.4	67.4	64.2	61.7	53.5	43.2	37.6	14.7
2000	528	2230	56.7	69.6	65.3	62.4	60.6	53.4	42.4	34.3	12.9
2000	528	2245	56.1	71.8	67.2	62.7	58.9	50.8	41.9	35.0	15.7
2000	528	2300	56.0	69.4	66.0	61.3	59.3	52.8	43.4	36.1	13.4
2000	528	2315	55.6	69.8	65.1	61.7	59.2	51.3	42.3	36.7	14.2
2000	528	2330	56.0	71.5	67.6	61.5	58.8	49.9	41.3	36.1	15.5
2000	528	2345	56.9	73.3	68.7	62.5	59.8	50.2	40.4	32.4	16.4

DAY 2	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**57.6**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**54.1**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**58.7**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**54.6**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**60.4**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**42.4**	dB(A)

75 Helena Road, Cecil Hills											DAY 3
Monday 29 May 2000											Norsonics S/N 20244
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	528	2215	57.7	72.4	67.4	64.2	61.7	53.5	43.2	37.6	14.7
2000	528	2230	56.7	69.6	65.3	62.4	60.6	53.4	42.4	34.3	12.9
2000	528	2245	56.1	71.8	67.2	62.7	58.9	50.8	41.9	35.0	15.7
2000	528	2300	56.0	69.4	66.0	61.3	59.3	52.8	43.4	36.1	13.4
2000	528	2315	55.6	69.8	65.1	61.7	59.2	51.3	42.3	36.7	14.2
2000	528	2330	56.0	71.5	67.6	61.5	58.8	49.9	41.3	36.1	15.5
2000	528	2345	56.9	73.3	68.7	62.5	59.8	50.2	40.4	32.4	16.4
2000	528	0	55.9	79.3	66.2	60.5	58.2	47.2	39.3	31.1	23.4
2000	529	15	54.6	69.9	67.0	60.5	58.3	46.5	39.0	31.9	15.3
2000	529	30	54.7	71.2	66.5	60.6	57.8	47.4	41.1	35.3	16.5
2000	529	45	51.0	64.7	60.9	57.6	55.4	44.8	35.3	30.0	13.7
2000	529	100	55.1	69.7	66.9	61.8	58.4	47.0	37.0	29.9	14.6
2000	529	115	52.2	68.7	65.1	58.9	55.3	42.0	32.3	26.9	16.5
2000	529	130	54.7	72.6	67.8	61.6	57.1	43.3	33.7	27.7	17.9
2000	529	145	55.8	74.7	68.4	62.7	58.5	43.8	35.1	28.4	18.9
2000	529	200	52.3	67.8	64.4	59.2	56.2	41.3	34.8	32.4	15.5
2000	529	215	56.3	70.8	67.6	63.8	60.8	48.0	41.8	39.1	14.5
2000	529	230	55.9	69.9	66.3	61.6	59.0	52.5	49.2	45.7	14.0
2000	529	245	54.0	75.1	64.6	60.1	54.7	46.3	41.8	38.5	21.1
2000	529	300	57.5	75.8	67.7	64.4	62.2	48.9	40.0	34.1	18.3
2000	529	315	50.6	69.7	65.5	55.0	49.8	37.1	32.8	29.4	19.1
2000	529	330	53.8	74.2	65.6	60.3	56.7	40.6	33.4	29.7	20.4
2000	529	345	54.0	68.4	65.5	61.7	58.3	42.2	35.4	31.1	14.4
2000	529	400	56.7	73.0	68.3	63.9	60.9	45.3	34.8	30.3	16.3
2000	529	415	54.9	70.1	66.5	61.6	58.6	46.8	37.4	31.4	15.2
2000	529	430	58.5	71.7	67.7	65.4	63.4	52.8	44.1	37.9	13.2
2000	529	445	58.1	71.6	68.4	64.3	62.0	53.6	44.8	38.7	13.5
2000	529	500	58.2	74.4	69.5	64.1	61.4	52.1	45.0	38.3	16.2
2000	529	515	61.8	79.4	71.4	68.3	65.9	56.8	49.3	41.8	17.6
2000	529	530	63.7	81.3	73.3	68.9	67.2	60.6	52.2	45.6	17.6
2000	529	545	64.1	77.6	72.5	69.0	67.4	61.9	57.1	49.1	13.5
2000	529	600	62.5	77.6	69.6	67.2	65.8	60.7	55.9	44.8	15.1
2000	529	615	64.2	75.3	71.1	68.9	67.5	62.5	58.5	48.3	11.1
2000	529	630	63.9	76.6	70.2	68.2	67.0	62.6	59.5	55.7	12.7
2000	529	645	64.2	79.4	73.1	68.3	66.4	62.4	59.4	56.2	15.2
2000	529	700	62.4	76.0	70.6	66.4	65.1	60.7	56.2	51.8	13.6
2000	529	715	64.0	76.8	71.9	68.0	66.7	62.2	59.3	54.3	12.8
2000	529	730	63.1	75.1	70.8	67.5	65.8	61.5	58.2	53.3	12.0
2000	529	745	62.6	74.4	70.4	67.2	65.4	61.1	57.3	53.3	11.8
2000	529	800	63.0	81.3	72.1	66.7	65.3	60.5	56.8	52.2	18.3
2000	529	815	61.6	73.1	69.1	66.5	65.0	59.5	55.4	48.4	11.5
2000	529	830	61.0	74.1	68.9	65.8	64.2	58.8	55.2	51.2	13.1
2000	529	845	63.7	84.5	72.2	68.1	66.3	60.7	56.9	52.3	20.8
2000	529	900	63.2	78.9	74.1	67.9	66.0	59.6	55.6	49.9	15.7
2000	529	915	65.4	86.1	75.6	68.7	66.4	60.8	55.3	50.5	20.7
2000	529	930	61.6	79.5	71.0	66.4	64.5	58.9	54.0	47.2	17.9
2000	529	945	62.0	77.6	69.7	66.8	65.4	59.9	53.2	45.2	15.6
2000	529	1000	61.5	74.6	69.7	66.4	65.0	59.2	54.4	46.7	13.1
2000	529	1015	61.8	71.0	68.8	66.9	65.5	59.4	55.5	49.5	9.2
2000	529	1030	63.1	81.9	72.4	67.9	65.7	59.6	54.1	48.6	18.8
2000	529	1045	62.5	77.6	69.8	67.3	65.9	60.5	55.6	51.4	15.1
2000	529	1100	60.1	76.0	66.9	65.0	63.7	57.9	53.2	47.2	15.9
2000	529	1115	60.8	74.1	67.8	65.8	64.7	58.6	52.5	46.1	13.3
2000	529	1130	62.4	81.6	72.5	66.9	65.1	58.8	54.0	46.0	19.2
2000	529	1145	61.6	75.1	70.6	67.7	65.6	58.3	52.0	47.1	13.5
2000	529	1200	61.2	76.5	69.8	67.1	65.1	57.7	51.4	44.6	15.3
2000	529	1215	61.6	78.0	71.1	67.3	65.0	58.4	52.8	47.1	16.4
2000	529	1230	61.7	76.2	71.3	66.6	65.3	58.7	53.1	47.8	14.5
2000	529	1245	60.0	74.1	69.3	65.1	63.1	57.4	53.6	46.4	14.1
2000	529	1300	61.6	74.4	69.0	66.4	64.9	59.6	54.7	49.2	12.8
2000	529	1315	63.0	78.9	71.2	67.9	66.4	60.7	56.9	50.0	15.9
2000	529	1330	63.0	78.8	69.9	67.2	65.9	61.3	57.8	53.5	15.8
2000	529	1345	61.6	71.4	68.9	66.5	64.8	59.8	56.3	49.7	9.8
2000	529	1400	63.0	75.8	71.0	67.8	66.2	61.0	56.9	50.9	12.8
2000	529	1415	65.1	87.3	78.0	67.9	66.0	61.2	57.3	51.6	22.2
2000	529	1430	63.5	77.5	70.0	67.7	66.6	62.1	58.5	53.3	14.0
2000	529	1445	62.3	75.4	70.6	67.2	65.4	60.1	56.6	51.1	13.1
2000	529	1500	63.3	78.9	71.6	68.5	66.7	60.8	57.8	53.9	15.6
2000	529	1515	64.1	87.1	71.5	68.4	67.0	62.0	58.5	54.8	23.0
2000	529	1530	61.8	71.7	68.6	66.3	65.0	60.2	56.5	52.7	9.9
2000	529	1545	62.9	82.8	72.0	67.8	66.0	60.2	56.4	51.1	19.9
2000	529	1600	62.0	90.1	68.9	65.6	63.7	58.8	55.8	51.1	28.1
2000	529	1615	64.0	88.8	70.8	67.2	65.6	60.2	56.9	52.0	24.8
2000	529	1630	62.8	77.5	71.3	67.2	65.9	60.7	56.2	52.1	14.7
2000	529	1645	62.8	78.5	70.2	67.2	65.8	60.9	57.4	53.0	15.7
2000	529	1700	63.5	78.1	72.3	68.7	66.9	60.5	56.7	52.3	14.6
2000	529	1715	61.9	78.7	69.2	66.9	65.3	60.0	56.7	52.2	16.8
2000	529	1730	61.3	75.8	67.9	65.6	64.3	59.7	55.4	49.1	14.5
2000	529	1745	62.2	80.4	69.5	66.1	64.9	60.0	55.7	49.7	18.2
2000	529	1800	62.9	77.3	71.0	67.5	66.0	60.8	56.9	51.8	14.4
2000	529	1815	62.4	76.3	70.8	67.2	65.6	60.2	54.3	50.0	13.9
2000	529	1830	61.0	86.3	70.6	64.7	63.1	58.7	52.9	44.1	25.3
2000	529	1845	60.2	73.1	68.0	65.0	63.1	58.6	54.0	42.1	12.9
2000	529	1900	59.7	70.8	67.0	64.5	62.7	58.3	53.3	45.4	11.1
2000	529	1915	62.1	76.6	71.7	67.4	65.1	59.6	53.0	45.2	14.5
2000	529	1930	62.3	78.0	69.7	67.6	65.9	60.0	54.8	44.2	15.7
2000	529	1945	59.5	72.4	67.8	64.9	63.2	57.0	48.4	37.6	12.9
2000	529	2000	60.8	80.1	71.6	66.3	63.7	57.0	48.5	43.0	19.3
2000	529	2015	63.3	78.9	74.4	69.4	66.8	59.0	49.8	40.4	15.6
2000	529	2030	59.1	77.7	67.2	64.5	62.4	56.9	50.4	40.0	18.6
2000	529	2045	60.0	80.2	68.1	65.0	63.2	57.7	47.1	37.6	20.2
2000	529	2100	59.5	79.9	69.4	63.7	62.0	56.4	47.9	38.9	20.4
2000	529	2115	60.3	70.9	69.2	67.0	65.1	55.9	47.7	38.1	10.6
2000	529	2130	61.3	82.6	74.1	66.7	63.5	54.8	47.5	38.6	21.3
2000	529	2145	57.9	73.0	68.6	63.6	60.6	54.2	44.7	37.6	15.1
2000	529	2200	58.6	70.1	67.5	64.7	62.5	55.3	46.1	37.7	11.5
2000	529	2215	59.1	71.0	68.6	65.1	62.8	55.8	46.9	37.8	11.9
2000	529	2230	58.7	73.9	67.5	64.5	61.8	56.2	48.2	35.1	15.2
2000	529	2245	59.2	72.6	68.7	65.2	63.1	56.0	46.9	35.5	13.4
2000	529	2300	56.5	70.2	66.0	62.5	60.0	53.2	45.0	37.2	13.7
2000	529	2315	54.7	71.4	64.8	60.1	58.3	50.2	40.3	33.9	16.7
2000	529	2330	54.6	73.2	64.8	59.7	57.9	50.2	39.9	33.2	18.6
2000	529	2345	55.1	71.6	66.8	62.8	57.9	46.1	36.0	31.5	16.5
2000	529	0	53.9	67.6	64.5	61.5	58.0	46.7	34.0	31.0	13.7

DAY 3	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**61.2**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**57.6**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**62.2**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**58.9**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**64.5**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**51.4**	dB(A)

75 Helena Road, Cecil Hills — DAY 4

Tuesday 30 May 2000 — Norsonics S/N 20244

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	529	2215	59.1	71.0	68.6	65.1	62.8	55.8	46.9	37.8	11.9
2000	529	2230	58.7	73.9	67.5	64.5	61.8	56.2	48.2	35.1	15.2
2000	529	2245	59.2	72.6	68.7	65.2	63.1	56.0	46.9	35.5	13.4
2000	529	2300	56.5	70.2	66.0	62.5	60.0	53.2	45.0	37.2	13.7
2000	529	2315	54.7	71.4	64.8	60.1	58.3	50.2	40.3	33.9	16.7
2000	529	2330	54.6	73.2	64.8	59.7	57.9	50.2	39.9	33.2	18.6
2000	529	2345	55.1	71.6	66.8	62.8	57.9	46.1	36.0	31.5	16.5
2000	529	0	53.9	67.6	64.5	61.5	58.0	46.7	34.0	31.0	13.7
2000	530	15	52.9	70.2	64.6	59.6	56.2	44.6	32.8	29.5	17.3
2000	530	30	55.8	72.1	67.1	63.1	59.8	47.9	30.2	27.1	16.3
2000	530	45	56.4	71.1	68.1	63.9	60.6	42.4	31.5	27.3	14.7
2000	530	100	53.0	70.1	64.9	59.1	56.9	42.1	32.0	26.8	17.1
2000	530	115	55.7	72.0	68.6	63.1	58.7	36.9	30.0	26.3	16.3
2000	530	130	53.8	69.0	66.3	60.8	57.4	38.9	30.4	26.8	15.2
2000	530	145	54.9	69.4	66.4	63.1	58.7	42.2	30.6	27.3	14.5
2000	530	200	57.0	72.3	68.9	65.1	60.4	41.6	28.8	25.7	15.3
2000	530	215	54.7	71.2	67.1	62.3	57.0	43.2	35.3	31.0	16.5
2000	530	230	53.4	70.0	66.0	60.7	56.3	40.2	35.4	31.1	16.6
2000	530	245	53.7	71.2	65.7	61.0	56.7	41.6	36.4	32.3	17.5
2000	530	300	52.1	74.4	66.0	55.5	51.0	37.3	34.1	32.2	22.3
2000	530	315	55.9	76.7	69.0	63.5	58.2	38.6	32.3	29.9	20.8
2000	530	330	57.8	77.0	68.6	64.8	61.3	46.2	34.1	28.7	19.2
2000	530	345	58.4	76.3	70.7	66.0	61.6	47.1	36.8	31.4	17.9
2000	530	400	57.3	74.3	68.7	64.9	61.1	49.6	35.1	31.5	17.0
2000	530	415	60.8	84.1	72.7	64.5	60.6	47.8	35.8	32.3	23.3
2000	530	430	60.7	75.1	70.6	67.2	65.1	55.4	43.9	33.8	14.4
2000	530	445	57.6	69.8	66.9	64.1	62.1	52.9	40.4	34.7	12.2
2000	530	500	58.1	72.2	67.8	63.9	62.1	53.9	44.7	37.3	14.1
2000	530	515	63.3	79.7	74.4	69.6	66.7	58.4	48.4	41.5	16.4
2000	530	530	63.6	73.9	71.7	69.0	67.4	61.3	54.0	45.2	10.3
2000	530	545	65.1	75.6	72.1	69.9	68.7	63.3	56.2	48.9	10.5
2000	530	600	65.0	80.4	74.2	69.4	68.1	62.8	56.7	49.3	15.4
2000	530	615	64.8	75.2	70.7	68.8	67.8	63.7	58.6	47.9	10.4
2000	530	630	66.4	78.5	73.6	71.1	69.3	64.9	61.4	57.5	12.1
2000	530	645	65.4	76.8	72.8	69.7	68.3	63.8	60.5	56.4	11.4
2000	530	700	64.6	79.6	72.0	68.9	67.5	62.6	58.7	52.3	15.0
2000	530	715	63.2	74.8	70.2	67.3	66.1	62.0	58.0	54.5	11.6
2000	530	730	62.8	79.3	68.8	66.8	65.5	61.6	58.2	53.7	16.5
2000	530	745	63.6	78.2	74.6	67.4	65.7	61.1	58.1	55.1	14.6
2000	530	800	61.7	77.2	69.2	65.8	64.3	59.9	56.6	53.8	15.5
2000	530	815	64.2	91.3	74.0	68.5	66.2	59.8	55.2	50.6	27.1
2000	530	830	62.3	74.2	69.8	67.5	66.2	59.6	55.8	52.4	11.9
2000	530	845	62.2	72.9	68.7	66.3	65.2	60.7	56.0	51.6	10.7
2000	530	900	62.3	72.5	68.9	66.4	65.3	60.4	55.9	47.8	10.2
2000	530	915	62.3	76.2	70.8	66.8	65.2	60.1	55.8	49.6	13.9
2000	530	930	63.2	79.8	73.9	68.2	66.0	59.5	54.9	49.0	16.6
2000	530	945	62.5	76.0	71.2	67.7	66.1	59.7	53.7	48.0	13.5
2000	530	1000	61.4	83.5	68.5	66.4	65.1	58.9	54.0	48.1	22.1
2000	530	1015	62.2	74.7	70.5	67.6	65.7	59.9	54.9	50.1	12.5
2000	530	1030	63.6	77.2	72.9	68.6	67.1	60.5	55.6	50.9	13.6
2000	530	1045	64.2	79.0	73.2	68.0	66.8	62.4	56.6	51.6	14.8
2000	530	1100	62.5	71.4	69.6	67.3	65.8	60.8	56.5	49.8	8.9
2000	530	1115	62.8	77.3	71.3	67.0	65.6	60.7	55.5	50.4	14.5
2000	530	1130	64.2	83.1	73.8	67.5	66.0	61.1	56.3	50.9	18.9
2000	530	1145	63.8	77.5	72.1	68.5	66.8	61.9	56.9	51.7	13.7
2000	530	1200	63.9	77.8	73.0	69.2	67.1	61.0	57.1	51.3	13.9
2000	530	1215	63.5	77.5	71.8	68.1	66.5	61.5	57.0	50.4	14.0
2000	530	1230	62.8	76.1	70.1	67.2	66.0	61.2	57.0	51.4	13.3
2000	530	1245	63.0	82.1	69.9	67.5	66.0	60.9	55.9	51.1	19.1
2000	530	1300	62.5	77.1	69.5	67.4	66.1	60.6	55.4	49.4	14.6
2000	530	1315	64.2	83.9	73.8	68.7	67.0	61.0	55.6	49.8	19.7
2000	530	1330	63.5	74.7	70.8	68.4	67.1	61.5	56.4	49.1	11.2
2000	530	1345	61.5	72.3	68.2	66.1	64.7	60.0	55.6	52.1	10.8
2000	530	1400	62.3	77.2	70.2	67.0	65.7	60.0	54.4	49.1	14.9
2000	530	1415	61.9	77.0	69.3	66.4	65.2	60.1	55.7	50.6	15.1
2000	530	1430	63.4	77.2	71.7	68.2	66.8	61.1	56.4	51.1	13.8
2000	530	1445	63.0	76.0	70.1	67.6	66.4	61.1	56.9	51.0	13.0
2000	530	1500	62.2	76.9	70.4	66.3	64.7	60.4	57.4	53.9	14.7
2000	530	1515	62.2	76.5	70.0	66.2	64.5	60.3	56.6	54.2	14.3
2000	530	1530	61.6	74.3	69.4	66.2	64.5	60.0	56.2	52.1	12.7
2000	530	1545	62.8	80.7	72.5	66.9	65.0	59.8	56.4	51.1	17.9
2000	530	1600	62.3	74.8	69.7	66.8	65.4	60.6	56.9	52.5	12.5
2000	530	1615	62.8	88.3	70.3	66.8	65.2	60.7	57.1	53.4	25.5
2000	530	1630	64.7	81.7	74.5	69.2	67.3	61.7	57.9	52.0	17.0
2000	530	1645	64.2	81.8	73.8	68.2	66.5	61.8	57.9	53.3	17.6
2000	530	1700	62.4	78.5	70.1	67.0	65.4	60.2	56.4	52.1	16.1
2000	530	1715	62.3	79.4	70.2	66.6	65.0	60.3	56.8	51.1	17.1
2000	530	1730	63.8	91.3	72.6	67.4	65.8	60.6	56.4	51.5	27.5
2000	530	1745	62.5	73.3	70.2	67.3	65.7	60.7	57.1	51.0	10.8
2000	530	1800	62.9	77.1	71.7	68.0	66.3	60.4	55.7	51.0	14.2
2000	530	1815	62.8	78.2	70.7	67.1	65.6	60.7	57.3	51.6	15.4
2000	530	1830	62.5	77.9	71.3	67.4	65.6	59.8	55.7	50.5	15.4
2000	530	1845	61.1	76.8	68.2	65.4	64.0	59.8	55.1	49.3	15.7
2000	530	1900	62.1	76.7	69.4	67.0	65.4	60.3	56.4	49.4	14.6
2000	530	1915	62.8	75.3	71.8	68.2	66.3	60.1	54.9	48.2	12.5
2000	530	1930	62.5	74.8	70.6	68.2	66.6	59.8	53.0	46.0	12.3
2000	530	1945	60.2	72.4	69.7	66.1	63.0	57.8	49.5	42.5	12.2
2000	530	2000	60.0	72.0	69.0	66.0	63.0	58.3	51.0	46.1	12.0
2000	530	2015	60.0	74.9	67.9	64.9	63.0	58.5	51.4	46.0	14.9
2000	530	2030	60.0	75.0	69.6	66.8	64.9	58.6	52.1	43.3	15.0
2000	530	2045	60.2	72.4	68.8	65.8	64.1	57.6	51.2	45.0	12.2
2000	530	2100	60.2	72.3	69.6	66.0	63.5	57.5	51.9	45.9	12.1
2000	530	2115	59.7	70.1	67.4	65.5	63.2	57.7	51.3	44.6	10.4
2000	530	2130	58.2	72.0	66.6	63.4	61.2	56.4	50.1	44.1	13.8
2000	530	2145	58.9	74.3	69.1	64.0	61.8	56.1	48.4	40.8	15.4
2000	530	2200	59.0	74.0	69.0	64.0	61.6	55.1	47.5	40.7	15.0
2000	530	2215	58.9	72.8	66.8	64.4	62.6	56.1	47.9	40.1	13.9
2000	530	2230	58.5	72.2	67.7	64.4	62.1	55.4	49.3	43.1	13.7
2000	530	2245	58.5	72.0	68.0	64.0	62.0	53.0	46.6	40.5	13.5
2000	530	2300	57.6	74.6	67.3	63.9	60.6	52.9	45.0	39.1	17.0
2000	530	2315	57.8	71.7	67.0	63.8	61.7	54.1	45.3	39.9	13.9
2000	530	2330	57.2	72.5	68.3	63.2	60.8	52.7	44.8	40.2	15.3
2000	530	2345	57.6	71.0	67.3	64.4	61.7	53.0	44.3	34.5	13.4
2000	530	0	57.1	74.9	68.9	63.5	59.8	49.3	39.7	35.2	17.8

DAY 4	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**61.8**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**58.6**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**62.5**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**60.2**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**65.1**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**53.7**	dB(A)

75 Helena Road, Cecil Hills — DAY 5

Wednesday 31 May 2000 — Norsonics S/N 20244

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	530	2215	58.9	72.8	66.8	64.4	62.6	56.1	47.9	40.1	13.9
2000	530	2230	58.5	72.2	67.7	64.4	62.1	55.4	49.3	43.1	13.7
2000	530	2245	58.5	72.0	68.0	64.0	62.0	53.0	46.6	40.5	13.5
2000	530	2300	57.6	74.6	67.3	63.9	60.6	52.9	45.0	39.1	17.0
2000	530	2315	57.8	71.7	67.0	63.8	61.7	54.1	45.3	39.9	13.9
2000	530	2330	57.2	72.5	68.3	63.2	60.8	52.7	44.8	40.2	15.3
2000	530	2345	57.6	71.0	67.3	64.4	61.7	53.0	44.3	34.5	13.4
2000	530	0	57.1	74.9	68.9	63.5	59.8	49.3	39.7	35.2	17.8
2000	531	15	53.4	71.5	64.6	59.8	57.3	45.6	37.3	32.1	18.1
2000	531	30	56.1	71.2	66.7	63.8	60.5	48.0	39.4	32.4	15.1
2000	531	45	51.6	69.1	63.7	57.7	54.9	43.1	34.4	30.1	17.5
2000	531	100	55.3	71.0	66.6	62.6	59.7	46.3	38.0	31.4	15.7
2000	531	115	54.7	73.8	66.6	61.2	56.7	42.6	34.7	31.1	19.1
2000	531	130	55.6	70.5	67.9	63.2	58.8	45.3	36.4	31.4	14.9
2000	531	145	56.6	76.5	69.5	63.9	58.6	45.3	32.6	29.1	19.9
2000	531	200	52.6	69.8	65.8	59.5	55.0	40.5	32.1	29.5	17.2
2000	531	215	52.1	69.2	66.3	58.0	54.6	41.0	32.9	29.8	17.1
2000	531	230	56.7	71.7	68.4	64.1	60.9	47.9	40.2	32.6	15.0
2000	531	245	52.9	69.4	65.7	59.7	55.4	42.3	36.9	33.4	16.5
2000	531	300	56.5	69.7	66.8	64.2	61.6	47.4	40.5	36.8	13.2
2000	531	315	55.7	74.8	67.8	63.4	58.2	44.0	37.2	33.8	19.1
2000	531	330	52.7	69.3	64.6	59.6	56.1	43.1	36.8	33.8	16.6
2000	531	345	58.8	71.6	69.1	65.9	63.5	51.8	43.1	36.4	12.8
2000	531	400	51.9	69.6	65.1	58.0	54.4	42.6	36.9	34.1	17.7
2000	531	415	52.2	69.8	64.7	58.7	54.6	43.1	38.3	34.6	17.6
2000	531	430	56.6	71.3	67.0	63.5	60.7	51.2	43.2	39.5	14.7
2000	531	445	58.9	72.3	68.3	65.3	63.5	54.2	44.9	36.9	13.4
2000	531	500	59.7	75.5	69.3	66.0	64.1	54.6	47.5	41.1	15.8
2000	531	515	59.3	71.2	68.1	65.5	64.1	55.2	46.4	41.9	11.9
2000	531	530	60.6	71.1	68.4	65.7	64.2	58.7	52.4	45.2	10.5
2000	531	545	62.7	76.4	71.2	67.3	65.7	60.6	55.0	46.7	13.7
2000	531	600	61.9	76.3	69.1	66.6	65.3	60.2	54.7	48.1	14.4
2000	531	615	64.0	77.5	71.7	69.0	67.5	61.7	58.0	50.8	13.5
2000	531	630	63.8	73.5	70.4	67.9	66.7	62.6	59.0	53.1	9.7
2000	531	645	62.8	80.3	69.8	66.4	65.2	60.8	57.1	51.2	17.5
2000	531	700	64.6	77.1	72.6	69.1	67.6	62.5	59.0	54.4	12.5
2000	531	715	63.4	76.8	70.1	67.6	66.5	61.6	57.9	53.5	13.4
2000	531	730	62.5	73.6	69.5	67.1	65.6	61.0	57.7	52.2	11.1
2000	531	745	62.6	77.5	70.2	67.0	65.5	60.6	57.3	53.7	14.9
2000	531	800	62.9	76.4	70.3	67.6	66.3	60.8	57.7	50.3	13.5
2000	531	815	63.6	78.5	71.7	68.5	66.8	61.2	57.9	51.4	14.9
2000	531	830	62.1	71.3	68.3	66.8	65.4	60.5	57.6	54.0	9.2
2000	531	845	64.2	77.4	72.1	69.5	67.8	61.8	57.6	52.7	13.2
2000	531	900	62.5	74.1	69.7	67.6	66.0	60.5	56.1	52.0	11.6
2000	531	915	62.1	77.8	71.5	67.1	65.2	59.2	54.2	48.8	15.7
2000	531	930	63.1	80.2	70.9	67.9	66.3	60.5	56.1	50.3	17.1
2000	531	945	62.5	75.8	71.1	67.6	65.6	60.3	55.2	47.4	13.3
2000	531	1000	63.5	77.8	73.1	68.4	66.6	60.6	55.9	48.5	14.3
2000	531	1015	63.2	75.6	71.1	68.1	66.7	61.0	56.1	51.1	12.4
2000	531	1030	62.9	79.0	73.8	67.2	65.8	60.0	56.0	50.1	16.1
2000	531	1045	64.0	79.9	74.0	68.3	66.7	61.1	56.3	50.4	15.9
2000	531	1100	63.7	83.6	74.8	67.2	65.7	60.9	56.5	51.2	19.9
2000	531	1115	62.5	79.5	71.7	67.0	65.1	59.6	54.8	49.9	17.0
2000	531	1130	64.9	83.7	75.7	68.8	67.2	61.5	56.7	49.6	18.8
2000	531	1145	63.3	75.3	70.3	67.9	66.8	61.3	56.8	49.4	12.0
2000	531	1200	63.6	81.6	72.7	68.5	66.3	61.0	56.9	51.2	18.0
2000	531	1215	61.5	76.4	67.5	65.8	64.7	59.9	55.4	50.3	14.9
2000	531	1230	61.8	72.8	69.0	66.2	64.7	60.4	55.7	50.5	11.0
2000	531	1245	63.1	77.9	71.0	67.5	66.2	61.0	56.2	50.2	14.8
2000	531	1300	60.9	74.6	69.5	66.1	64.3	58.3	53.9	47.3	13.7
2000	531	1315	63.0	73.8	70.0	67.9	66.3	61.1	55.7	48.1	10.8
2000	531	1330	61.7	71.1	68.1	66.2	64.9	60.4	55.3	47.8	9.4
2000	531	1345	61.9	71.1	69.1	66.3	65.0	60.5	55.3	49.1	9.2
2000	531	1400	60.9	79.5	67.4	65.2	64.1	58.9	54.5	47.3	18.6
2000	531	1415	63.0	76.0	70.8	68.0	66.1	61.2	55.7	47.3	13.0
2000	531	1430	62.1	75.3	70.4	67.0	65.4	60.0	55.6	50.2	13.2
2000	531	1445	61.7	72.2	68.8	66.4	64.8	60.1	56.4	52.5	10.5
2000	531	1500	63.2	77.8	70.5	67.4	65.9	61.6	58.0	52.5	14.6
2000	531	1515	63.4	78.7	70.3	67.8	66.5	61.7	57.6	53.6	15.3
2000	531	1530	61.5	78.9	70.8	66.1	64.5	59.1	55.1	51.0	17.4
2000	531	1545	61.3	74.8	69.5	66.0	64.4	59.4	55.5	51.5	13.5
2000	531	1600	62.5	75.9	69.6	66.5	64.9	61.1	57.5	53.1	13.4
2000	531	1615	61.0	73.0	68.9	65.2	63.7	59.7	55.6	51.0	12.0
2000	531	1630	62.3	77.2	71.0	66.2	64.9	60.6	56.6	52.9	14.9
2000	531	1645	63.6	77.2	73.3	69.0	66.7	60.4	56.7	53.7	13.6
2000	531	1700	62.1	75.3	69.8	67.1	65.6	59.7	56.4	53.1	13.2
2000	531	1715	63.2	77.3	71.8	68.8	66.9	60.6	56.8	51.6	14.1
2000	531	1730	62.4	73.8	69.8	67.2	65.5	60.8	57.6	53.5	11.4
2000	531	1745	61.6	71.7	68.7	66.7	65.1	59.6	56.1	50.9	10.1
2000	531	1800	62.8	74.1	70.3	67.5	66.0	61.1	56.7	52.5	11.3
2000	531	1815	62.4	78.6	69.9	67.1	65.7	60.4	56.3	51.5	16.2
2000	531	1830	61.8	73.1	69.1	66.5	65.1	59.9	56.5	52.6	11.3
2000	531	1845	63.0	84.1	72.6	66.7	65.1	60.3	55.0	45.9	21.1
2000	531	1900	61.6	72.8	69.6	66.7	64.9	59.7	55.2	46.9	11.2
2000	531	1915	61.5	76.8	69.5	66.6	64.9	59.6	54.7	49.5	15.3
2000	531	1930	61.0	80.1	69.7	65.6	64.0	58.5	53.5	47.6	19.1
2000	531	1945	63.2	79.6	74.4	67.9	66.2	59.4	53.9	46.9	16.4
2000	531	2000	60.4	72.2	67.9	66.1	64.1	58.3	51.3	44.8	11.8
2000	531	2015	59.3	71.8	67.9	64.5	62.4	57.4	52.0	45.4	12.5
2000	531	2030	59.6	74.8	67.9	64.5	62.9	57.5	51.5	44.8	15.2
2000	531	2045	60.9	75.4	70.7	66.7	64.1	57.8	51.4	45.6	14.5
2000	531	2100	59.7	80.1	70.6	64.0	62.1	56.6	50.1	43.7	20.4
2000	531	2115	59.9	73.1	68.4	65.9	63.8	57.2	51.0	43.9	13.2
2000	531	2130	59.2	75.0	67.4	65.1	62.6	56.6	50.6	45.3	15.8
2000	531	2145	58.8	77.1	66.8	63.9	62.5	55.8	49.4	43.4	18.3
2000	531	2200	58.2	69.7	66.7	63.8	61.5	56.2	48.7	39.7	11.5
2000	531	2215	58.5	71.1	67.9	64.8	61.7	55.4	48.1	42.4	12.6
2000	531	2230	58.2	81.3	65.5	62.7	60.5	54.4	45.2	39.3	23.1
2000	531	2245	59.2	69.8	68.0	65.3	63.3	56.2	49.1	43.4	10.6
2000	531	2300	58.6	72.0	68.3	65.2	62.1	55.3	47.3	39.6	13.4
2000	531	2315	57.7	71.2	67.2	64.1	60.4	54.9	48.4	38.8	13.5
2000	531	2330	57.7	73.1	67.0	63.9	61.6	53.7	46.6	39.9	15.4
2000	531	2345	57.1	71.8	67.9	63.1	60.5	52.3	45.0	38.2	14.7
2000	531	0	58.5	74.4	69.3	65.5	61.7	52.4	42.7	34.7	15.9

DAY 5	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**61.3**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**57.3**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**62.3**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**58.8**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**64.9**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**53.9**	dB(A)

75 Helena Road, Cecil Hills

DAY 6

Thursday 1 June 2000

Norsonics S/N 20244

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	531	2215	58.5	71.1	67.9	64.8	61.7	55.4	48.1	42.4	12.6
2000	531	2230	58.2	81.3	65.5	62.7	60.5	54.4	45.2	39.3	23.1
2000	531	2245	59.2	69.8	68.0	65.3	63.3	56.2	49.1	43.4	10.6
2000	531	2300	58.6	72.0	68.3	65.2	62.1	55.3	47.3	39.6	13.4
2000	531	2315	57.7	71.2	67.2	64.1	60.4	54.9	48.4	38.8	13.5
2000	531	2330	57.7	73.1	67.0	63.9	61.6	53.7	46.6	39.9	15.4
2000	531	2345	57.1	71.8	67.9	63.1	60.5	52.3	45.0	38.2	14.7
2000	531	0	58.5	74.4	69.3	65.5	61.7	52.4	42.7	34.7	15.9
2000	601	15	53.5	67.1	64.6	59.6	57.6	47.5	38.8	30.8	13.6
2000	601	30	55.0	71.1	66.3	61.8	58.1	48.9	40.6	32.7	16.1
2000	601	45	53.2	68.2	65.0	60.0	56.3	45.4	37.3	32.1	15.0
2000	601	100	55.0	70.9	66.8	62.2	58.8	46.2	36.1	31.2	15.9
2000	601	115	55.1	70.3	68.1	61.8	57.6	46.0	37.7	31.4	15.2
2000	601	130	55.6	74.3	68.9	62.7	57.6	44.7	35.2	30.0	18.7
2000	601	145	54.4	71.0	67.0	61.4	56.8	41.9	30.7	27.6	16.6
2000	601	200	56.2	70.1	67.6	63.9	60.6	45.9	36.7	28.6	13.9
2000	601	215	57.4	76.8	72.8	60.9	57.0	43.9	33.0	30.3	19.4
2000	601	230	56.7	75.7	69.8	64.1	59.5	43.2	35.7	31.1	19.0
2000	601	245	60.1	75.6	70.9	68.1	64.4	50.4	39.6	32.4	15.5
2000	601	300	56.8	69.7	66.9	64.4	62.3	48.0	36.6	31.4	12.9
2000	601	315	53.3	69.8	64.9	60.5	57.6	42.8	34.7	30.1	16.5
2000	601	330	60.6	71.9	69.0	67.2	65.9	53.7	43.7	38.0	11.3
2000	601	345	57.5	72.5	68.0	64.5	62.1	49.8	40.3	32.4	15.0
2000	601	400	58.5	75.1	70.2	65.9	63.0	47.2	36.5	31.7	16.6
2000	601	415	59.7	74.9	71.3	67.0	63.3	48.5	37.5	31.8	15.2
2000	601	430	59.5	73.4	68.7	66.1	63.8	55.4	45.6	40.6	13.9
2000	601	445	61.9	80.0	71.2	67.7	66.2	56.1	46.0	38.8	18.1
2000	601	500	60.3	77.8	70.1	66.5	64.5	55.4	47.7	42.6	17.5
2000	601	515	64.0	79.7	74.1	70.4	68.1	59.1	49.3	45.8	15.7
2000	601	530	65.4	78.9	74.1	70.4	68.6	63.3	57.0	49.5	13.5
2000	601	545	64.6	74.6	70.0	68.5	67.6	63.6	59.3	52.1	10.0
2000	601	600	66.4	77.4	73.5	71.2	69.9	64.8	58.5	49.6	11.0
2000	601	615	66.6	79.2	73.7	71.6	69.6	65.1	61.0	55.1	12.6
2000	601	630	66.7	77.7	72.5	70.2	69.2	65.8	62.6	56.5	11.0
2000	601	645	64.6	85.3	71.5	68.2	67.0	62.8	60.1	55.9	20.7
2000	601	700	63.5	73.9	70.3	67.9	66.7	62.2	56.3	49.3	10.4
2000	601	715	64.9	73.3	71.0	69.0	67.8	63.7	60.3	52.7	8.4
2000	601	730	66.2	76.8	72.9	70.5	69.2	65.0	60.8	55.3	10.6
2000	601	745	65.2	76.2	71.3	69.4	68.1	64.0	60.9	53.5	11.0
2000	601	800	64.8	75.0	71.3	69.0	67.6	63.6	60.3	53.4	10.2
2000	601	815	63.5	76.0	71.7	67.8	66.3	61.6	57.1	53.5	12.5
2000	601	830	62.7	76.7	69.7	67.0	65.7	61.1	57.4	52.9	14.0
2000	601	845	63.5	76.6	71.7	68.1	66.5	61.5	57.7	53.1	13.1
2000	601	900	64.1	80.7	70.3	68.4	67.3	62.6	58.5	51.5	16.6
2000	601	915	63.1	73.3	69.1	67.6	66.6	61.5	56.6	51.2	10.2
2000	601	930	63.4	78.6	72.3	68.2	66.5	61.2	55.7	46.0	15.2
2000	601	945	64.0	82.3	74.9	68.2	66.6	60.7	56.6	48.2	18.3
2000	601	1000	63.6	77.2	72.8	68.0	66.7	61.6	56.4	46.1	13.6
2000	601	1015	62.9	73.0	70.5	68.3	66.9	60.5	54.8	47.6	10.1
2000	601	1030	63.7	75.4	71.2	68.6	67.4	61.5	55.7	47.6	11.7
2000	601	1045	66.0	87.5	75.2	70.6	68.2	62.8	56.9	49.0	21.5
2000	601	1100	64.2	78.9	74.5	69.0	67.1	61.3	55.8	50.1	14.7
2000	601	1115	63.9	76.6	72.4	69.1	67.3	61.3	54.7	48.0	12.7
2000	601	1130	64.0	80.2	72.1	68.3	67.1	62.0	55.5	47.0	16.2
2000	601	1145	62.7	74.7	71.0	67.9	66.3	60.5	54.6	46.7	12.0
2000	601	1200	63.9	77.8	73.5	69.5	67.2	60.9	54.3	47.3	13.9
2000	601	1215	64.7	81.8	73.8	69.4	67.6	61.8	56.3	46.1	17.1
2000	601	1230	63.4	79.7	71.1	68.3	66.9	61.1	55.5	47.7	16.3
2000	601	1245	63.4	74.8	71.2	68.2	66.9	61.4	55.6	47.8	11.4
2000	601	1300	63.1	76.4	70.2	67.7	66.3	61.2	55.8	48.1	13.3
2000	601	1315	63.0	75.3	71.6	68.7	67.0	60.0	53.4	46.4	12.3
2000	601	1330	61.9	73.8	70.1	66.8	65.4	59.6	53.8	45.3	11.9
2000	601	1345	62.8	73.6	70.6	67.8	66.4	60.6	54.4	46.7	10.8
2000	601	1400	62.7	73.2	69.7	68.0	66.7	60.7	56.0	46.7	10.5
2000	601	1415	63.3	76.8	70.6	68.1	66.9	61.0	56.3	49.6	13.5
2000	601	1430	64.0	77.0	71.2	68.9	67.6	62.0	57.0	47.4	13.0
2000	601	1445	64.9	82.9	75.1	68.7	66.7	61.0	57.0	53.1	18.0
2000	601	1500	63.2	79.2	70.6	67.5	65.9	61.1	56.8	51.2	16.0
2000	601	1515	63.4	74.0	70.9	68.7	67.1	61.1	57.3	52.4	10.6
2000	601	1530	61.6	80.0	68.8	66.2	64.6	60.1	56.0	48.9	18.4
2000	601	1545	62.6	83.0	69.3	66.7	65.5	61.0	57.1	52.1	20.4
2000	601	1600	65.8	85.0	78.1	69.3	67.5	61.5	57.7	54.0	19.2
2000	601	1615	63.7	77.5	71.0	67.8	66.6	61.9	58.5	54.7	13.8
2000	601	1630	63.3	73.7	70.6	67.8	66.3	61.7	58.1	53.8	10.4
2000	601	1645	63.8	77.8	72.4	68.0	66.8	61.7	58.1	54.4	14.0
2000	601	1700	62.8	81.4	70.7	67.5	65.7	61.1	57.1	52.7	18.6
2000	601	1715	62.7	78.9	68.7	66.4	65.3	61.3	58.0	53.6	16.2
2000	601	1730	62.3	74.1	71.2	66.7	65.3	60.4	56.9	52.8	11.8
2000	601	1745	62.0	77.1	69.9	66.5	64.7	60.1	57.0	53.0	15.1
2000	601	1800	63.2	78.0	70.3	67.7	66.0	61.7	58.2	52.6	14.8
2000	601	1815	62.3	75.5	70.2	67.1	65.3	60.6	56.3	52.3	13.2
2000	601	1830	62.5	77.7	69.8	67.3	65.9	60.4	56.9	50.9	15.2
2000	601	1845	64.2	98.4	67.8	65.2	63.6	59.4	55.9	52.5	34.2
2000	601	1900	60.7	76.9	67.9	65.1	63.6	58.8	55.0	48.8	16.2
2000	601	1915	62.4	83.6	74.9	65.9	63.6	58.3	53.2	46.4	21.2
2000	601	1930	61.0	71.9	67.9	65.4	63.9	59.8	55.3	50.7	10.9
2000	601	1945	60.6	71.0	67.6	65.4	64.0	58.8	54.2	48.9	10.4
2000	601	2000	60.0	70.8	67.6	64.7	63.3	58.0	53.2	44.8	10.8
2000	601	2015	60.5	76.7	70.5	65.9	63.8	57.6	51.7	45.7	16.2
2000	601	2030	59.9	72.6	69.1	65.7	63.6	57.2	50.4	43.3	12.7
2000	601	2045	58.8	73.3	67.6	64.0	62.0	56.4	50.2	43.5	14.5
2000	601	2100	60.4	72.0	68.9	65.8	64.1	58.3	52.9	45.4	11.6
2000	601	2115	60.3	75.9	70.5	65.5	63.0	57.6	51.7	45.7	15.6
2000	601	2130	60.4	73.4	68.0	65.8	63.7	58.5	51.7	45.4	13.0
2000	601	2145	60.2	75.0	67.8	65.7	63.8	58.1	53.4	45.6	14.8
2000	601	2200	59.7	74.3	68.8	64.8	62.6	57.2	51.1	45.6	14.6
2000	601	2215	58.6	72.0	67.9	64.3	62.2	55.7	49.3	42.7	13.4
2000	601	2230	59.3	70.7	67.9	64.8	63.1	56.6	51.4	44.1	11.4
2000	601	2245	60.3	76.9	69.1	66.2	64.2	57.1	50.3	44.5	16.6
2000	601	2300	59.6	72.2	69.7	65.7	63.3	55.5	47.5	39.2	12.6
2000	601	2315	58.5	74.2	68.6	63.7	61.4	55.4	48.7	41.3	15.7
2000	601	2330	57.5	69.8	65.9	63.5	61.4	54.5	45.9	39.1	12.3
2000	601	2345	57.7	71.4	67.1	63.6	61.6	53.7	44.9	39.5	13.7
2000	601	0	54.5	70.9	66.3	59.4	57.0	48.7	41.1	35.5	16.4

DAY 6	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**62.5**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**59.7**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**63.2**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**61.0**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**65.6**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**53.4**	dB(A)

75 Helena Road, Cecil Hills — DAY 7

Friday 2 June 2000 — Norsonics S/N 20244

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	601	2215	58.6	72.0	67.9	64.3	62.2	55.7	49.3	42.7	13.4
2000	601	2230	59.3	70.7	67.9	64.8	63.1	56.6	51.4	44.1	11.4
2000	601	2245	60.3	76.9	69.1	66.2	64.2	57.1	50.3	44.5	16.6
2000	601	2300	59.6	72.2	69.7	65.7	63.3	55.5	47.5	39.2	12.6
2000	601	2315	58.5	74.2	68.6	63.7	61.4	55.4	48.7	41.3	15.7
2000	601	2330	57.5	69.8	65.9	63.5	61.4	54.5	45.9	39.1	12.3
2000	601	2345	57.7	71.4	67.1	63.6	61.6	53.7	44.9	39.5	13.7
2000	601	0	54.5	70.9	66.3	59.4	57.0	48.7	41.1	35.5	16.4
2000	602	15	57.8	78.9	67.8	63.5	61.1	51.3	41.2	34.7	21.1
2000	602	30	55.7	71.0	67.4	60.9	58.9	50.6	41.1	33.1	15.3
2000	602	45	57.7	71.9	69.2	64.8	61.4	50.4	42.2	36.8	14.2
2000	602	100	54.6	72.1	67.2	60.2	57.4	44.9	36.6	31.4	17.5
2000	602	115	56.1	70.0	67.3	62.7	59.9	48.9	38.6	33.1	13.9
2000	602	130	55.8	71.3	66.0	63.2	60.6	48.4	39.1	32.6	15.5
2000	602	145	57.2	77.8	68.4	64.0	60.6	48.8	38.3	31.3	20.6
2000	602	200	55.2	69.4	66.0	62.7	60.0	45.3	35.9	31.2	14.2
2000	602	215	54.2	72.0	66.4	60.6	57.4	44.0	35.1	31.1	17.8
2000	602	230	56.8	71.8	67.5	64.5	61.4	48.8	39.1	34.8	15.0
2000	602	245	50.5	68.2	64.0	55.7	51.4	38.4	34.3	32.4	17.7
2000	602	300	55.9	70.1	67.3	63.7	60.1	45.9	37.2	32.8	14.2
2000	602	315	56.5	73.0	68.7	64.0	60.2	45.8	38.0	31.7	16.5
2000	602	330	61.3	82.9	74.6	65.3	60.4	48.1	38.9	32.0	21.6
2000	602	345	52.6	68.2	63.8	59.3	57.0	46.0	38.0	33.3	15.6
2000	602	400	57.8	74.0	68.9	65.5	62.1	49.4	38.4	34.2	16.2
2000	602	415	58.7	72.7	69.2	65.6	63.4	51.9	42.1	37.5	14.0
2000	602	430	59.6	72.2	68.7	66.8	64.8	53.4	43.8	35.5	12.6
2000	602	445	64.0	85.5	77.2	68.0	65.6	55.4	45.1	40.8	21.5
2000	602	500	60.9	75.1	70.2	66.5	64.8	56.3	46.9	40.5	14.2
2000	602	515	61.8	75.4	71.6	68.4	65.8	57.7	49.4	38.7	13.6
2000	602	530	62.0	76.8	69.7	67.1	65.6	60.0	54.1	48.0	14.8
2000	602	545	63.3	78.6	73.1	67.6	66.0	61.2	56.2	49.9	15.3
2000	602	600	64.1	81.4	71.6	68.1	66.9	61.7	56.4	47.9	17.3
2000	602	615	63.1	79.9	70.2	67.4	66.0	61.5	57.5	51.1	16.8
2000	602	630	62.8	75.0	69.5	67.0	65.6	61.4	58.2	52.9	12.2
2000	602	645	63.6	92.1	69.3	67.2	66.0	61.5	58.4	54.2	28.5
2000	602	700	63.2	72.2	69.3	67.4	66.2	61.8	58.6	54.6	9.0
2000	602	715	62.1	75.2	68.7	66.6	65.1	60.3	56.6	51.4	13.1
2000	602	730	63.5	87.7	72.2	67.6	66.1	60.7	58.1	54.5	24.2
2000	602	745	63.0	77.8	69.7	67.5	66.1	61.4	57.7	52.0	14.8
2000	602	800	60.9	77.1	70.0	65.7	63.6	58.8	54.6	50.5	16.2
2000	602	815	61.9	79.0	70.3	66.2	64.7	59.3	55.9	52.5	17.1
2000	602	830	62.5	73.1	69.2	67.2	65.9	60.8	57.3	53.7	10.6
2000	602	845	63.2	77.1	70.5	67.9	66.5	61.2	57.5	51.2	13.9
2000	602	900	64.3	73.6	71.5	69.4	67.9	62.2	58.6	54.4	9.3
2000	602	915	63.2	75.6	70.4	68.0	66.5	61.4	56.2	48.7	12.4
2000	602	930	63.8	75.5	71.0	68.6	67.2	62.1	57.4	51.0	11.7
2000	602	945	64.0	82.3	70.5	68.1	67.1	62.3	57.7	51.7	18.3
2000	602	1000	63.4	78.5	70.2	68.1	66.7	61.8	57.2	49.1	15.1
2000	602	1015	63.6	76.9	70.7	68.3	66.6	62.1	58.2	52.6	13.3
2000	602	1030	64.3	75.4	71.9	68.9	67.5	62.4	58.1	53.8	11.1
2000	602	1045	66.6	84.7	77.1	70.5	68.8	63.0	58.9	50.0	18.1
2000	602	1100	62.8	73.3	69.4	67.3	65.9	61.5	56.1	49.2	10.5
2000	602	1115	66.2	94.4	73.9	69.1	67.9	63.8	59.3	54.2	28.2
2000	602	1130	64.6	92.9	71.2	68.9	67.8	62.2	57.6	52.2	28.3
2000	602	1145	66.9	84.3	77.5	72.8	69.8	62.9	57.2	50.2	17.4
2000	602	1200	65.4	93.8	72.8	69.3	68.0	63.3	58.2	51.1	28.4
2000	602	1215	67.7	96.4	77.3	70.3	68.3	63.4	58.4	52.5	28.7
2000	602	1230	65.5	81.8	73.6	69.2	67.8	63.9	60.8	56.4	16.3
2000	602	1245	66.1	93.4	72.3	69.6	68.2	63.6	60.2	53.6	27.3
2000	602	1300	64.3	77.4	70.8	68.9	67.3	62.8	58.7	53.1	13.1
2000	602	1315	64.0	78.2	70.6	68.4	67.1	62.5	58.5	51.5	14.2
2000	602	1330	65.4	94.2	72.9	68.8	67.6	63.0	58.7	52.2	28.8
2000	602	1345	64.3	76.9	71.3	68.6	67.3	63.0	58.2	51.0	12.6
2000	602	1400	64.5	74.9	72.2	68.8	67.4	63.1	56.8	51.6	10.4
2000	602	1415	64.6	76.2	71.4	69.2	67.6	63.1	58.7	54.0	11.6
2000	602	1430	64.8	92.5	70.7	68.3	67.2	63.0	59.2	53.3	27.7
2000	602	1445	66.1	84.8	74.8	71.1	68.6	63.6	59.7	54.0	18.7
2000	602	1500	63.7	73.7	70.2	67.9	66.4	62.5	59.3	54.2	10.0
2000	602	1515	63.0	73.0	70.0	68.0	66.0	63.2	59.3	54.2	10.0
2000	602	1530	63.6	75.8	70.5	67.8	66.7	62.0	57.9	52.9	12.2
2000	602	1545	65.7	83.6	73.6	70.2	68.5	63.6	60.2	53.0	17.9
2000	602	1600	64.1	73.6	71.2	69.0	67.7	62.2	58.6	53.6	9.5
2000	602	1615	63.6	77.4	71.7	68.3	66.3	61.7	58.0	53.1	13.8
2000	602	1630	63.7	78.4	72.5	68.7	66.9	61.3	57.9	53.5	14.7
2000	602	1645	63.7	77.9	69.9	67.8	66.6	62.3	58.4	53.5	14.2
2000	602	1700	63.8	77.0	70.0	68.6	66.7	62.1	58.0	52.0	13.2
2000	602	1715	63.7	76.9	71.3	68.0	66.7	62.1	57.8	52.2	13.2
2000	602	1730	62.8	76.6	71.3	67.4	65.5	61.0	57.3	52.9	13.8
2000	602	1745	63.3	85.5	70.7	67.1	65.7	61.8	58.0	52.8	22.2
2000	602	1800	63.7	75.5	71.1	68.0	66.5	62.1	58.3	55.5	11.8
2000	602	1815	62.8	76.0	68.7	66.7	65.5	61.7	58.9	53.6	13.2
2000	602	1830	61.9	77.5	69.2	65.7	64.2	60.7	56.3	51.3	15.6
2000	602	1845	63.5	79.2	72.8	67.5	65.6	61.5	57.4	50.8	15.7
2000	602	1900	62.0	72.3	68.5	66.2	64.9	60.6	57.9	53.9	10.3
2000	602	1915	62.1	75.1	69.9	66.2	64.6	61.2	56.6	51.0	13.0
2000	602	1930	62.3	74.9	68.7	66.5	65.3	60.9	56.9	49.6	12.6
2000	602	1945	62.5	77.8	72.3	67.4	65.2	60.2	54.7	49.4	15.3
2000	602	2000	61.9	76.2	70.6	66.6	64.5	60.1	54.7	44.5	14.3
2000	602	2015	62.5	79.2	73.2	66.4	64.7	59.8	55.3	49.9	16.7
2000	602	2030	62.1	82.8	70.8	65.8	64.0	59.1	51.7	44.2	20.7
2000	602	2045	59.7	79.1	67.4	64.8	63.2	57.6	51.6	45.9	19.4
2000	602	2100	59.3	73.3	69.2	64.2	62.0	56.8	50.1	43.8	14.0
2000	602	2115	61.5	78.0	68.8	66.5	65.1	59.7	51.7	44.8	16.5
2000	602	2130	60.1	71.9	67.0	64.5	63.2	58.6	52.1	43.3	11.8
2000	602	2145	59.9	76.3	68.3	64.7	63.0	57.9	52.1	46.7	16.4
2000	602	2200	59.1	71.2	67.4	64.8	62.8	56.7	51.0	43.9	12.1
2000	602	2215	57.7	70.8	67.3	62.3	60.6	55.5	48.2	42.8	13.1
2000	602	2230	59.0	71.8	67.3	64.4	62.8	56.7	48.6	42.9	12.8
2000	602	2245	57.7	72.6	66.1	62.6	61.0	55.6	47.5	41.0	14.9
2000	602	2300	59.3	71.2	67.2	64.4	62.6	57.5	51.4	45.2	11.9
2000	602	2315	60.4	74.4	68.4	65.5	63.9	58.0	50.6	39.2	14.0
2000	602	2330	59.5	71.5	67.8	64.7	62.7	57.6	49.7	40.6	12.0
2000	602	2345	57.2	72.5	67.7	61.7	60.3	54.4	47.4	42.8	15.3
2000	602	0	58.7	71.6	68.5	64.4	62.0	55.8	47.3	41.5	12.9

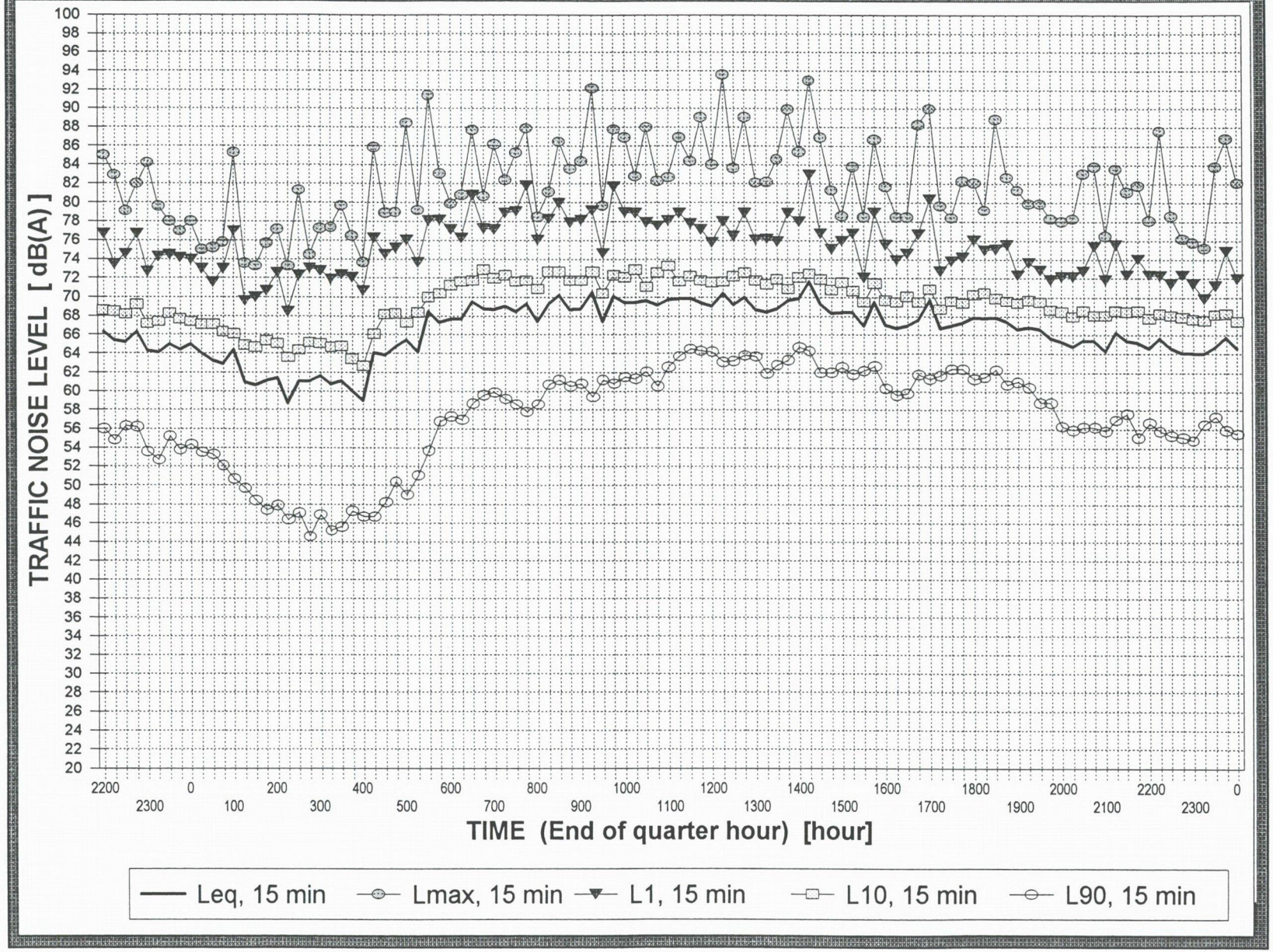
DAY 7	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**62.7**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**59.0**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**63.8**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**59.8**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**65.7**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**54.6**	dB(A)

31 Marley Crescent, Bonnyrigg Heights

DAY 1

Saturday 27 May 2000

RT&A S/N 80



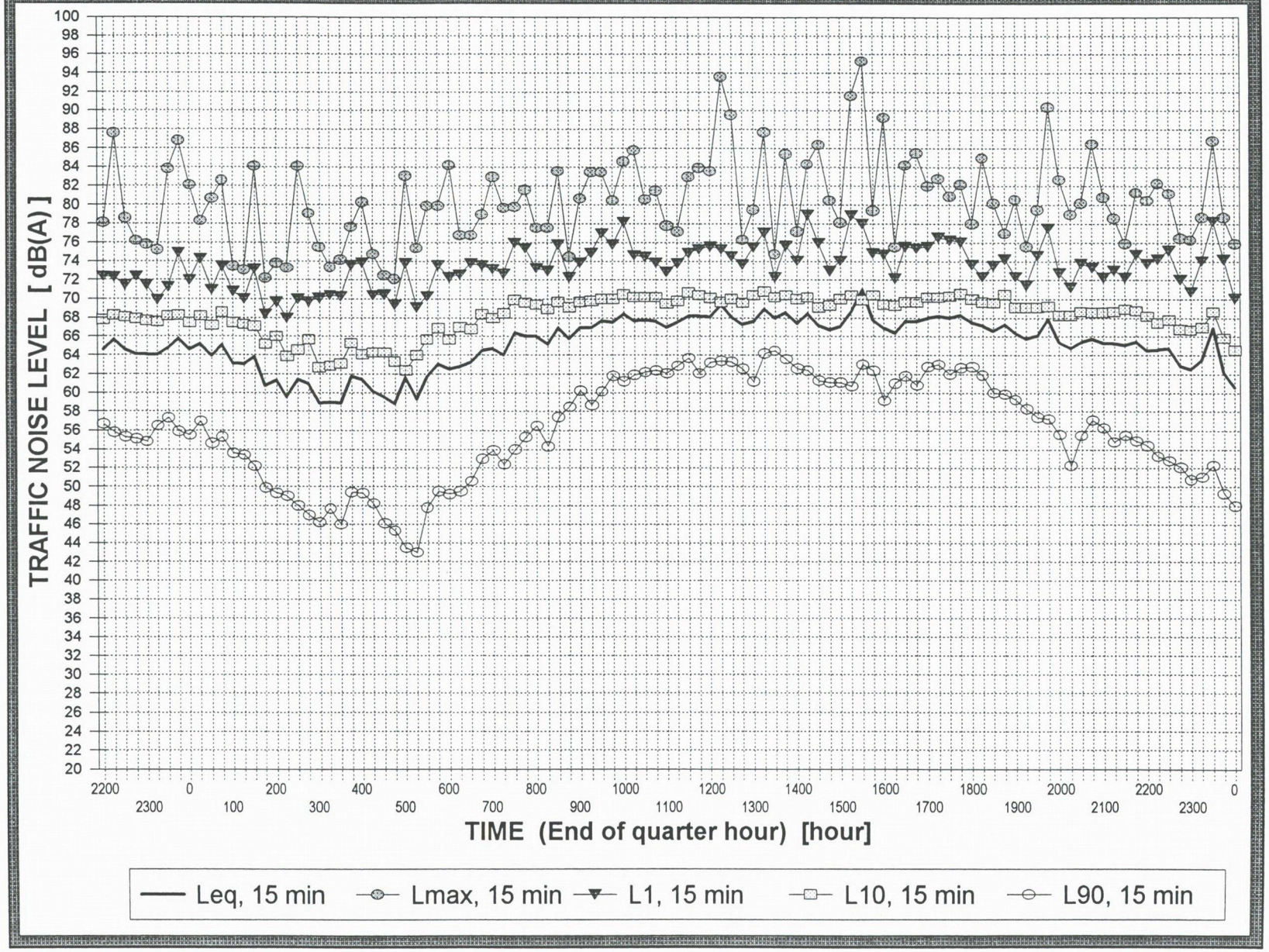
KOIKAS ACOUSTICS PTY LTD

31 Marley Crescent, Bonnyrigg Heights

DAY 2

Sunday 28 May 2000

RT&A S/N 80



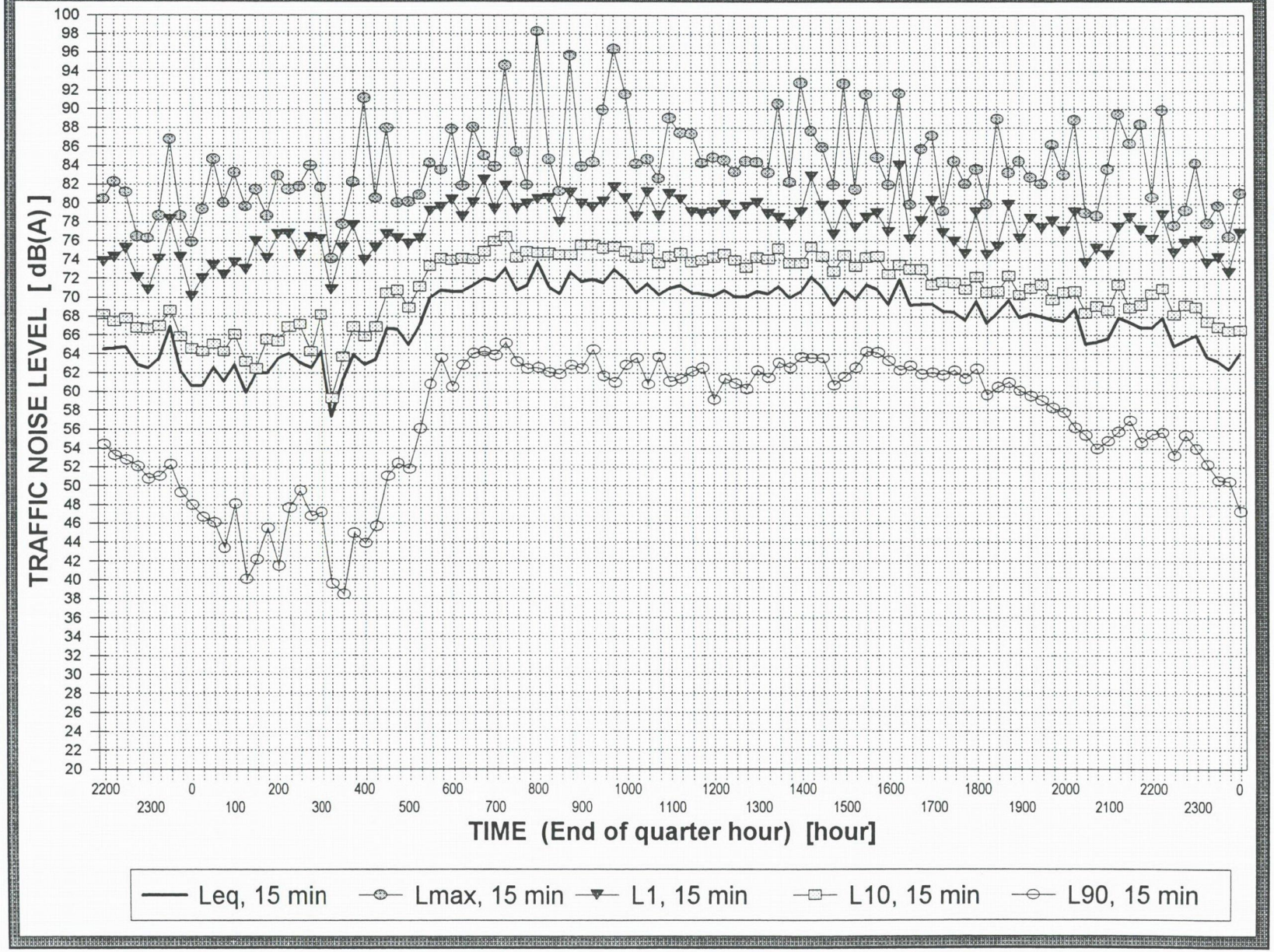
KOIKAS ACOUSTICS PTY LTD

31 Marley Crescent, Bonnyrigg Heights

DAY 3

Monday 29 May 2000

RT&A S/N 80



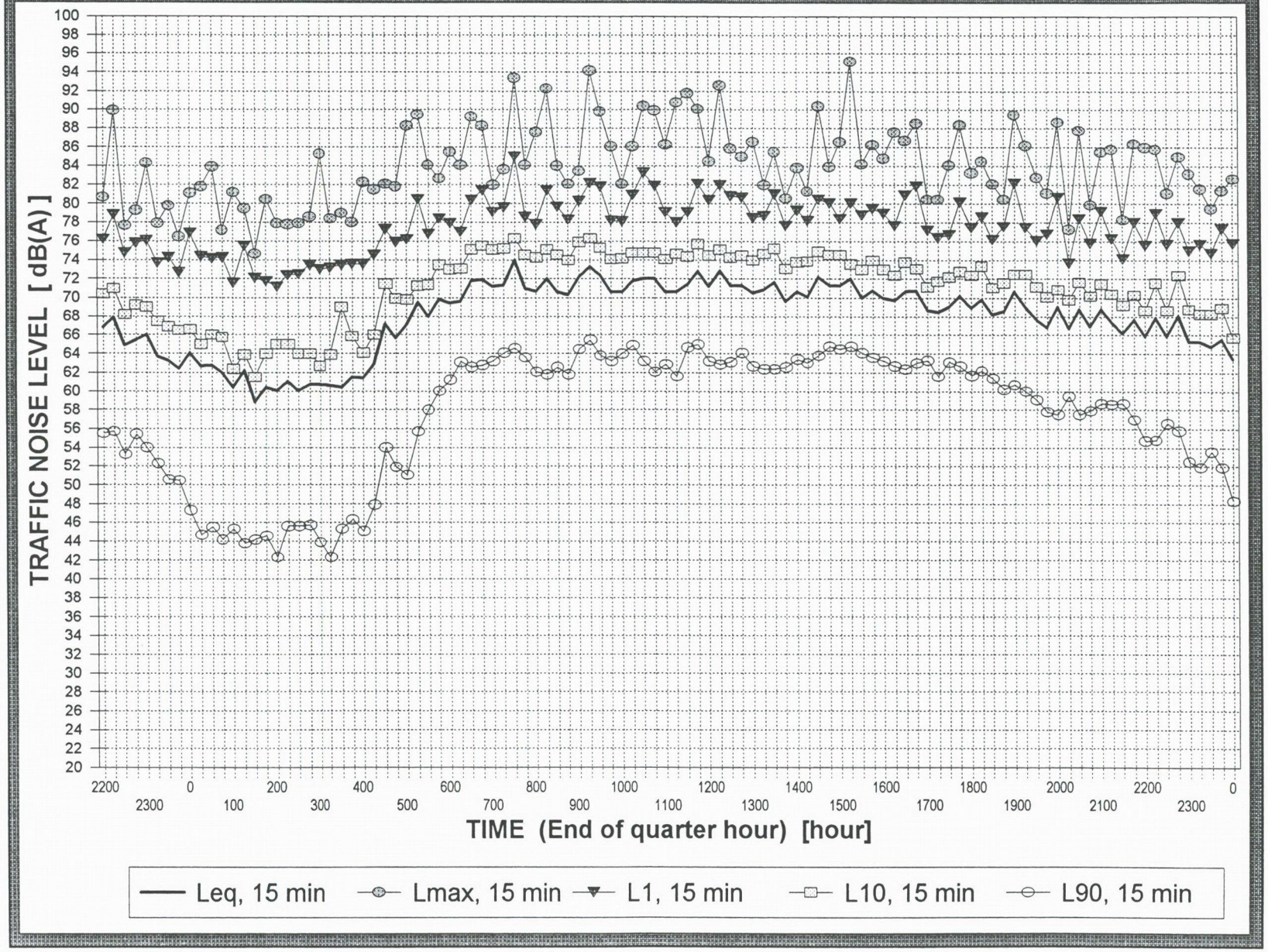
KOIKAS ACOUSTICS PTY LTD

31 Marley Crescent, Bonnyrigg Heights

DAY 4

Tuesday 30 May 2000

RT&A S/N 80



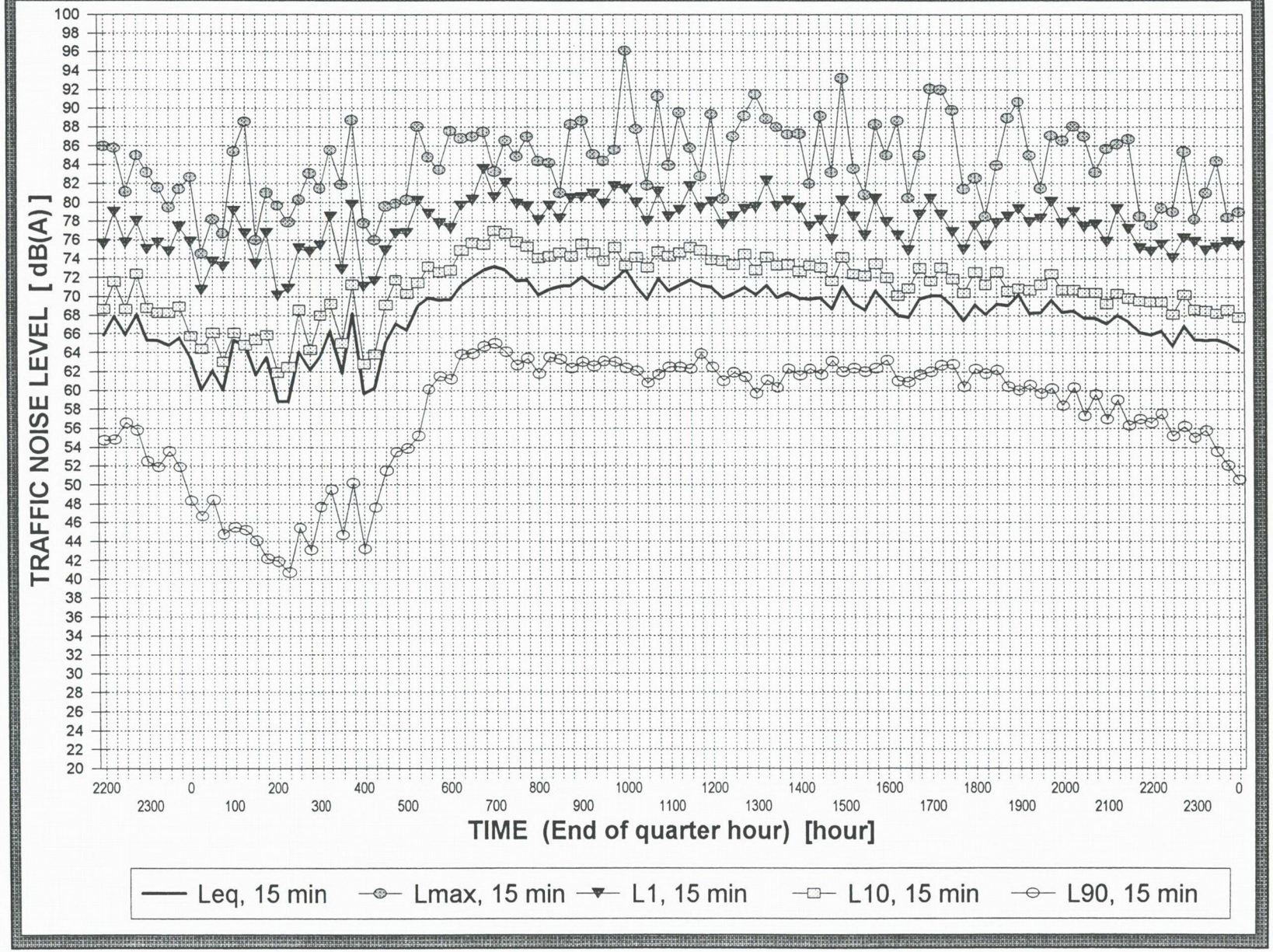
KOIKAS ACOUSTICS PTY LTD

31 Marley Crescent, Bonnyrigg Heights

DAY 5

Wednesday 31 May 2000

RT&A S/N 80



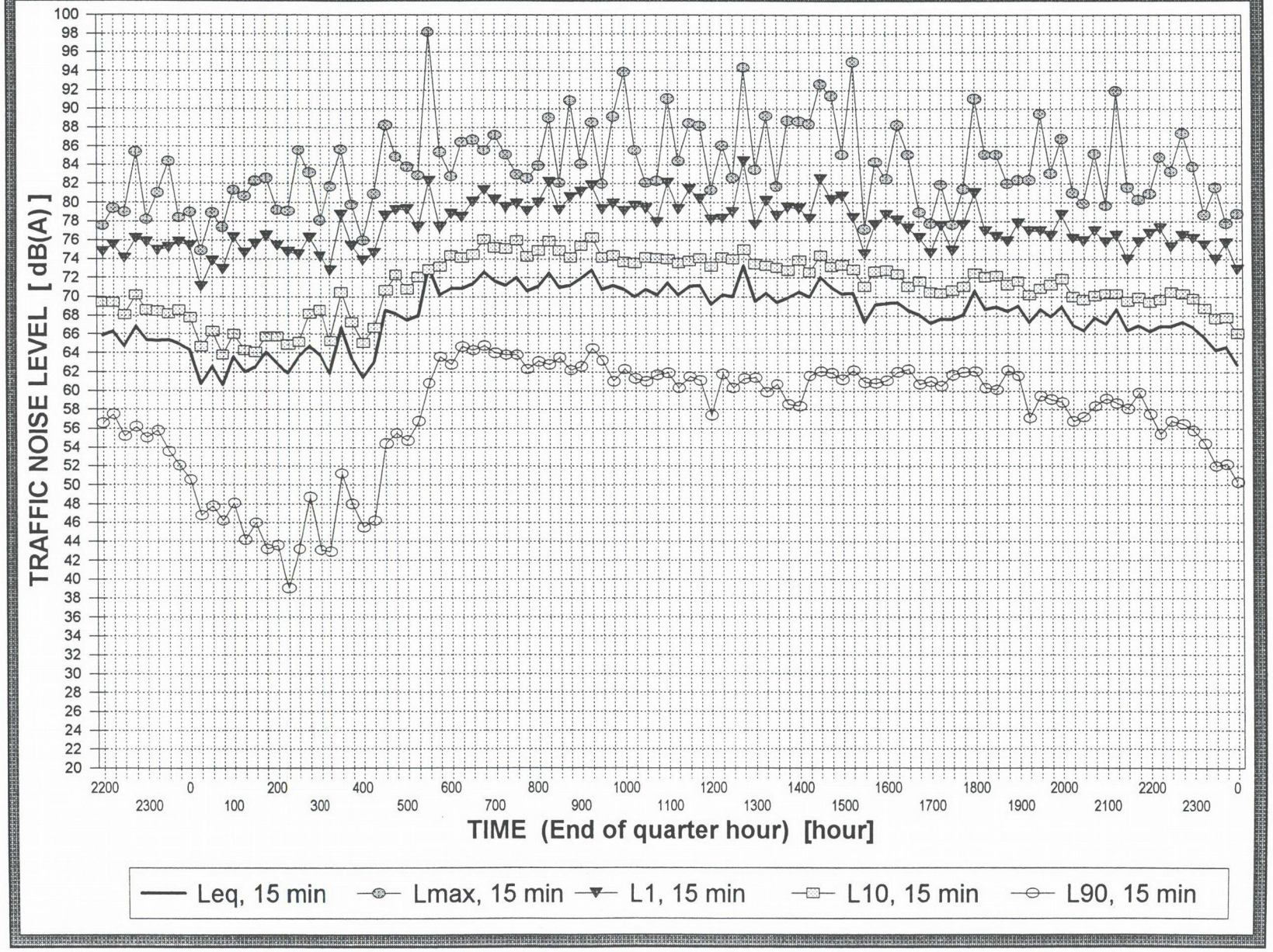
KOIKAS ACOUSTICS PTY LTD

31 Marley Crescent, Bonnyrigg Heights

DAY 6

Thursday 1 June 2000

RT&A S/N 80



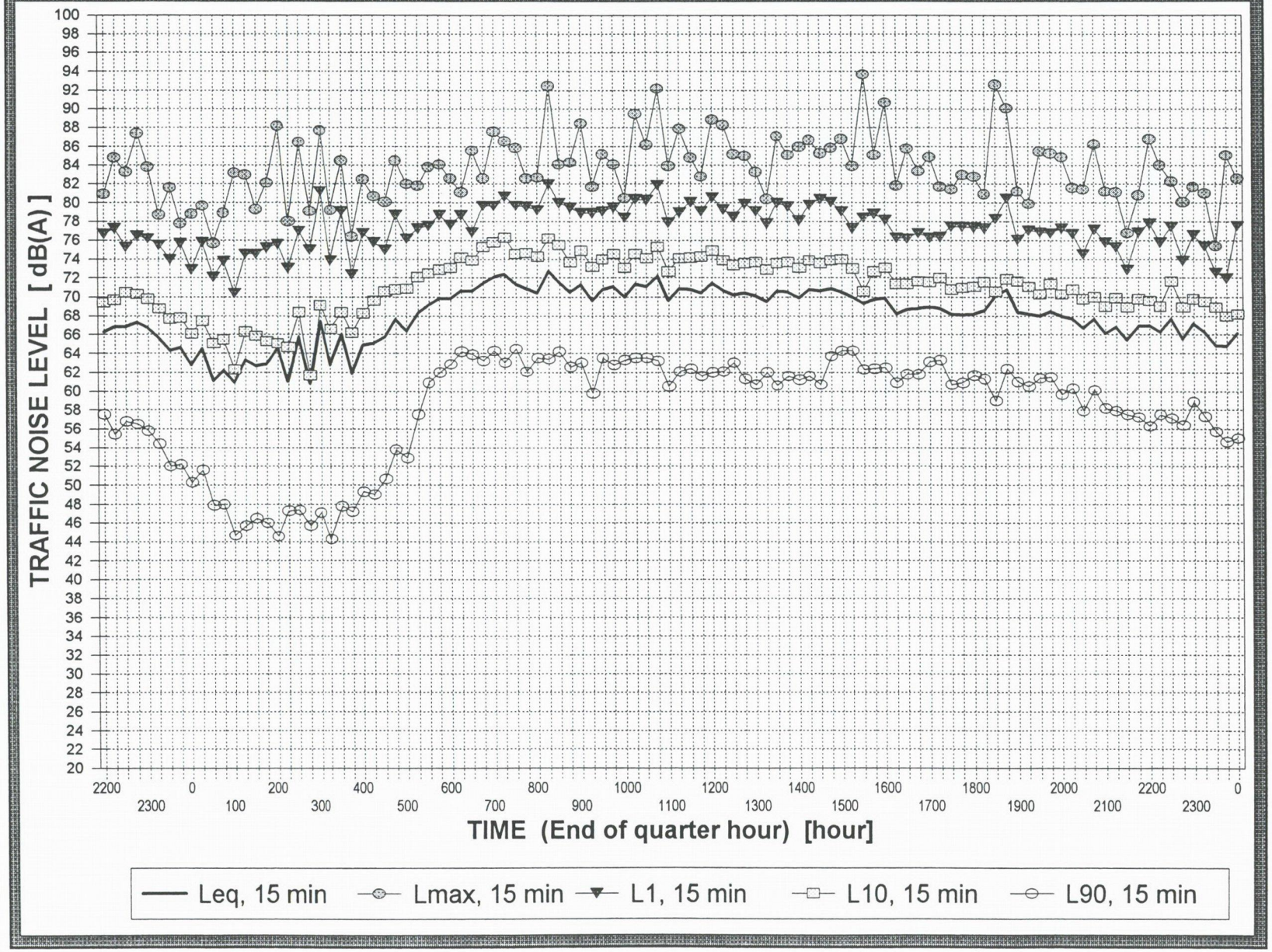
KOIKAS ACOUSTICS PTY LTD

31 Marley Crescent, Bonnyrigg Heights

DAY 7

Friday 2 June 2000

RT&A S/N 80



KOIKAS ACOUSTICS PTY LTD

31 Marley Crescent, Bonnyrigg Heights — DAY 1

Saturday 27 May 2000 — RT&A S/N 80

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	526	2215	65.4	82.9	73.5	70.3	68.5	63.4	54.8	51.0	17.5
2000	526	2230	65.2	79.1	74.6	70.5	68.2	63.1	56.3	50.0	13.9
2000	526	2245	66.3	82.0	76.7	72.0	69.2	63.1	56.2	50.7	15.7
2000	526	2300	64.3	84.2	72.7	68.7	67.2	61.6	53.6	49.5	19.9
2000	526	2315	64.1	79.6	74.3	68.9	67.4	61.6	52.7	47.3	15.5
2000	526	2330	65.0	78.0	74.5	70.7	68.3	62.2	55.2	50.3	13.0
2000	526	2345	64.4	77.0	74.2	69.3	67.7	61.7	53.8	49.0	12.6
2000	526	0	65.0	78.0	74.0	69.0	67.4	62.1	54.3	48.3	13.0
2000	527	15	64.0	75.0	73.0	68.0	67.1	61.9	53.5	47.9	11.0
2000	527	30	63.2	75.2	71.6	68.3	67.1	60.6	53.3	48.8	12.0
2000	527	45	62.9	75.8	73.0	67.9	66.3	59.7	52.1	48.4	12.9
2000	527	100	64.4	85.3	77.0	68.6	66.1	59.2	50.7	45.5	20.9
2000	527	115	60.9	73.6	69.6	66.3	64.9	57.4	49.7	45.4	12.7
2000	527	130	60.6	73.3	70.0	67.0	64.7	56.0	48.4	44.4	12.7
2000	527	145	61.1	75.7	70.7	66.8	65.4	56.2	47.4	42.9	14.6
2000	527	200	61.4	77.2	72.6	67.1	65.1	56.6	47.9	44.0	15.8
2000	527	215	58.7	73.3	68.5	65.9	63.6	52.4	46.4	42.0	14.6
2000	527	230	61.0	81.3	72.3	67.2	64.4	54.3	47.1	43.0	20.3
2000	527	245	61.0	74.5	73.1	67.8	65.2	52.8	44.6	40.3	13.5
2000	527	300	61.6	77.3	72.8	68.6	65.1	54.3	46.9	42.5	15.7
2000	527	315	60.7	77.4	71.9	67.4	64.7	54.1	45.2	39.4	16.7
2000	527	330	61.1	79.7	72.4	67.2	64.8	52.4	45.6	40.4	18.6
2000	527	345	60.0	76.5	72.1	65.9	63.4	53.4	47.3	41.7	16.5
2000	527	400	59.0	73.7	70.7	65.9	62.7	51.7	46.7	41.5	14.7
2000	527	415	64.1	85.9	76.3	69.8	66.1	53.9	46.7	43.1	21.8
2000	527	430	63.8	78.9	74.6	71.2	68.2	56.5	48.2	41.0	15.1
2000	527	445	64.7	79.0	75.2	71.8	68.3	59.2	50.4	42.5	14.3
2000	527	500	65.5	88.5	76.1	69.8	67.3	56.9	49.0	43.4	23.0
2000	527	515	64.2	79.2	73.7	70.8	68.4	58.9	51.1	42.7	15.0
2000	527	530	68.5	91.4	78.1	72.3	70.0	62.2	53.7	46.9	22.9
2000	527	545	67.3	83.1	78.2	72.8	70.4	64.2	56.8	49.8	15.8
2000	527	600	67.7	79.9	77.2	73.8	71.3	64.7	57.3	53.4	12.2
2000	527	615	67.7	80.8	76.3	73.8	71.7	64.8	57.0	52.2	13.1
2000	527	630	69.5	87.7	80.8	73.8	71.8	66.2	58.7	53.6	18.2
2000	527	645	68.8	80.7	77.3	74.7	72.9	66.0	59.6	55.6	11.9
2000	527	700	68.7	86.2	77.2	74.0	72.0	66.2	59.9	52.6	17.5
2000	527	715	69.0	82.4	78.9	74.9	72.3	66.0	59.2	52.9	13.4
2000	527	730	68.5	85.3	79.1	73.9	71.7	65.2	58.6	53.9	16.8
2000	527	745	69.3	87.9	81.8	74.6	71.8	65.1	57.8	51.9	18.6
2000	527	800	67.4	78.5	76.1	73.0	70.9	65.0	58.6	52.8	11.1
2000	527	815	69.3	81.1	78.3	75.2	72.7	66.8	60.7	55.2	11.8
2000	527	830	70.2	86.5	80.0	74.8	72.7	67.5	61.2	54.1	16.3
2000	527	845	68.7	83.6	77.9	74.0	71.8	66.3	60.5	53.5	14.9
2000	527	900	68.8	84.4	78.2	73.7	71.8	66.6	60.8	54.4	15.6
2000	527	915	70.5	92.2	79.2	75.4	72.7	66.5	59.4	53.8	21.7
2000	527	930	67.4	79.7	74.7	71.8	70.4	66.3	61.2	54.2	12.3
2000	527	945	70.1	87.8	81.7	74.6	72.3	66.7	60.8	55.6	17.7
2000	527	1000	69.4	86.9	79.0	74.5	72.1	66.6	61.5	56.7	17.5
2000	527	1015	69.4	82.8	78.9	74.4	72.9	67.2	61.3	55.2	13.4
2000	527	1030	69.6	88.0	77.9	73.2	71.1	66.9	62.1	56.5	18.4
2000	527	1045	69.1	82.3	77.6	74.3	72.6	67.3	60.5	55.4	13.2
2000	527	1100	69.7	82.7	78.1	75.0	73.3	67.5	62.6	57.2	13.0
2000	527	1115	69.8	86.9	78.9	74.0	71.7	67.9	63.7	56.9	17.1
2000	527	1130	69.9	84.4	77.8	74.1	72.2	68.4	64.5	59.8	14.5
2000	527	1145	69.4	89.1	77.2	74.2	71.8	68.1	64.3	59.9	19.7
2000	527	1200	69.0	84.0	75.8	73.0	71.6	67.9	64.2	59.1	15.0
2000	527	1215	70.4	93.6	78.0	73.7	71.7	67.8	63.1	56.2	23.2
2000	527	1230	69.2	83.7	76.5	73.6	72.2	67.9	63.2	58.7	14.5
2000	527	1245	70.0	89.1	78.9	74.3	72.6	68.2	63.8	60.3	19.1
2000	527	1300	68.7	82.1	76.1	73.6	71.8	67.5	63.7	60.2	13.4
2000	527	1315	68.4	82.2	76.2	73.0	71.4	67.2	61.9	54.4	13.8
2000	527	1330	68.8	84.6	75.9	73.4	71.9	67.4	62.8	58.2	15.8
2000	527	1345	69.6	89.9	78.9	72.7	70.9	67.8	63.3	57.1	20.3
2000	527	1400	69.9	85.4	78.0	73.6	72.1	68.6	64.7	60.8	15.5
2000	527	1415	71.7	93.0	83.0	74.4	72.5	68.6	64.3	58.4	21.3
2000	527	1430	69.3	86.9	76.8	73.2	71.9	67.8	62.0	56.4	17.6
2000	527	1445	68.3	81.3	75.1	72.3	70.8	67.3	62.0	56.8	13.0
2000	527	1500	68.4	78.6	76.0	73.3	71.6	67.0	62.6	58.4	10.2
2000	527	1515	68.4	83.8	76.8	72.3	70.7	67.1	61.8	55.7	15.4
2000	527	1530	67.0	78.5	72.1	70.3	69.5	66.6	62.2	58.6	11.5
2000	527	1545	69.5	86.7	79.0	74.0	71.5	67.3	62.7	56.7	17.2
2000	527	1600	67.1	81.7	75.6	71.6	69.7	65.8	60.3	55.9	14.6
2000	527	1615	66.7	78.5	74.0	70.8	69.5	65.9	59.6	53.9	11.8
2000	527	1630	67.0	78.5	74.7	71.5	70.1	65.7	59.8	52.1	11.5
2000	527	1645	67.6	88.3	76.7	70.8	69.5	66.1	61.8	56.6	20.7
2000	527	1700	69.7	90.0	80.4	73.0	70.9	66.3	61.3	55.2	20.3
2000	527	1715	66.7	79.7	72.8	69.7	68.8	66.2	61.7	56.7	13.0
2000	527	1730	67.0	78.4	73.9	70.6	69.6	66.3	62.4	56.0	11.4
2000	527	1745	67.3	82.3	74.3	70.3	69.4	66.7	62.4	56.5	15.0
2000	527	1800	67.9	82.1	76.1	71.6	70.3	66.8	61.3	54.6	14.2
2000	527	1815	67.8	79.2	75.0	72.0	70.5	67.1	61.5	56.9	11.4
2000	527	1830	67.9	88.9	75.1	71.2	69.9	66.9	62.3	55.2	21.0
2000	527	1845	67.4	82.7	75.6	70.6	69.6	66.4	60.7	55.3	15.3
2000	527	1900	66.6	81.3	72.4	70.3	69.4	65.9	61.0	55.8	14.7
2000	527	1915	66.8	79.9	73.7	70.7	69.7	65.9	60.4	53.2	13.1
2000	527	1930	66.6	79.9	72.9	70.3	69.5	66.1	58.8	52.8	13.3
2000	527	1945	65.7	78.3	71.9	69.5	68.7	65.0	58.8	52.0	12.6
2000	527	2000	65.3	78.0	72.2	69.7	68.5	64.3	56.3	50.1	12.7
2000	527	2015	64.8	78.3	72.2	69.2	68.0	63.7	55.9	52.1	13.5
2000	527	2030	65.5	83.1	72.8	69.8	68.6	63.4	56.2	50.5	17.6
2000	527	2045	65.4	83.8	75.4	69.5	68.1	62.8	56.2	51.6	18.4
2000	527	2100	64.3	76.5	71.9	69.5	68.1	62.3	55.8	51.8	12.2
2000	527	2115	66.3	83.6	75.6	70.0	68.6	64.2	57.0	51.0	17.3
2000	527	2130	65.4	81.1	72.4	69.9	68.5	63.9	57.6	51.2	15.7
2000	527	2145	65.2	81.8	74.1	70.0	68.6	62.5	55.1	49.6	16.6
2000	527	2200	64.6	78.1	72.4	69.1	67.8	63.4	56.7	50.7	13.5
2000	527	2215	65.7	87.6	72.3	69.2	68.3	63.4	55.8	51.5	21.9
2000	527	2230	64.6	78.6	71.5	69.1	68.1	63.1	55.3	49.5	14.0
2000	527	2245	64.1	76.2	72.4	69.3	67.9	61.9	55.1	48.1	12.1
2000	527	2300	64.1	75.8	71.5	69.0	67.7	62.5	54.8	50.7	11.7
2000	527	2315	64.0	75.2	69.9	68.5	67.6	62.5	56.5	49.6	11.2
2000	527	2330	64.8	83.8	71.3	69.2	68.2	63.2	57.3	49.6	19.0
2000	527	2345	65.8	86.8	74.9	69.4	68.3	62.8	55.9	50.5	21.0
2000	527	0	64.6	82.1	72.0	68.9	67.5	62.8	55.5	49.8	17.5

DAY 1	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**67.4**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**63.9**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**68.4**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**64.9**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**70.5**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**57.8**	dB(A)

31 Marley Crescent, Bonnyrigg Heights											DAY 2
Sunday 28 May 2000									RT&A S/N 80		
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	527	2200	64.6	78.1	72.4	69.1	67.8	63.4	56.7	50.7	13.5
2000	527	2215	65.7	87.6	72.3	69.2	68.3	63.4	55.8	51.5	21.9
2000	527	2230	64.6	78.6	71.5	69.1	68.1	63.1	55.3	49.5	14.0
2000	527	2245	64.1	76.2	72.4	69.3	67.9	61.9	55.1	48.1	12.1
2000	527	2300	64.1	75.8	71.5	69.0	67.7	62.5	54.8	50.7	11.7
2000	527	2315	64.0	75.2	69.9	68.5	67.6	62.5	56.5	49.6	11.2
2000	527	2330	64.8	83.8	71.3	69.2	68.2	63.2	57.3	49.6	19.0
2000	527	2345	65.8	86.8	74.9	69.4	68.3	62.8	55.9	50.5	21.0
2000	527	0	64.6	82.1	72.0	68.9	67.5	62.8	55.5	49.8	17.5
2000	528	15	65.2	78.3	74.3	69.4	68.2	63.5	57.0	50.7	13.1
2000	528	30	63.9	80.7	71.0	68.3	67.2	61.5	54.6	50.5	16.8
2000	528	45	65.1	82.6	73.5	70.2	68.6	63.0	55.3	49.9	17.5
2000	528	100	63.1	73.5	70.8	68.7	67.5	60.2	53.6	48.1	10.4
2000	528	115	63.0	73.1	70.0	68.4	67.3	60.3	53.4	49.0	10.1
2000	528	130	63.8	84.1	73.2	68.5	67.1	60.0	52.2	46.9	20.3
2000	528	145	60.7	72.2	68.4	66.6	65.2	57.3	49.9	45.8	11.5
2000	528	200	61.3	73.8	69.7	67.6	66.0	56.7	49.3	46.4	12.5
2000	528	215	59.5	73.3	68.0	65.8	63.9	54.9	49.0	43.8	13.8
2000	528	230	61.4	84.1	70.0	66.2	64.6	54.9	48.0	44.3	22.7
2000	528	245	60.9	79.1	69.7	67.2	65.7	54.7	47.0	41.9	18.2
2000	528	300	58.9	75.5	70.1	65.4	62.7	52.3	46.2	42.0	16.6
2000	528	315	59.0	73.4	70.4	65.6	62.9	53.1	47.7	43.5	14.4
2000	528	330	58.9	74.2	70.3	65.3	63.1	51.7	46.0	39.1	15.3
2000	528	345	61.7	77.7	73.6	67.9	65.3	54.4	49.4	46.1	16.0
2000	528	400	61.4	80.3	73.9	66.3	64.1	53.4	49.3	46.1	18.9
2000	528	415	60.1	74.8	70.4	66.7	64.3	54.6	48.2	44.1	14.7
2000	528	430	59.5	72.5	70.5	66.7	64.3	52.4	46.1	41.9	13.0
2000	528	445	58.8	72.1	69.4	65.8	63.3	52.9	45.3	39.2	13.3
2000	528	500	61.6	83.1	73.8	65.2	62.4	49.9	43.5	39.5	21.5
2000	528	515	59.3	75.4	69.1	65.7	64.0	51.4	43.0	36.9	16.1
2000	528	530	61.7	79.9	70.3	67.6	65.7	56.0	47.8	41.1	18.2
2000	528	545	63.0	79.9	73.6	68.6	66.9	57.8	49.5	44.0	16.9
2000	528	600	62.5	84.2	72.3	67.8	65.7	55.4	49.2	42.2	21.7
2000	528	615	62.8	76.8	72.6	68.9	67.0	57.8	49.5	43.8	14.0
2000	528	630	63.2	76.8	73.8	68.8	66.8	58.7	50.6	44.5	13.6
2000	528	645	64.5	79.0	73.6	70.9	68.4	60.6	53.0	48.6	14.5
2000	528	700	64.7	83.0	73.2	69.5	68.0	61.1	53.9	48.7	18.3
2000	528	715	64.0	79.7	72.7	70.0	68.5	60.4	52.4	48.2	15.7
2000	528	730	66.4	79.8	76.0	72.2	69.9	63.2	54.0	46.3	13.4
2000	528	745	66.0	81.6	75.4	71.2	69.6	62.8	55.3	49.5	15.6
2000	528	800	66.0	77.6	73.3	70.7	69.4	64.4	56.5	50.3	11.6
2000	528	815	65.2	77.6	73.0	70.3	68.9	63.4	54.3	50.3	12.4
2000	528	830	66.9	83.6	75.8	71.1	69.7	65.1	57.4	52.1	16.7
2000	528	845	65.8	74.5	72.3	69.9	69.1	64.8	58.5	53.9	8.7
2000	528	900	66.9	80.7	73.9	71.2	69.7	66.0	60.2	54.8	13.8
2000	528	915	66.9	83.5	74.9	70.9	69.8	65.5	58.7	54.2	16.6
2000	528	930	67.7	83.5	77.0	71.2	70.0	66.4	60.1	50.0	15.8
2000	528	945	67.5	80.5	75.8	71.2	70.0	66.5	61.8	53.1	13.0
2000	528	1000	68.4	84.6	78.2	72.0	70.5	66.7	61.2	53.6	16.2
2000	528	1015	67.7	85.8	74.7	71.3	70.2	66.7	61.9	56.6	18.1
2000	528	1030	67.8	80.6	74.5	71.7	70.2	67.3	62.2	56.5	12.8
2000	528	1045	67.6	81.5	73.9	71.4	70.2	67.0	62.4	55.7	13.9
2000	528	1100	67.0	77.8	72.9	70.4	69.5	66.5	62.1	57.7	10.8
2000	528	1115	67.5	77.2	73.8	70.8	69.8	67.2	62.9	57.9	9.7
2000	528	1130	68.2	83.0	74.9	71.8	70.7	67.5	63.7	57.7	14.8
2000	528	1145	68.2	83.9	75.3	71.5	70.4	67.4	62.1	57.8	15.7
2000	528	1200	68.1	83.6	75.6	71.1	70.1	67.2	63.2	57.8	15.5
2000	528	1215	69.4	93.6	75.3	70.6	69.7	66.9	63.4	57.2	24.2
2000	528	1230	68.1	89.6	74.6	71.3	70.0	67.5	63.3	58.5	21.5
2000	528	1245	67.3	76.3	73.7	70.6	69.6	66.7	62.6	58.4	9.0
2000	528	1300	67.6	79.5	75.5	71.7	70.4	66.5	61.2	55.5	11.9
2000	528	1315	68.9	87.7	77.1	72.7	70.8	67.5	64.2	59.1	18.8
2000	528	1330	68.0	74.8	72.3	70.8	70.2	67.8	64.5	58.5	6.8
2000	528	1345	68.6	85.4	75.7	71.9	70.4	67.3	63.6	57.0	16.8
2000	528	1400	67.4	77.2	74.1	71.3	70.0	66.7	62.6	56.9	9.8
2000	528	1415	68.5	84.3	79.0	71.6	70.2	67.1	62.4	56.9	15.8
2000	528	1430	67.2	86.4	76.0	70.3	69.1	66.2	61.3	54.6	19.2
2000	528	1445	66.7	80.5	73.0	70.5	69.3	66.0	61.1	51.7	13.8
2000	528	1500	67.1	78.1	74.1	71.4	70.0	66.3	61.1	55.8	11.0
2000	528	1515	68.7	91.6	78.9	71.5	70.4	66.3	60.7	54.3	22.9
2000	528	1530	71.0	95.3	78.0	71.1	69.9	67.0	63.0	57.5	24.3
2000	528	1545	67.8	79.4	74.9	71.3	70.4	67.1	62.4	54.8	11.6
2000	528	1600	66.9	89.3	74.8	70.4	69.4	65.9	59.2	53.2	22.4
2000	528	1615	66.4	75.5	72.2	70.2	69.3	65.8	61.0	55.3	9.1
2000	528	1630	67.7	84.2	75.6	70.9	69.7	66.5	61.8	56.8	16.5
2000	528	1645	67.6	85.5	75.4	70.8	69.7	66.7	60.8	54.5	17.9
2000	528	1700	68.0	82.0	75.6	71.2	70.2	67.1	62.8	53.3	14.0
2000	528	1715	68.2	82.8	76.6	71.3	70.2	67.3	63.0	56.5	14.6
2000	528	1730	68.0	80.9	76.3	71.1	70.3	67.3	62.0	57.2	12.9
2000	528	1745	68.3	82.2	76.1	72.0	70.6	67.5	62.7	56.1	13.9
2000	528	1800	67.5	78.0	73.7	70.8	70.0	67.1	62.8	55.0	10.5
2000	528	1815	67.2	85.0	72.4	70.4	69.7	66.8	61.9	55.2	17.8
2000	528	1830	66.6	80.2	73.6	70.6	69.6	65.6	60.0	56.6	13.6
2000	528	1845	67.3	77.0	74.3	71.7	70.5	66.4	59.9	55.2	9.7
2000	528	1900	66.4	80.6	72.4	70.1	69.1	65.8	59.3	52.8	14.2
2000	528	1915	65.8	75.6	71.5	70.0	69.1	65.0	58.3	52.4	9.8
2000	528	1930	66.1	79.5	74.7	70.2	69.1	64.7	57.4	52.2	13.4
2000	528	1945	67.9	90.4	77.6	70.5	69.2	64.8	57.2	52.6	22.5
2000	528	2000	65.4	82.7	72.8	69.2	68.3	63.7	55.6	49.3	17.3
2000	528	2015	64.8	79.0	71.3	69.4	68.3	63.7	52.3	48.2	14.2
2000	528	2030	65.4	80.2	73.8	69.9	68.7	64.0	55.5	51.3	14.8
2000	528	2045	65.8	86.5	73.4	70.0	68.6	64.1	57.1	51.3	20.7
2000	528	2100	65.3	80.8	72.3	70.0	68.6	64.0	56.3	49.6	15.5
2000	528	2115	65.3	78.6	73.1	70.0	68.7	64.1	54.8	51.0	13.3
2000	528	2130	65.1	75.9	72.3	70.0	68.9	63.7	55.5	47.6	10.8
2000	528	2145	65.5	81.3	74.8	70.4	68.8	62.4	54.9	48.1	15.8
2000	528	2200	64.5	80.5	73.8	69.4	68.2	61.7	54.4	49.9	16.0
2000	528	2215	64.6	82.3	74.3	69.6	67.5	60.3	53.3	47.4	17.7
2000	528	2230	64.8	81.2	75.2	70.2	67.8	61.1	52.8	47.5	16.4
2000	528	2245	62.9	76.5	72.1	68.3	66.8	59.5	52.1	47.1	13.6
2000	528	2300	62.5	76.3	70.8	68.3	66.7	59.1	50.8	46.1	13.8
2000	528	2315	63.5	78.7	74.1	68.7	67.0	59.8	51.1	42.6	15.2
2000	528	2330	66.9	86.8	78.3	71.8	68.7	60.1	52.3	48.2	19.9
2000	528	2345	62.2	78.7	74.3	67.7	65.9	56.7	49.3	44.8	16.5

DAY 2	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**66.1**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**62.7**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**67.3**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**62.9**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**69.2**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**52.4**	dB(A)

31 Marley Crescent, Bonnyrigg Heights — DAY 3

Monday 29 May 2000 — RT&A S/N 80

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	528	2215	64.6	82.3	74.3	69.6	67.5	60.3	53.3	47.4	17.7
2000	528	2230	64.8	81.2	75.2	70.2	67.8	61.1	52.8	47.5	16.4
2000	528	2245	62.9	76.5	72.1	68.3	66.8	59.5	52.1	47.1	13.6
2000	528	2300	62.5	76.3	70.8	68.3	66.7	59.1	50.8	46.1	13.8
2000	528	2315	63.5	78.7	74.1	68.7	67.0	59.8	51.1	42.6	15.2
2000	528	2330	66.9	86.8	78.3	71.8	68.7	60.1	52.3	48.2	19.9
2000	528	2345	62.2	78.7	74.3	67.7	65.9	56.7	49.3	44.8	16.5
2000	528	0	60.6	75.9	70.1	66.3	64.6	54.9	48.0	41.7	15.3
2000	529	15	60.6	79.4	72.0	66.4	64.3	53.5	46.7	40.4	18.8
2000	529	30	62.6	84.7	73.4	67.3	65.1	54.8	46.1	41.3	22.1
2000	529	45	61.1	80.1	72.4	66.8	64.3	52.1	43.4	37.7	19.0
2000	529	100	62.9	83.3	73.7	68.7	66.1	55.9	48.1	42.5	20.4
2000	529	115	59.9	79.7	73.0	66.2	63.2	48.7	40.1	34.9	19.8
2000	529	130	62.0	81.5	76.0	66.1	62.5	51.0	42.2	38.4	19.5
2000	529	145	62.0	78.7	74.2	68.8	65.6	52.7	45.5	40.1	16.7
2000	529	200	63.5	83.0	76.7	69.1	65.4	49.8	41.5	38.1	19.5
2000	529	215	64.1	81.5	76.8	70.4	66.9	54.5	47.7	39.1	17.4
2000	529	230	63.1	81.8	74.6	69.9	67.2	55.3	49.5	45.1	18.7
2000	529	245	62.6	84.0	76.4	67.8	64.3	52.2	46.8	43.6	21.4
2000	529	300	64.3	81.7	76.2	71.5	68.2	54.8	47.2	42.8	17.4
2000	529	315	57.3	74.2	70.9	63.7	59.3	46.9	39.6	35.7	16.9
2000	529	330	61.3	77.8	75.3	67.7	63.7	51.2	38.5	35.6	16.5
2000	529	345	63.9	82.3	77.7	70.2	66.9	52.9	45.0	41.4	18.4
2000	529	400	62.9	91.2	74.0	69.0	65.9	52.6	43.9	38.3	28.3
2000	529	415	63.4	80.6	75.3	69.7	66.9	55.4	45.7	37.5	17.2
2000	529	430	66.7	88.0	76.7	72.7	70.5	60.9	51.1	40.9	21.3
2000	529	445	66.6	80.1	76.3	73.4	70.8	61.4	52.4	46.8	13.5
2000	529	500	65.0	80.2	75.7	72.1	68.9	59.2	51.8	46.7	15.2
2000	529	515	67.1	80.9	76.3	72.7	71.2	64.0	56.1	47.7	13.8
2000	529	530	70.0	84.3	79.2	75.2	73.4	67.6	60.8	54.9	14.3
2000	529	545	70.8	83.6	79.6	75.9	74.2	68.5	63.6	56.4	12.8
2000	529	600	70.6	87.9	80.4	75.9	74.0	67.3	60.5	57.1	17.3
2000	529	615	70.7	81.9	78.6	76.0	74.2	68.8	62.9	57.3	11.2
2000	529	630	71.3	88.1	80.1	76.4	74.1	69.3	64.1	60.7	16.8
2000	529	645	72.0	85.1	82.5	77.0	74.9	69.5	64.3	61.2	13.1
2000	529	700	71.8	83.9	79.4	77.5	76.0	69.6	63.9	61.0	12.1
2000	529	715	73.1	94.7	81.9	78.0	76.5	69.7	65.2	59.9	21.6
2000	529	730	70.8	85.5	79.5	76.1	74.3	68.0	63.2	57.8	14.7
2000	529	745	71.3	82.0	80.0	76.5	74.9	69.1	62.5	60.1	10.7
2000	529	800	73.8	98.3	80.5	76.7	74.8	68.7	62.6	60.1	24.5
2000	529	815	71.1	84.7	80.6	76.2	74.8	68.3	62.1	59.3	13.6
2000	529	830	70.4	81.3	78.0	76.1	74.6	67.9	61.9	59.1	10.9
2000	529	845	72.7	95.7	81.1	76.7	74.6	68.6	62.9	57.0	23.0
2000	529	900	71.7	83.9	80.0	77.1	75.6	69.0	62.5	58.6	12.2
2000	529	915	71.9	84.4	79.6	76.8	75.6	70.0	64.5	61.1	12.5
2000	529	930	71.6	89.9	80.2	77.0	75.2	68.3	61.7	54.1	18.3
2000	529	945	73.0	96.4	81.7	77.2	75.4	68.2	61.0	56.2	23.4
2000	529	1000	71.9	91.6	80.6	77.0	74.9	69.0	62.9	56.9	19.7
2000	529	1015	70.5	84.2	78.6	75.5	74.3	68.5	63.6	55.9	13.7
2000	529	1030	71.5	84.7	81.2	77.0	75.2	68.7	60.8	55.9	13.2
2000	529	1045	70.3	82.7	78.7	75.3	73.7	68.4	63.7	56.7	12.4
2000	529	1100	71.0	89.1	81.0	75.9	74.4	67.9	61.1	55.6	18.1
2000	529	1115	71.3	87.5	80.5	76.5	74.8	68.6	61.4	55.5	16.2
2000	529	1130	70.5	87.4	79.1	75.4	73.8	67.9	62.2	56.4	16.9
2000	529	1145	70.4	84.3	78.9	75.5	74.0	68.1	62.6	57.1	13.9
2000	529	1200	70.2	84.9	79.1	76.0	74.3	67.1	59.2	53.0	14.7
2000	529	1215	70.8	84.6	79.9	76.4	74.7	67.6	61.4	56.1	13.8
2000	529	1230	70.1	83.4	78.8	75.7	74.0	67.4	60.9	55.5	13.3
2000	529	1245	70.1	84.5	79.7	75.3	73.2	67.5	60.3	54.5	14.4
2000	529	1300	70.7	84.4	80.1	76.3	74.3	68.0	62.3	55.4	13.7
2000	529	1315	70.4	83.3	78.9	76.0	74.1	67.7	61.5	56.7	12.9
2000	529	1330	71.2	90.6	78.5	76.7	75.2	68.7	63.1	55.7	19.4
2000	529	1345	70.0	82.3	77.8	75.4	73.7	67.7	62.6	57.2	12.3
2000	529	1400	70.7	92.8	79.1	75.5	73.7	68.4	63.7	59.8	22.1
2000	529	1415	72.2	87.7	82.9	77.4	75.4	68.6	63.6	58.6	15.5
2000	529	1430	71.1	86.0	79.8	75.7	74.4	68.9	63.6	59.2	14.9
2000	529	1445	69.2	82.0	76.7	74.1	72.8	67.6	60.7	53.3	12.8
2000	529	1500	70.9	92.7	79.9	76.4	74.5	67.8	61.6	56.7	21.8
2000	529	1515	69.8	81.5	77.5	74.7	73.3	68.0	62.6	59.1	11.7
2000	529	1530	71.4	91.6	78.5	75.9	74.3	68.7	64.3	61.7	20.2
2000	529	1545	70.9	84.9	79.0	75.8	74.4	69.0	64.2	59.9	14.0
2000	529	1600	69.3	82.0	77.0	74.1	72.5	67.5	63.3	60.3	12.7
2000	529	1615	71.9	91.7	84.0	75.8	73.5	67.8	62.3	55.7	19.8
2000	529	1630	69.2	79.9	76.2	74.4	73.0	67.4	62.8	57.8	10.7
2000	529	1645	69.3	85.8	78.1	75.0	73.0	66.6	61.9	55.9	16.5
2000	529	1700	69.3	87.2	80.3	73.8	71.4	65.8	62.1	58.5	17.9
2000	529	1715	68.6	79.2	76.9	73.5	71.7	67.0	61.8	54.6	10.6
2000	529	1730	68.5	84.5	76.0	73.5	71.6	66.5	62.3	57.5	16.0
2000	529	1745	67.6	82.1	74.7	72.2	70.9	66.3	61.4	57.0	14.5
2000	529	1800	69.6	83.7	79.1	74.2	72.2	67.8	62.5	57.8	14.1
2000	529	1815	67.3	80.0	74.6	72.0	70.6	65.8	59.7	56.2	12.7
2000	529	1830	68.4	89.0	75.4	71.8	70.7	66.4	60.5	55.4	20.6
2000	529	1845	69.7	83.3	79.9	74.8	72.3	67.2	61.0	54.2	13.6
2000	529	1900	67.9	84.5	76.3	71.6	70.3	66.0	60.1	54.1	16.6
2000	529	1915	68.3	82.8	78.4	73.8	71.0	65.8	59.6	55.8	14.5
2000	529	1930	68.0	82.1	77.4	73.6	71.4	65.7	59.1	54.0	14.1
2000	529	1945	67.7	86.3	78.1	71.9	69.8	64.9	58.3	53.1	18.6
2000	529	2000	67.5	83.1	77.1	73.0	70.6	64.5	57.8	50.7	15.6
2000	529	2015	68.8	88.9	79.1	73.5	70.7	64.3	56.2	51.5	20.1
2000	529	2030	65.1	79.0	73.7	70.0	68.4	63.2	55.4	50.1	13.9
2000	529	2045	65.3	78.7	75.2	70.9	69.1	61.8	54.0	48.8	13.4
2000	529	2100	65.7	83.7	74.6	69.9	68.7	63.2	54.8	50.6	18.0
2000	529	2115	67.9	89.5	77.5	74.0	71.4	63.4	55.8	51.5	21.6
2000	529	2130	67.4	86.4	78.5	72.8	68.9	63.5	57.0	52.7	19.0
2000	529	2145	66.8	88.4	77.2	71.4	69.2	62.7	54.6	50.3	21.6
2000	529	2200	66.8	80.7	76.2	73.4	70.4	63.3	55.5	50.4	13.9
2000	529	2215	67.9	89.9	78.8	73.4	71.0	63.2	55.7	50.6	22.0
2000	529	2230	64.9	77.7	74.8	70.7	68.2	61.8	53.3	47.3	12.8
2000	529	2245	65.5	79.3	75.8	71.1	69.2	61.7	55.4	50.1	13.8
2000	529	2300	66.0	84.3	76.1	71.1	69.0	61.8	54.0	48.9	18.3
2000	529	2315	63.7	77.9	73.7	68.8	67.5	59.7	52.3	45.6	14.2
2000	529	2330	63.2	79.8	74.3	69.1	66.9	57.9	50.6	44.1	16.6
2000	529	2345	62.4	76.5	72.7	69.3	66.5	57.0	50.5	44.6	14.1
2000	529	0	64.1	81.1	76.9	70.2	66.6	56.6	47.3	43.8	17.0

DAY 3	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**69.2**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**64.9**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**70.2**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**66.4**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**72.6**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**59.2**	dB(A)

31 Marley Crescent, Bonnyrigg Heights — DAY 4

Tuesday 30 May 2000 — RT&A S/N 80

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	529	2215	67.9	89.9	78.8	73.4	71.0	63.2	55.7	50.6	22.0
2000	529	2230	64.9	77.7	74.8	70.7	68.2	61.8	53.3	47.3	12.8
2000	529	2245	65.5	79.3	75.8	71.1	69.2	61.7	55.4	50.1	13.8
2000	529	2300	66.0	84.3	76.1	71.1	69.0	61.8	54.0	48.9	18.3
2000	529	2315	63.7	77.9	73.7	68.8	67.5	59.7	52.3	45.6	14.2
2000	529	2330	63.2	79.8	74.3	69.1	66.9	57.9	50.6	44.1	16.6
2000	529	2345	62.4	76.5	72.7	69.3	66.5	57.0	50.5	44.6	14.1
2000	529	0	64.1	81.1	76.9	70.2	66.6	56.6	47.3	43.8	17.0
2000	530	15	62.7	81.8	74.4	67.5	65.0	54.5	44.7	40.6	19.1
2000	530	30	62.8	83.9	74.2	68.8	66.0	54.1	45.5	39.3	21.1
2000	530	45	62.0	77.2	74.3	69.1	65.8	50.9	44.2	38.2	15.2
2000	530	100	60.4	81.2	71.6	66.1	62.4	51.4	45.3	38.9	20.8
2000	530	115	62.2	79.5	75.5	68.9	63.9	51.7	43.8	40.2	17.3
2000	530	130	58.8	74.7	72.1	65.3	61.5	49.7	44.2	39.9	15.9
2000	530	145	60.4	80.5	71.8	68.0	64.0	50.2	44.6	39.9	20.1
2000	530	200	60.0	77.9	71.2	68.0	65.0	51.6	42.3	37.6	17.9
2000	530	215	61.0	77.8	72.4	68.0	65.0	52.3	45.6	40.6	16.8
2000	530	230	60.0	77.9	72.5	67.8	64.0	51.8	45.6	40.8	17.9
2000	530	245	60.7	78.6	73.5	66.8	64.0	53.2	45.7	41.2	17.9
2000	530	300	60.7	85.3	73.0	66.4	62.7	50.6	43.9	39.4	24.6
2000	530	315	60.6	78.4	73.2	67.6	63.9	51.4	42.3	38.7	17.8
2000	530	330	60.4	79.0	73.5	72.3	69.0	54.8	45.3	41.9	18.6
2000	530	345	61.5	78.0	73.6	70.3	65.9	53.2	46.3	41.5	16.5
2000	530	400	61.4	82.3	73.6	67.7	64.1	51.0	45.1	40.8	20.9
2000	530	415	62.9	81.5	74.6	69.4	66.0	54.0	47.9	42.0	18.6
2000	530	430	67.2	82.1	77.3	74.1	71.5	62.0	54.0	47.2	14.9
2000	530	445	65.7	81.8	75.9	72.5	69.9	60.0	51.9	47.2	16.1
2000	530	500	67.1	88.3	76.2	72.2	69.8	61.0	51.1	45.2	21.2
2000	530	515	69.5	89.5	80.5	74.1	71.3	63.8	55.7	49.1	20.0
2000	530	530	68.0	84.1	76.8	73.4	71.4	65.5	58.0	52.7	16.1
2000	530	545	69.8	82.7	78.4	74.8	73.5	67.6	60.0	54.6	12.9
2000	530	600	69.4	85.5	77.9	74.5	73.0	66.9	61.2	55.3	16.1
2000	530	615	69.6	84.1	77.0	74.9	73.1	68.0	63.1	53.8	14.5
2000	530	630	71.8	89.3	80.4	77.0	75.1	69.0	62.6	59.0	17.5
2000	530	645	71.9	88.3	81.4	77.0	75.5	68.4	62.8	60.2	16.4
2000	530	700	71.2	82.0	79.1	76.5	75.1	68.7	63.2	60.0	10.8
2000	530	715	71.4	83.7	79.6	76.7	75.2	69.1	64.1	61.0	12.3
2000	530	730	74.0	93.4	85.0	79.2	76.3	70.1	64.6	61.1	19.4
2000	530	745	71.0	84.1	78.6	76.2	74.6	69.3	63.6	61.6	13.1
2000	530	800	70.7	87.6	77.8	75.5	74.3	68.7	62.1	59.7	16.9
2000	530	815	72.0	92.3	81.4	78.1	75.1	67.5	61.8	59.2	20.3
2000	530	830	70.6	84.0	79.7	76.4	74.6	67.8	62.6	58.3	13.4
2000	530	845	70.3	82.1	78.3	75.2	74.0	68.5	61.8	58.9	11.8
2000	530	900	72.2	83.5	80.3	77.5	75.9	69.9	64.5	59.3	11.3
2000	530	915	73.3	94.2	82.2	77.7	76.3	70.7	65.5	62.2	20.9
2000	530	930	72.4	89.8	81.8	77.2	75.3	69.6	63.8	59.5	17.4
2000	530	945	70.6	86.1	78.2	75.7	74.1	68.5	63.2	55.8	15.5
2000	530	1000	70.6	82.1	78.1	75.5	74.2	68.7	64.0	57.0	11.5
2000	530	1015	71.8	86.1	80.9	76.4	74.8	69.7	64.9	59.3	14.3
2000	530	1030	72.0	90.4	83.3	76.8	74.8	68.6	63.2	59.8	18.4
2000	530	1045	72.0	89.9	81.9	76.5	74.8	68.5	62.1	55.0	17.9
2000	530	1100	70.6	86.3	79.1	75.9	74.1	68.3	62.9	57.9	15.7
2000	530	1115	70.6	90.8	78.0	76.1	74.7	67.7	61.6	55.0	20.2
2000	530	1130	71.5	91.8	79.1	76.3	74.4	69.4	64.7	58.4	20.3
2000	530	1145	72.8	90.1	82.1	77.6	75.7	69.9	65.0	59.2	17.3
2000	530	1200	71.2	84.5	80.4	76.5	74.5	68.5	63.2	58.3	13.3
2000	530	1215	72.9	92.6	82.0	76.7	75.1	69.0	62.9	58.0	19.7
2000	530	1230	71.3	85.9	80.8	76.7	74.3	68.4	63.1	58.7	14.6
2000	530	1245	71.4	85.0	80.7	76.3	74.5	69.3	64.1	59.8	13.6
2000	530	1300	70.5	86.6	78.5	75.7	74.0	68.1	62.7	56.6	16.1
2000	530	1315	70.9	82.0	78.7	76.1	74.7	68.9	62.4	57.5	11.1
2000	530	1330	71.7	85.5	81.0	76.8	75.2	69.3	62.4	56.2	13.8
2000	530	1345	69.6	80.6	77.7	74.9	73.1	67.8	62.6	56.3	11.0
2000	530	1400	70.7	83.8	79.3	75.7	73.8	68.5	63.4	58.4	13.1
2000	530	1415	70.1	81.3	78.2	75.2	73.9	68.0	63.0	56.8	11.2
2000	530	1430	72.2	90.4	80.5	76.6	74.9	69.7	63.8	57.6	18.2
2000	530	1445	71.4	83.9	80.1	76.4	74.6	69.5	64.8	59.1	12.5
2000	530	1500	71.3	86.6	78.4	75.8	74.6	69.0	64.5	59.7	15.3
2000	530	1515	72.0	95.2	80.1	75.5	73.6	68.5	64.8	59.2	23.2
2000	530	1530	70.0	84.2	78.8	74.9	73.0	67.7	64.1	59.8	14.2
2000	530	1545	70.8	86.3	79.5	75.7	74.0	68.2	63.6	58.3	15.5
2000	530	1600	70.0	84.8	79.0	75.2	73.0	67.9	63.2	57.2	14.8
2000	530	1615	69.7	87.6	77.7	74.4	72.4	67.4	62.7	58.3	17.9
2000	530	1630	70.7	86.7	80.9	75.7	73.8	67.8	62.4	57.9	16.0
2000	530	1645	70.8	88.6	81.9	75.2	73.1	67.2	63.0	58.4	17.8
2000	530	1700	68.7	80.5	77.2	73.4	71.2	67.1	63.3	59.1	11.8
2000	530	1715	68.5	80.5	76.4	73.1	71.8	66.7	61.6	57.0	12.0
2000	530	1730	69.0	84.1	76.7	73.5	72.2	67.3	63.1	57.0	15.1
2000	530	1745	70.2	88.4	80.2	74.7	72.8	66.9	62.7	58.9	18.2
2000	530	1800	68.9	83.3	77.5	74.3	72.4	66.4	61.7	56.1	14.4
2000	530	1815	69.8	84.5	78.6	75.3	73.4	67.4	62.2	57.0	14.7
2000	530	1830	68.2	82.1	76.2	72.7	71.1	67.0	61.4	55.7	13.9
2000	530	1845	68.6	80.5	77.6	73.5	71.6	66.9	60.2	56.3	11.9
2000	530	1900	70.7	89.5	82.2	74.7	72.5	67.0	60.7	55.3	18.8
2000	530	1915	69.0	86.2	77.5	74.1	72.5	66.7	60.0	54.3	17.2
2000	530	1930	67.7	82.8	76.1	72.9	71.2	65.8	59.1	54.2	15.1
2000	530	1945	66.8	81.1	76.8	71.8	70.1	64.7	57.8	53.4	14.3
2000	530	2000	69.0	88.7	80.7	74.9	70.9	64.6	57.5	53.5	19.7
2000	530	2015	66.7	77.3	73.7	70.9	69.8	65.8	59.5	52.8	10.6
2000	530	2030	68.8	87.8	78.4	74.1	71.7	65.3	57.5	51.6	19.0
2000	530	2045	66.9	79.9	75.8	71.9	70.2	65.1	57.9	51.9	13.0
2000	530	2100	68.8	85.5	79.2	73.7	71.5	66.1	58.7	51.7	16.7
2000	530	2115	67.4	85.8	76.3	72.3	70.4	65.2	58.6	52.8	18.4
2000	530	2130	66.2	78.3	74.2	70.4	69.2	65.0	58.7	53.3	12.1
2000	530	2145	67.7	86.4	78.0	72.1	70.3	64.5	57.0	52.3	18.7
2000	530	2200	65.9	86.0	75.6	71.1	68.7	62.3	54.7	49.4	20.1
2000	530	2215	67.9	85.8	79.0	73.8	71.6	62.7	54.8	50.7	17.9
2000	530	2230	65.9	81.1	75.7	71.1	68.7	63.6	56.6	49.2	15.2
2000	530	2245	68.1	85.0	78.0	74.8	72.4	63.8	55.8	50.6	16.9
2000	530	2300	65.3	83.2	75.0	70.8	68.8	61.6	52.5	47.0	17.9
2000	530	2315	65.3	81.6	75.7	71.0	68.3	61.5	51.9	44.4	16.3
2000	530	2330	64.8	79.5	74.8	70.3	68.3	61.4	53.6	46.0	14.7
2000	530	2345	65.6	81.4	77.4	71.8	68.9	60.1	51.9	47.5	15.8
2000	530	0	63.5	82.7	75.8	69.0	65.8	55.4	48.3	44.4	19.2

DAY 4	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**69.4**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**64.6**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**70.6**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**66.2**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**72.9**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**61.6**	dB(A)

31 Marley Crescent, Bonnyrigg Heights											DAY 5
Wednesday 31 May 2000									RT&A S/N 80		
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	530	2215	67.9	85.8	79.0	73.8	71.6	62.7	54.8	50.7	17.9
2000	530	2230	65.9	81.1	75.7	71.1	68.7	63.6	56.6	49.2	15.2
2000	530	2245	68.1	85.0	78.0	74.8	72.4	63.8	55.8	50.6	16.9
2000	530	2300	65.3	83.2	75.0	70.8	68.8	61.6	52.5	47.0	17.9
2000	530	2315	65.3	81.6	75.7	71.0	68.3	61.5	51.9	44.4	16.3
2000	530	2330	64.8	79.5	74.8	70.3	68.3	61.4	53.6	46.0	14.7
2000	530	2345	65.6	81.4	77.4	71.8	68.9	60.1	51.9	47.5	15.8
2000	530	0	63.5	82.7	75.8	69.0	65.8	55.4	48.3	44.4	19.2
2000	531	15	60.0	74.6	70.7	66.5	64.4	53.1	46.7	42.2	14.6
2000	531	30	62.1	78.2	73.7	68.4	66.1	54.4	48.4	44.6	16.1
2000	531	45	60.0	76.7	73.2	65.1	63.0	52.3	44.8	39.9	16.7
2000	531	100	65.3	85.4	79.1	71.1	66.1	54.1	45.5	39.4	20.1
2000	531	115	64.7	88.6	76.7	68.9	64.8	53.1	45.2	39.7	23.9
2000	531	130	61.6	76.0	73.5	69.5	65.4	52.3	44.1	38.9	14.4
2000	531	145	63.5	81.0	76.8	69.7	65.9	51.5	42.2	34.6	17.5
2000	531	200	58.9	79.7	70.1	65.2	61.9	49.8	41.9	37.0	20.8
2000	531	215	58.8	77.9	70.9	65.6	62.5	47.8	40.7	37.2	19.1
2000	531	230	64.1	80.3	75.1	71.8	68.6	53.5	45.4	40.0	16.2
2000	531	245	62.2	83.1	74.8	68.8	64.3	50.6	43.1	38.6	20.9
2000	531	300	63.7	81.5	75.4	70.9	68.0	53.8	47.7	42.9	17.8
2000	531	315	66.3	85.6	78.5	73.7	69.2	55.9	49.5	42.4	19.3
2000	531	330	61.8	81.9	72.9	68.7	65.0	52.0	44.7	40.9	20.1
2000	531	345	68.2	88.8	79.8	75.2	71.3	58.0	50.2	43.5	20.6
2000	531	400	59.7	77.8	71.1	67.0	62.8	48.4	43.2	39.6	18.1
2000	531	415	60.2	76.0	71.7	66.5	63.8	53.6	47.6	43.2	15.8
2000	531	430	65.1	79.6	74.9	71.5	69.1	59.8	51.5	45.0	14.5
2000	531	445	67.1	79.9	76.7	73.6	71.8	62.7	53.5	48.1	12.8
2000	531	500	66.4	80.3	76.8	72.6	70.3	62.1	53.9	47.6	13.9
2000	531	515	69.0	88.1	80.2	73.5	71.5	64.3	55.2	48.6	19.1
2000	531	530	69.9	84.8	78.8	74.9	73.2	67.7	60.1	50.5	14.9
2000	531	545	69.6	83.5	77.8	74.1	72.6	68.1	61.5	54.9	13.9
2000	531	600	69.7	87.6	77.3	74.5	72.8	67.7	61.2	57.5	17.9
2000	531	615	71.2	86.8	79.7	76.9	74.9	68.3	63.8	59.4	15.6
2000	531	630	72.0	87.0	80.3	77.4	75.7	69.4	63.9	60.3	15.0
2000	531	645	72.8	87.5	83.6	77.8	75.5	70.1	64.7	61.6	14.7
2000	531	700	73.2	83.3	80.6	78.5	77.0	71.3	65.0	62.2	10.1
2000	531	715	72.8	86.6	82.1	78.4	76.7	69.5	64.1	58.8	13.8
2000	531	730	71.7	84.9	79.9	77.6	75.8	68.4	62.7	60.4	13.2
2000	531	745	71.8	87.0	79.6	77.0	75.3	69.6	63.4	59.6	15.2
2000	531	800	70.2	84.4	78.1	75.7	74.1	67.6	61.8	59.2	14.2
2000	531	815	70.8	84.2	79.7	75.9	74.3	69.0	63.5	59.6	13.4
2000	531	830	71.1	81.0	78.3	76.2	74.7	69.4	63.3	59.0	9.9
2000	531	845	71.2	88.3	80.5	76.3	74.3	68.6	62.4	59.8	17.1
2000	531	900	72.1	88.7	80.6	77.3	75.6	68.8	63.0	56.7	16.6
2000	531	915	71.2	85.1	80.9	76.6	74.7	68.7	62.6	53.3	13.9
2000	531	930	70.8	84.4	79.9	76.0	73.8	68.7	63.1	57.0	13.6
2000	531	945	71.8	85.6	81.7	77.7	75.2	68.1	63.0	57.1	13.8
2000	531	1000	72.9	96.1	81.4	75.2	73.3	67.7	62.4	56.5	23.2
2000	531	1015	71.1	87.8	80.0	75.9	74.2	68.9	62.1	55.2	16.7
2000	531	1030	69.7	81.8	78.0	75.2	73.1	67.8	60.8	55.4	12.1
2000	531	1045	71.9	91.3	81.1	76.6	74.8	68.8	61.7	55.4	19.4
2000	531	1100	70.6	83.9	78.5	75.6	74.3	68.6	62.5	58.1	13.3
2000	531	1115	71.2	89.6	79.2	76.4	74.7	68.5	62.5	55.5	18.4
2000	531	1130	71.8	85.8	81.7	77.0	75.2	68.9	62.3	57.6	14.0
2000	531	1145	71.2	82.8	79.4	76.3	74.9	69.0	63.9	56.7	11.6
2000	531	1200	71.0	89.4	80.1	75.9	73.9	68.1	62.5	57.1	18.4
2000	531	1215	69.8	80.4	77.7	75.1	73.8	67.8	61.0	54.3	10.6
2000	531	1230	70.3	87.0	78.5	75.3	73.4	67.7	61.9	53.3	16.7
2000	531	1245	71.0	89.2	79.3	76.3	74.5	67.6	61.4	55.3	18.2
2000	531	1300	70.2	91.5	79.5	75.0	72.8	67.3	59.7	53.2	21.3
2000	531	1315	71.2	88.9	82.3	76.3	74.2	67.7	61.1	53.6	17.7
2000	531	1330	69.9	88.0	79.6	75.3	73.3	66.6	60.3	53.2	18.1
2000	531	1345	70.4	87.2	80.2	75.1	73.4	67.6	62.3	56.1	16.8
2000	531	1400	69.8	87.3	79.4	74.5	72.7	67.2	61.6	54.9	17.5
2000	531	1415	69.7	82.0	77.5	75.1	73.3	67.8	62.3	56.2	12.3
2000	531	1430	69.9	89.2	78.1	74.7	73.1	67.7	61.7	57.2	19.3
2000	531	1445	68.7	83.2	76.1	72.9	71.7	67.4	63.1	57.8	14.5
2000	531	1500	71.1	93.2	80.2	76.0	74.2	67.2	62.0	56.2	22.1
2000	531	1515	69.3	83.6	78.5	74.3	72.4	66.8	62.4	57.1	14.3
2000	531	1530	68.6	80.8	76.5	73.5	72.2	66.9	62.0	57.1	12.2
2000	531	1545	70.6	88.3	80.4	74.8	73.5	67.6	62.4	56.4	17.7
2000	531	1600	69.3	85.0	77.9	73.8	72.0	67.4	63.2	58.4	15.7
2000	531	1615	68.0	88.7	76.5	72.5	70.1	65.7	61.0	57.4	20.7
2000	531	1630	67.8	80.5	74.9	72.1	70.9	66.6	60.9	56.6	12.7
2000	531	1645	69.7	85.0	78.7	75.1	73.0	67.3	61.7	57.3	15.3
2000	531	1700	70.1	92.1	80.4	74.7	71.7	66.8	62.0	57.8	22.0
2000	531	1715	70.1	92.0	78.7	75.6	73.1	67.1	62.7	57.8	21.9
2000	531	1730	69.0	89.8	76.9	73.3	71.9	67.1	62.8	57.0	20.8
2000	531	1745	67.4	81.4	75.0	71.9	70.4	65.8	60.4	55.6	14.0
2000	531	1800	69.1	82.6	77.6	74.2	72.6	66.9	62.3	56.3	13.5
2000	531	1815	68.1	78.5	75.4	72.6	71.3	66.7	61.8	56.1	10.4
2000	531	1830	69.2	83.9	77.8	74.6	72.6	67.2	62.2	57.6	14.7
2000	531	1845	69.0	89.0	78.5	73.0	70.6	66.7	60.4	55.6	20.0
2000	531	1900	70.2	90.7	79.3	72.8	70.9	66.5	60.0	54.6	20.5
2000	531	1915	68.2	85.0	77.9	72.6	70.7	66.0	60.6	55.2	16.8
2000	531	1930	68.3	81.5	78.3	73.8	71.3	66.1	59.7	54.2	13.2
2000	531	1945	69.6	87.1	80.1	74.5	72.4	66.8	60.2	55.0	17.5
2000	531	2000	68.3	86.6	77.8	72.8	70.7	65.6	58.4	53.3	18.3
2000	531	2015	68.5	88.1	79.0	72.7	70.7	65.8	60.3	52.8	19.6
2000	531	2030	67.7	87.0	77.4	72.0	70.4	64.7	57.3	52.3	19.3
2000	531	2045	67.7	83.2	77.7	72.7	70.4	65.0	59.6	53.5	15.5
2000	531	2100	67.1	85.7	75.8	70.8	69.2	64.5	57.0	51.1	18.6
2000	531	2115	68.0	86.2	79.3	73.1	70.3	64.0	59.0	53.8	18.2
2000	531	2130	67.3	86.7	77.2	72.0	69.8	64.2	56.3	49.8	19.4
2000	531	2145	66.1	78.5	75.1	71.6	69.5	63.9	57.0	50.2	12.4
2000	531	2200	65.9	77.6	74.8	70.8	69.4	63.7	56.6	52.0	11.7
2000	531	2215	66.3	79.4	75.5	71.5	69.4	64.1	57.5	52.1	13.1
2000	531	2230	64.7	79.0	74.1	69.4	68.1	62.3	55.2	46.4	14.3
2000	531	2245	66.8	85.4	76.2	72.7	70.2	64.1	56.2	48.8	18.6
2000	531	2300	65.4	78.2	75.8	71.2	68.6	62.0	55.0	49.7	12.8
2000	531	2315	65.3	81.0	74.9	70.3	68.5	62.0	55.8	47.2	15.7
2000	531	2330	65.4	84.4	75.2	71.1	68.2	61.4	53.6	47.4	19.0
2000	531	2345	65.0	78.4	75.8	70.8	68.6	60.3	52.1	45.8	13.4
2000	531	0	64.3	79.0	75.4	71.1	67.8	58.6	50.6	42.9	14.7

DAY 5	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**69.2**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**65.5**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**70.1**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**67.1**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**72.5**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**59.7**	dB(A)

31 Marley Crescent, Bonnyrigg Heights											DAY 6
Thursday 1 June 2000											RT&A S/N 80
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	531	2215	66.3	79.4	75.5	71.5	69.4	64.1	57.5	52.1	13.1
2000	531	2230	64.7	79.0	74.1	69.4	68.1	62.3	55.2	46.4	14.3
2000	531	2245	66.8	85.4	76.2	72.7	70.2	64.1	56.2	48.8	18.6
2000	531	2300	65.4	78.2	75.8	71.2	68.6	62.0	55.0	49.7	12.8
2000	531	2315	65.3	81.0	74.9	70.3	68.5	62.0	55.8	47.2	15.7
2000	531	2330	65.4	84.4	75.2	71.1	68.2	61.4	53.6	47.4	19.0
2000	531	2345	65.0	78.4	75.8	70.8	68.6	60.3	52.1	45.8	13.4
2000	531	0	64.3	79.0	75.4	71.1	67.8	58.6	50.6	42.9	14.7
2000	601	15	60.7	74.9	71.1	67.0	64.7	55.6	46.8	41.2	14.2
2000	601	30	62.6	78.9	73.8	69.3	66.3	55.8	47.8	42.6	16.3
2000	601	45	60.6	77.4	72.9	65.8	63.8	54.6	46.2	38.5	16.8
2000	601	100	63.6	81.3	76.3	69.7	66.0	55.7	48.1	41.1	17.7
2000	601	115	62.0	80.7	74.7	67.0	64.3	52.3	44.2	38.8	18.7
2000	601	130	62.5	82.3	75.6	68.3	64.1	53.5	46.0	38.7	19.8
2000	601	145	64.1	82.6	76.5	71.3	65.8	52.0	43.2	38.1	18.5
2000	601	200	62.9	79.2	75.4	69.7	65.8	53.9	43.6	36.0	16.3
2000	601	215	61.9	79.1	74.8	68.3	64.9	51.5	39.1	35.0	17.2
2000	601	230	63.6	85.6	74.5	68.5	65.2	52.2	43.2	34.4	22.0
2000	601	245	64.7	83.2	76.3	72.2	68.2	55.2	48.7	41.2	18.5
2000	601	300	63.7	78.1	74.3	71.6	68.6	55.0	43.1	36.9	14.4
2000	601	315	61.8	81.7	72.8	68.9	65.3	53.0	42.9	36.1	19.9
2000	601	330	66.7	85.7	78.7	73.2	70.5	58.1	51.2	42.1	19.0
2000	601	345	63.4	79.8	75.4	70.7	67.3	55.1	48.0	43.7	16.4
2000	601	400	61.4	76.0	73.9	68.8	65.1	51.4	45.5	42.0	14.6
2000	601	415	63.0	80.9	74.7	70.1	66.7	54.0	46.2	42.3	17.9
2000	601	430	68.6	88.3	78.6	73.9	70.7	61.7	54.4	48.7	19.7
2000	601	445	68.2	84.9	79.2	74.6	72.3	62.1	55.5	49.8	16.7
2000	601	500	67.5	83.8	79.3	73.3	70.8	62.0	54.7	48.6	16.3
2000	601	515	68.0	82.9	77.4	74.4	72.1	64.1	56.8	49.1	14.9
2000	601	530	73.2	98.2	82.3	74.8	72.9	67.3	60.8	54.7	25.0
2000	601	545	70.2	85.4	77.4	75.0	73.2	68.6	63.6	58.2	15.2
2000	601	600	70.9	82.8	78.8	75.8	74.4	69.0	62.8	58.3	11.9
2000	601	615	70.9	86.5	78.5	75.7	74.2	69.0	64.7	58.5	15.6
2000	601	630	71.4	86.7	80.1	76.2	74.5	69.4	64.3	61.2	15.3
2000	601	645	72.6	85.6	81.3	77.5	76.1	70.4	64.8	62.2	13.0
2000	601	700	71.7	87.2	80.3	76.6	75.2	68.8	64.0	59.4	15.5
2000	601	715	71.2	85.1	79.5	76.4	75.1	68.8	63.8	60.3	13.9
2000	601	730	72.0	83.0	79.9	77.5	76.0	69.6	63.8	61.0	11.0
2000	601	745	70.6	82.6	79.1	76.3	74.3	67.8	62.3	60.6	12.0
2000	601	800	71.1	83.9	80.0	76.6	74.9	68.0	63.1	60.7	12.8
2000	601	815	72.5	89.1	82.2	77.7	75.9	69.1	62.8	59.3	16.6
2000	601	830	71.0	82.1	79.2	76.4	74.9	68.3	63.5	60.7	11.1
2000	601	845	71.2	90.9	80.6	75.9	74.2	67.9	62.2	59.5	19.7
2000	601	900	71.9	84.1	81.1	77.5	75.4	68.9	62.6	59.6	12.2
2000	601	915	72.8	88.6	81.8	78.4	76.3	69.7	64.5	60.2	15.8
2000	601	930	70.8	82.0	79.3	75.9	74.2	68.7	63.2	56.7	11.2
2000	601	945	71.2	89.2	79.9	76.2	74.4	68.5	61.0	53.4	18.0
2000	601	1000	70.8	93.9	79.1	75.2	73.7	68.4	62.3	56.8	23.1
2000	601	1015	70.0	85.6	79.7	75.4	73.6	66.8	61.3	53.6	15.6
2000	601	1030	70.8	82.1	79.4	76.1	74.2	68.6	61.0	55.2	11.3
2000	601	1045	70.2	82.3	77.9	75.6	74.1	67.7	61.7	55.7	12.1
2000	601	1100	71.5	91.1	82.1	77.1	74.0	67.7	61.9	56.3	19.6
2000	601	1115	70.2	84.4	79.3	75.7	73.6	67.8	60.3	53.7	14.2
2000	601	1130	71.1	88.5	81.4	76.1	73.8	68.1	61.5	54.6	17.4
2000	601	1145	71.2	88.2	80.4	76.3	74.1	68.3	61.1	51.9	17.0
2000	601	1200	69.2	81.3	78.2	75.1	73.2	66.2	57.4	51.0	12.1
2000	601	1215	70.2	86.1	78.3	75.7	74.2	67.7	61.8	53.6	15.9
2000	601	1230	70.0	82.6	79.0	76.2	74.0	66.9	60.3	54.5	12.6
2000	601	1245	73.3	94.4	84.4	77.0	75.0	67.9	61.3	56.4	21.1
2000	601	1300	69.5	83.5	77.7	75.1	73.5	66.6	61.4	52.5	14.0
2000	601	1315	70.4	89.3	80.2	75.9	73.3	67.2	59.9	53.9	18.9
2000	601	1330	69.4	81.7	78.6	74.8	73.1	66.6	60.7	54.0	12.3
2000	601	1345	69.9	88.8	79.5	74.8	72.8	66.6	58.6	53.0	18.9
2000	601	1400	70.5	88.7	79.4	76.0	73.9	67.2	58.4	52.1	18.2
2000	601	1415	70.0	88.4	78.3	74.2	72.6	67.0	61.6	55.6	18.4
2000	601	1430	72.1	92.6	82.5	77.2	74.4	67.7	62.1	54.4	20.5
2000	601	1445	71.0	91.4	80.3	74.9	73.2	68.1	61.9	56.0	20.4
2000	601	1500	70.3	85.1	80.7	76.1	73.4	67.1	61.2	52.5	14.8
2000	601	1515	70.4	95.0	78.4	74.7	72.9	67.6	62.2	54.1	24.6
2000	601	1530	67.3	77.2	74.6	72.2	71.1	65.6	60.9	56.6	9.9
2000	601	1545	69.1	84.3	77.7	74.4	72.7	66.2	60.8	58.0	15.2
2000	601	1600	69.3	82.5	78.7	74.8	72.8	66.5	61.1	57.3	13.2
2000	601	1615	69.4	88.3	78.1	74.5	72.4	66.8	62.0	56.1	18.9
2000	601	1630	68.6	85.1	77.3	72.8	71.1	66.7	62.3	56.4	16.5
2000	601	1645	68.1	79.0	76.3	73.4	71.7	65.8	60.7	55.9	10.9
2000	601	1700	67.2	77.8	74.7	72.0	70.5	65.9	61.0	54.8	10.6
2000	601	1715	67.7	81.9	77.6	72.4	70.4	65.5	60.5	54.9	14.2
2000	601	1730	67.6	77.7	74.9	72.0	70.7	66.4	61.7	55.7	10.1
2000	601	1745	68.1	81.4	77.7	73.0	71.1	66.0	62.0	55.2	13.3
2000	601	1800	70.6	91.1	81.0	74.8	72.5	66.9	62.1	56.0	20.5
2000	601	1815	68.7	85.1	77.0	73.9	72.1	66.9	60.3	55.2	16.4
2000	601	1830	68.9	85.1	76.4	73.7	72.2	67.1	60.1	54.4	16.2
2000	601	1845	68.5	82.0	75.9	72.9	71.3	67.5	62.2	57.6	13.5
2000	601	1900	69.0	82.4	77.8	73.5	71.7	67.4	61.6	56.1	13.4
2000	601	1915	67.3	82.4	77.0	72.0	70.2	65.4	57.1	52.5	15.1
2000	601	1930	68.7	89.5	77.0	72.9	70.9	66.5	59.5	53.9	20.8
2000	601	1945	67.9	83.1	76.5	73.0	71.3	65.8	59.1	53.1	15.2
2000	601	2000	68.9	86.8	78.7	73.6	71.9	65.7	58.8	52.6	17.9
2000	601	2015	67.0	81.0	76.2	72.3	70.0	65.0	56.8	49.4	14.0
2000	601	2030	66.4	79.9	75.9	71.8	69.7	63.7	57.2	51.8	13.5
2000	601	2045	67.8	85.2	77.0	72.4	70.1	65.1	58.4	53.5	17.4
2000	601	2100	67.1	79.7	75.8	72.4	70.3	65.3	59.2	49.7	12.6
2000	601	2115	68.7	91.9	76.5	72.6	70.3	65.9	58.7	54.0	23.2
2000	601	2130	66.4	81.6	74.0	71.2	69.5	64.8	58.1	52.1	15.2
2000	601	2145	66.9	80.3	75.8	72.2	69.9	65.0	59.8	53.9	13.4
2000	601	2200	66.3	80.9	76.7	71.2	69.4	63.6	57.5	53.0	14.6
2000	601	2215	66.8	84.8	77.3	71.9	69.7	63.6	55.4	49.3	18.0
2000	601	2230	66.8	83.3	75.3	72.6	70.5	64.4	56.8	50.8	16.5
2000	601	2245	67.3	87.4	76.5	72.7	70.3	63.4	56.5	50.0	20.1
2000	601	2300	66.7	83.8	76.2	72.3	69.8	63.4	55.8	49.6	17.1
2000	601	2315	65.7	78.7	75.5	71.5	68.8	63.0	54.4	48.7	13.0
2000	601	2330	64.3	81.6	74.0	70.3	67.7	61.4	52.0	48.8	17.3
2000	601	2345	64.6	77.8	75.7	70.9	67.8	60.6	52.2	46.0	13.2
2000	601	0	62.8	78.8	72.9	69.0	66.1	57.1	50.3	45.3	16.0

DAY 6	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**69.1**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**66.0**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**69.9**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**67.3**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**72.4**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**57.4**	dB(A)

31 Marley Crescent, Bonnyrigg Heights — DAY 7

Friday 2 June 2000 — RT&A S/N 80

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	601	2215	66.8	84.8	77.3	71.9	69.7	63.6	55.4	49.3	18.0
2000	601	2230	66.8	83.3	75.3	72.6	70.5	64.4	56.8	50.8	16.5
2000	601	2245	67.3	87.4	76.5	72.7	70.3	63.4	56.5	50.0	20.1
2000	601	2300	66.7	83.8	76.2	72.3	69.8	63.4	55.8	49.6	17.1
2000	601	2315	65.7	78.7	75.5	71.5	68.8	63.0	54.4	48.7	13.0
2000	601	2330	64.3	81.6	74.0	70.3	67.7	61.4	52.0	48.8	17.3
2000	601	2345	64.6	77.8	75.7	70.9	67.8	60.6	52.2	46.0	13.2
2000	601	0	62.8	78.8	72.9	69.0	66.1	57.1	50.3	45.3	16.0
2000	602	15	64.5	79.7	75.8	70.5	67.5	59.0	51.6	46.1	15.2
2000	602	30	61.1	75.7	72.1	67.3	65.1	55.7	47.9	42.6	14.6
2000	602	45	62.2	78.9	73.8	67.8	65.5	55.8	48.0	41.7	16.7
2000	602	100	60.9	83.2	70.4	65.0	62.3	51.8	44.7	37.8	22.3
2000	602	115	63.3	83.0	74.6	68.8	66.3	53.7	45.7	40.1	19.7
2000	602	130	62.7	79.3	74.6	69.7	65.9	54.3	46.5	39.6	16.6
2000	602	145	62.9	82.1	75.2	69.5	65.3	53.1	46.0	42.3	19.2
2000	602	200	64.6	88.2	75.6	69.2	65.1	52.2	44.6	41.2	23.6
2000	602	215	61.0	78.0	73.1	67.4	64.7	52.8	47.3	41.2	17.0
2000	602	230	65.8	86.5	77.0	72.6	68.4	54.8	47.4	42.2	20.7
2000	602	245	60.8	79.1	75.0	66.1	61.7	50.3	45.7	43.1	18.3
2000	602	300	67.4	87.7	81.2	73.2	69.1	53.5	47.1	42.0	20.3
2000	602	315	62.8	79.2	73.9	70.0	66.6	53.5	44.3	40.3	16.4
2000	602	330	66.0	84.5	79.1	71.8	68.4	56.6	47.8	41.3	18.5
2000	602	345	61.9	76.4	72.4	68.6	66.2	55.3	47.2	43.2	14.5
2000	602	400	64.9	82.5	76.8	71.6	68.3	57.4	49.3	43.0	17.6
2000	602	415	65.1	80.7	75.8	72.0	69.6	58.1	49.0	44.4	15.6
2000	602	430	65.8	80.1	75.0	72.9	70.6	60.1	50.7	40.9	14.3
2000	602	445	67.6	84.5	78.7	73.0	70.8	61.6	53.8	48.2	16.9
2000	602	500	66.4	82.0	76.2	72.4	70.9	61.2	52.9	47.1	15.6
2000	602	515	68.3	81.8	77.3	74.1	72.1	64.7	57.5	50.9	13.5
2000	602	530	69.1	83.8	77.6	74.4	72.5	67.0	60.9	56.2	14.7
2000	602	545	69.8	84.1	78.7	74.9	72.9	67.9	62.0	56.2	14.3
2000	602	600	69.8	82.6	77.7	75.1	73.1	67.8	62.9	55.8	12.8
2000	602	615	70.7	81.1	78.7	75.7	74.2	68.7	64.2	59.6	10.4
2000	602	630	70.6	85.6	76.9	75.0	73.9	69.2	63.9	60.8	15.0
2000	602	645	71.5	82.6	79.7	76.9	75.3	69.4	63.2	60.2	11.1
2000	602	700	72.1	87.6	79.7	77.0	75.8	69.4	64.3	62.3	15.5
2000	602	715	72.4	86.6	80.7	77.9	76.3	69.6	63.0	60.1	14.2
2000	602	730	71.4	85.9	79.7	76.1	74.6	69.5	64.5	59.7	14.5
2000	602	745	70.9	82.6	79.6	76.3	74.7	68.4	62.1	59.6	11.7
2000	602	800	70.4	82.7	79.2	75.6	74.3	67.8	63.5	58.9	12.3
2000	602	815	72.7	92.5	82.0	78.2	76.2	69.4	63.4	60.2	19.8
2000	602	830	71.6	84.1	80.0	77.0	75.5	69.1	64.2	60.5	12.5
2000	602	845	70.5	84.3	79.5	75.7	73.7	68.5	62.6	59.7	13.8
2000	602	900	71.3	88.5	78.9	76.5	74.9	69.1	63.0	60.6	17.2
2000	602	915	69.6	81.7	78.9	74.9	73.2	67.4	59.8	52.6	12.1
2000	602	930	70.8	85.2	79.1	75.8	74.0	68.4	63.5	58.1	14.4
2000	602	945	71.1	84.1	79.5	76.3	74.6	68.7	62.8	57.6	13.0
2000	602	1000	70.0	80.5	78.4	74.7	73.1	68.5	63.3	54.7	10.5
2000	602	1015	71.4	89.5	80.4	76.6	74.6	69.0	63.5	57.0	18.1
2000	602	1030	71.1	86.2	80.3	76.4	74.1	68.6	63.5	57.7	15.1
2000	602	1045	72.2	92.2	81.9	77.4	75.3	69.1	63.2	57.2	20.0
2000	602	1100	69.6	83.9	77.9	74.4	72.7	67.7	60.5	55.0	14.3
2000	602	1115	70.9	87.9	79.0	75.9	74.1	68.6	62.1	57.0	17.0
2000	602	1130	70.8	84.8	80.1	76.1	74.2	67.9	62.4	55.8	14.0
2000	602	1145	70.4	82.8	79.1	76.0	74.3	68.0	61.6	56.2	12.4
2000	602	1200	71.5	88.9	80.6	76.9	74.9	68.7	62.0	55.4	17.4
2000	602	1215	70.7	88.3	79.3	75.3	73.9	68.2	62.1	56.1	17.6
2000	602	1230	70.2	85.2	78.5	75.0	73.4	68.4	63.0	55.4	15.0
2000	602	1245	70.4	85.0	79.9	76.0	73.6	67.7	61.3	55.0	14.6
2000	602	1300	70.1	83.3	79.1	75.1	73.7	67.9	60.7	54.7	13.2
2000	602	1315	69.5	80.4	77.8	74.6	72.9	67.6	62.0	54.1	10.9
2000	602	1330	70.6	87.1	80.0	76.0	73.6	67.8	60.6	53.2	16.5
2000	602	1345	70.5	85.1	79.6	75.6	73.7	68.6	61.6	53.3	14.6
2000	602	1400	69.9	86.0	78.1	74.7	73.1	68.0	61.2	54.9	16.1
2000	602	1415	70.8	86.7	79.8	76.0	73.9	68.7	61.6	53.5	15.9
2000	602	1430	70.6	85.3	80.4	75.1	73.6	68.5	60.7	55.2	14.7
2000	602	1445	70.9	85.9	80.1	76.2	73.9	68.6	63.7	55.5	15.0
2000	602	1500	70.5	86.8	79.1	75.5	74.0	68.4	64.3	58.1	16.3
2000	602	1515	70.0	83.9	77.3	74.2	73.0	68.7	64.3	57.3	13.9
2000	602	1530	69.3	93.7	78.4	72.5	70.6	65.7	62.3	57.2	24.4
2000	602	1545	69.7	85.1	78.8	74.7	72.7	67.4	62.4	56.6	15.4
2000	602	1600	69.9	90.7	78.2	75.2	73.1	67.3	62.5	56.9	20.8
2000	602	1615	68.2	81.8	76.3	73.3	71.4	66.4	60.9	55.9	13.6
2000	602	1630	68.7	85.8	76.2	73.0	71.4	66.7	61.8	57.0	17.1
2000	602	1645	68.8	83.4	76.8	73.1	71.7	67.4	61.8	56.5	14.6
2000	602	1700	68.9	84.9	76.3	73.2	71.6	67.4	63.1	55.1	16.0
2000	602	1715	68.8	81.7	76.4	73.7	72.0	67.1	63.3	57.0	12.9
2000	602	1730	68.2	81.4	77.5	73.3	70.8	66.4	60.7	51.4	13.2
2000	602	1745	68.1	83.0	77.5	72.8	71.0	66.0	60.9	54.1	14.9
2000	602	1800	68.2	82.8	77.4	73.1	71.1	66.1	61.7	57.2	14.6
2000	602	1815	68.6	80.9	77.3	73.1	71.6	67.3	61.3	54.9	12.3
2000	602	1830	70.1	92.6	78.3	72.0	70.6	66.5	59.0	53.8	22.5
2000	602	1845	70.8	90.1	80.5	74.6	71.9	67.5	62.4	57.7	19.3
2000	602	1900	68.4	81.2	76.1	73.6	71.7	66.8	61.0	55.4	12.8
2000	602	1915	68.2	79.9	77.1	72.7	71.1	66.8	60.5	55.1	11.7
2000	602	1930	68.0	85.5	76.9	71.9	70.3	66.6	61.4	55.2	17.5
2000	602	1945	68.5	85.3	76.8	72.7	71.4	66.7	61.5	56.3	16.8
2000	602	2000	68.0	84.9	77.3	72.2	70.3	66.2	59.7	54.1	16.9
2000	602	2015	67.7	81.6	76.7	72.3	70.8	65.5	60.3	54.2	13.9
2000	602	2030	66.7	81.4	74.6	71.4	69.8	65.3	57.9	53.0	14.7
2000	602	2045	67.7	86.3	77.2	71.9	70.0	65.5	60.1	56.3	18.6
2000	602	2100	66.1	81.2	75.8	70.3	69.0	63.9	58.2	52.2	15.1
2000	602	2115	66.8	81.1	75.3	71.3	69.9	65.3	57.9	53.1	14.3
2000	602	2130	65.5	76.8	72.9	70.4	68.9	64.3	57.5	52.4	11.3
2000	602	2145	66.9	80.8	76.9	71.9	69.8	64.4	57.2	52.3	13.9
2000	602	2200	67.0	86.8	77.8	72.6	69.6	63.7	56.3	50.8	19.8
2000	602	2215	66.3	84.0	75.8	70.8	69.0	64.2	57.5	51.4	17.7
2000	602	2230	67.7	82.3	77.5	73.6	71.7	64.4	57.1	52.2	14.6
2000	602	2245	65.6	80.1	73.9	70.2	68.9	63.5	56.4	46.7	14.5
2000	602	2300	67.2	81.7	76.6	72.2	69.8	65.1	58.9	52.2	14.5
2000	602	2315	66.3	81.0	75.4	71.2	69.5	64.3	57.3	52.0	14.7
2000	602	2330	64.9	75.4	72.6	70.2	68.9	62.8	55.7	51.3	10.5
2000	602	2345	64.8	85.1	72.0	69.3	68.0	62.0	54.6	49.7	20.3
2000	602	0	66.1	82.6	77.6	70.2	68.2	61.9	55.0	49.7	16.5

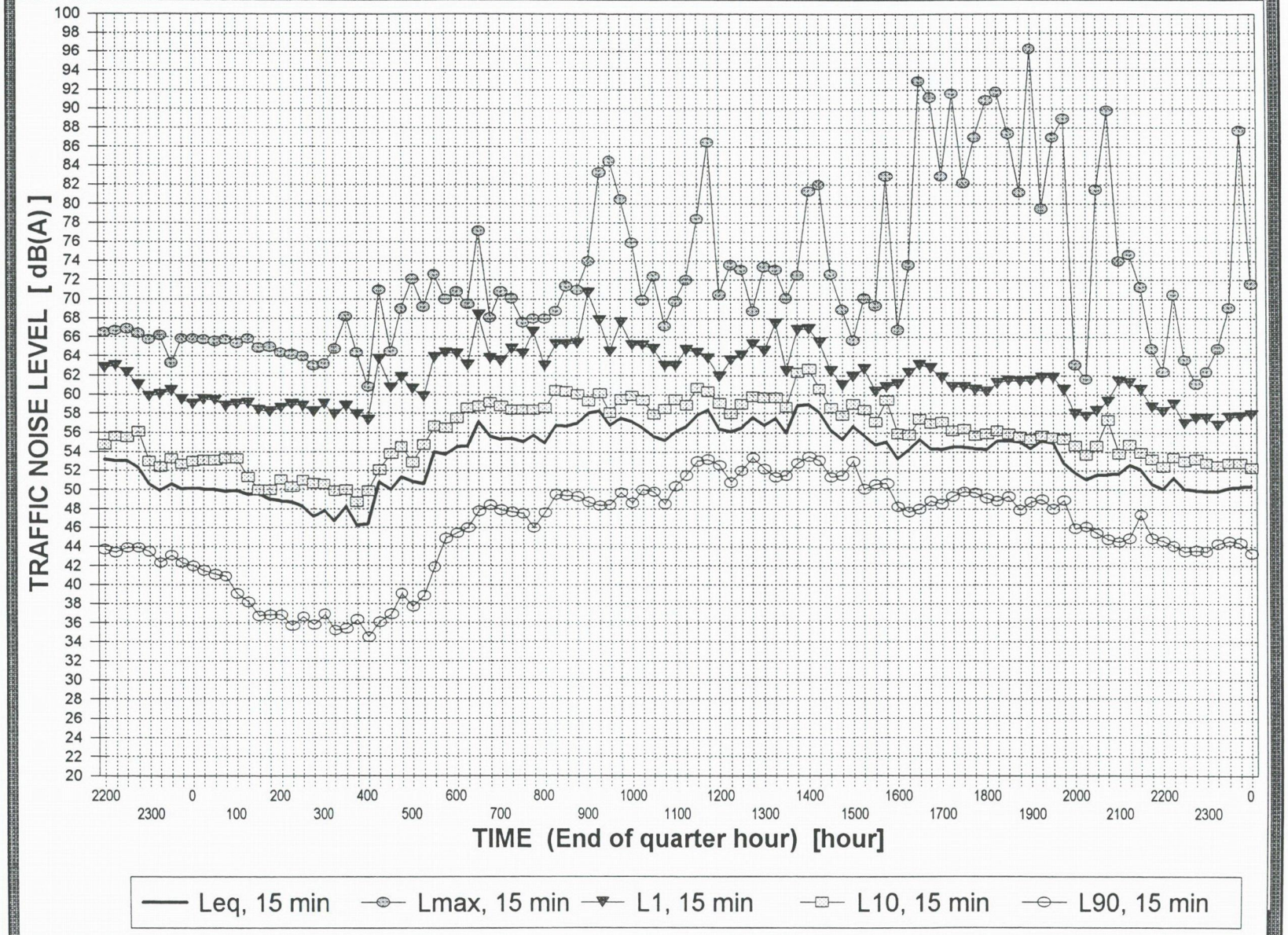
DAY 7	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**69.0**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**65.6**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**69.9**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**66.8**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**72.4**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**59.8**	dB(A)

11 Jane Place, Cecil Hills

DAY 1

Saturday 27 May 2000

Norsonics S/N 20324



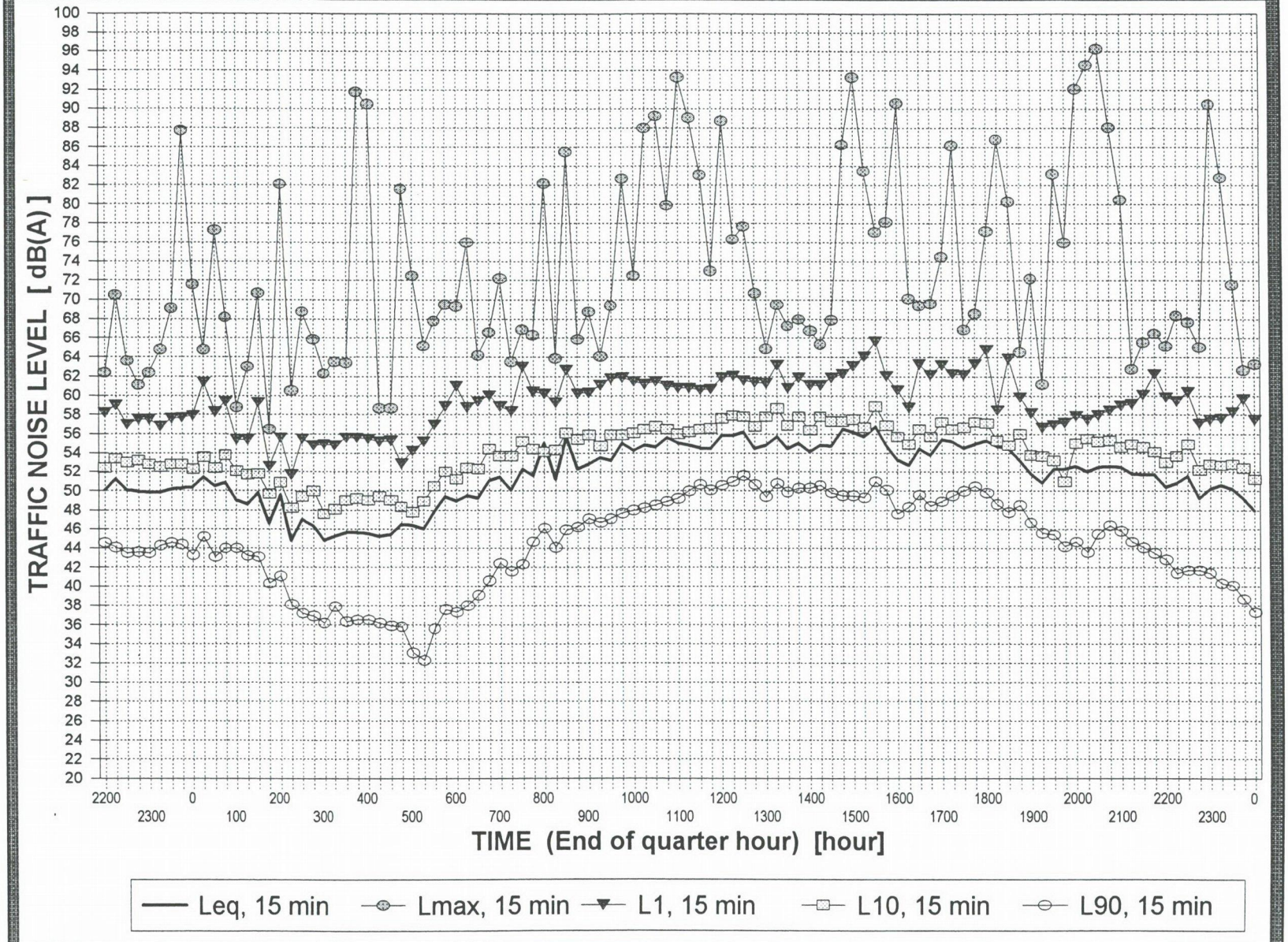
KOIKAS ACOUSTICS PTY LTD

11 Jane Place, Cecil Hills

DAY 2

Sunday 28 May 2000

Norsonics S/N 20324



KOIKAS ACOUSTICS PTY LTD

11 Jane Place, Cecil Hills

DAY 3

Monday 29 May 2000

Norsonics S/N 20324

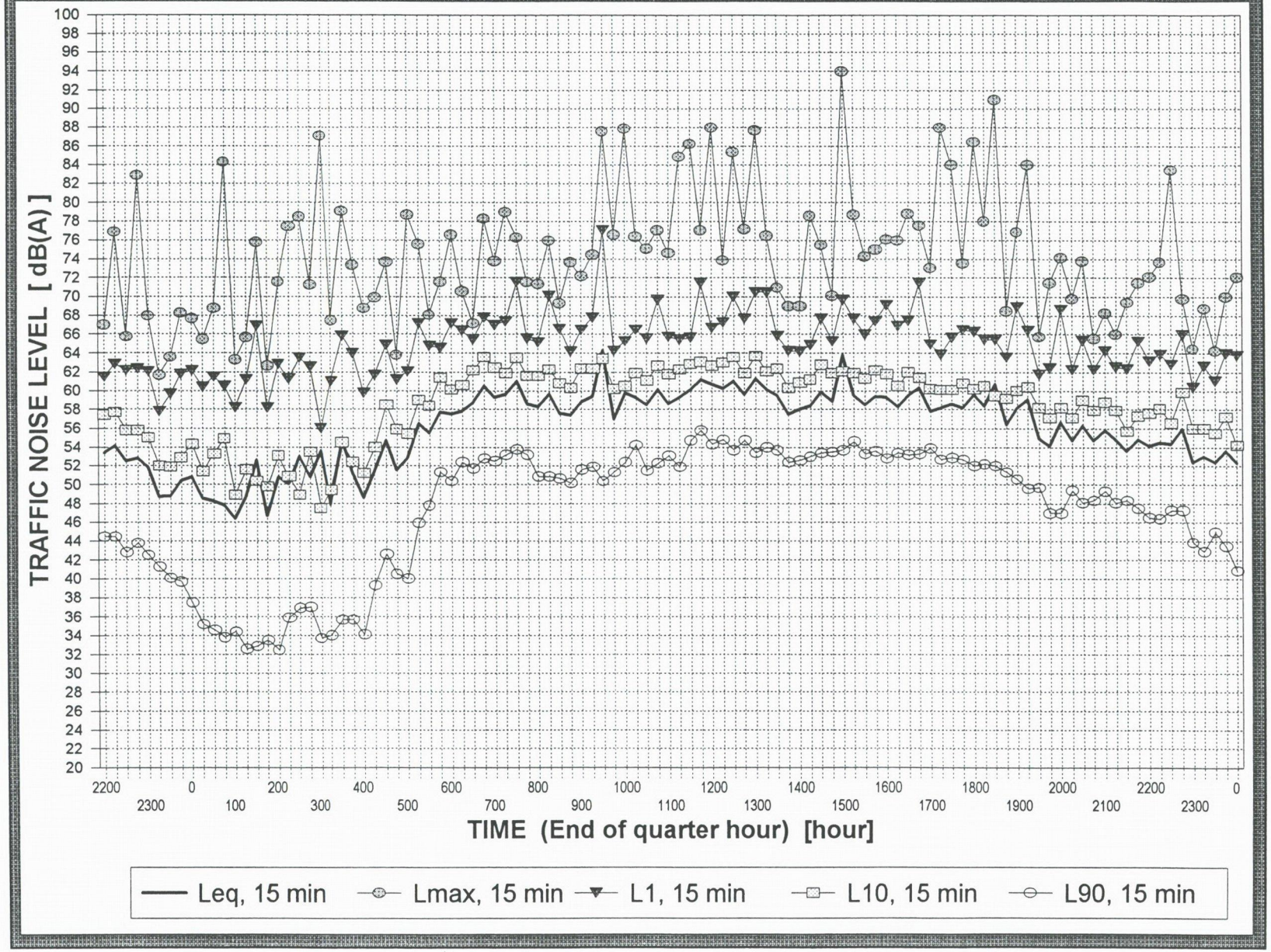
KOIKAS ACOUSTICS PTY LTD

11 Jane Place, Cecil Hills

DAY 4

Tuesday 30 May 2000

Norsonics S/N 20324



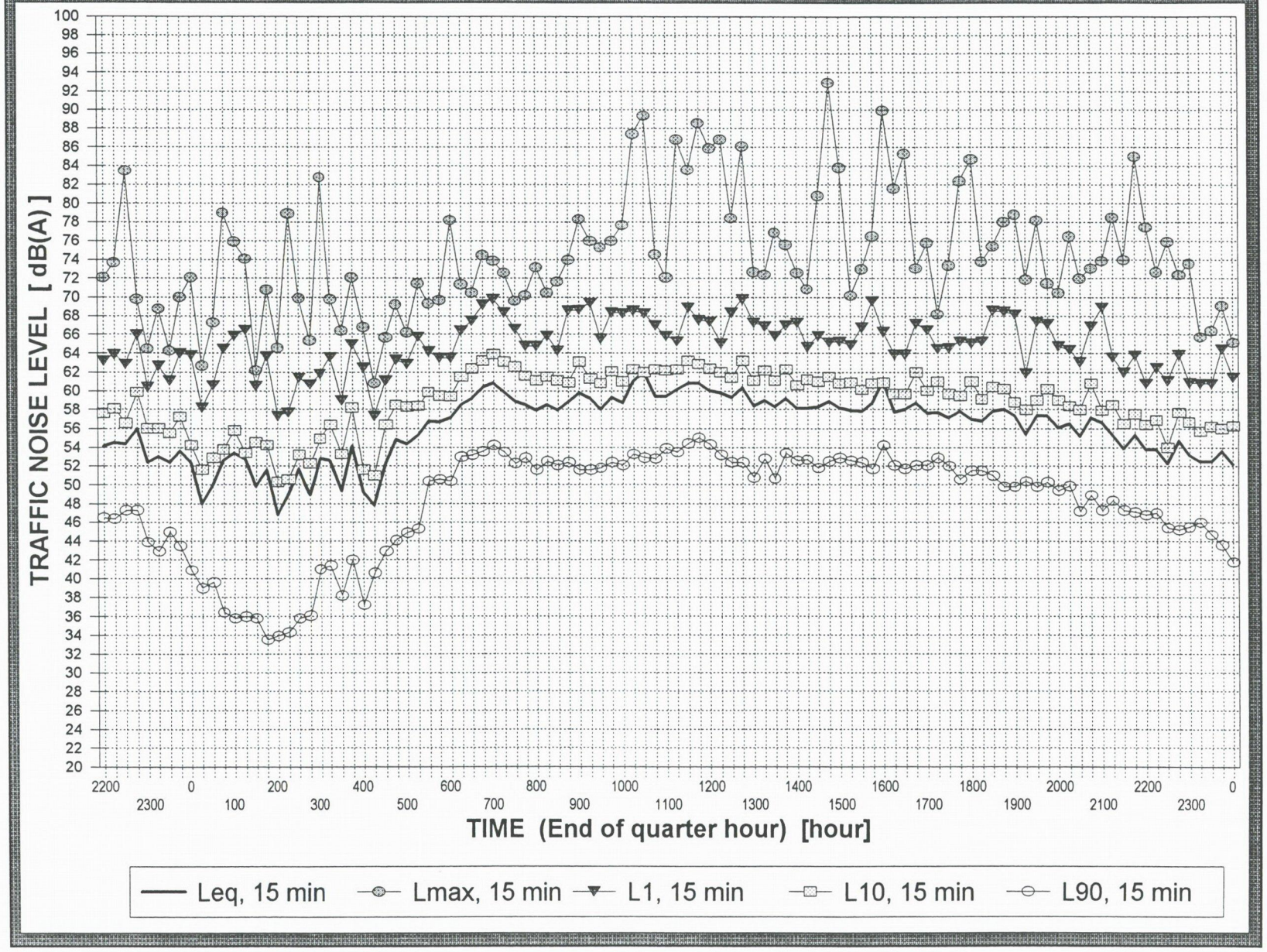
KOIKAS ACOUSTICS PTY LTD

11 Jane Place, Cecil Hills

DAY 5

Wednesday 31 May 2000

Norsonics S/N 20324



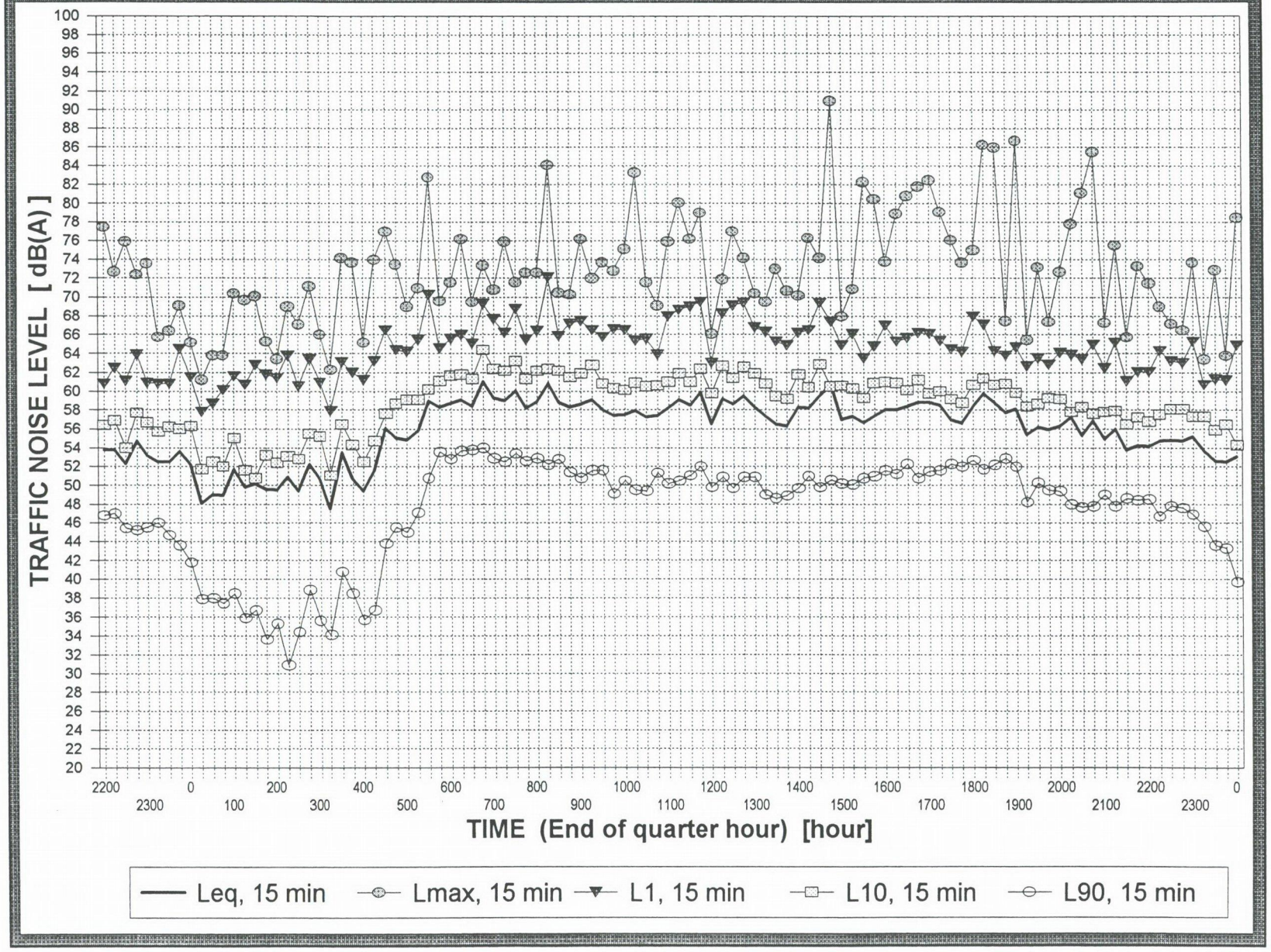
KOIKAS ACOUSTICS PTY LTD

11 Jane Place, Cecil Hills

DAY 6

Thursday 1 June 2000

Norsonics S/N 20324



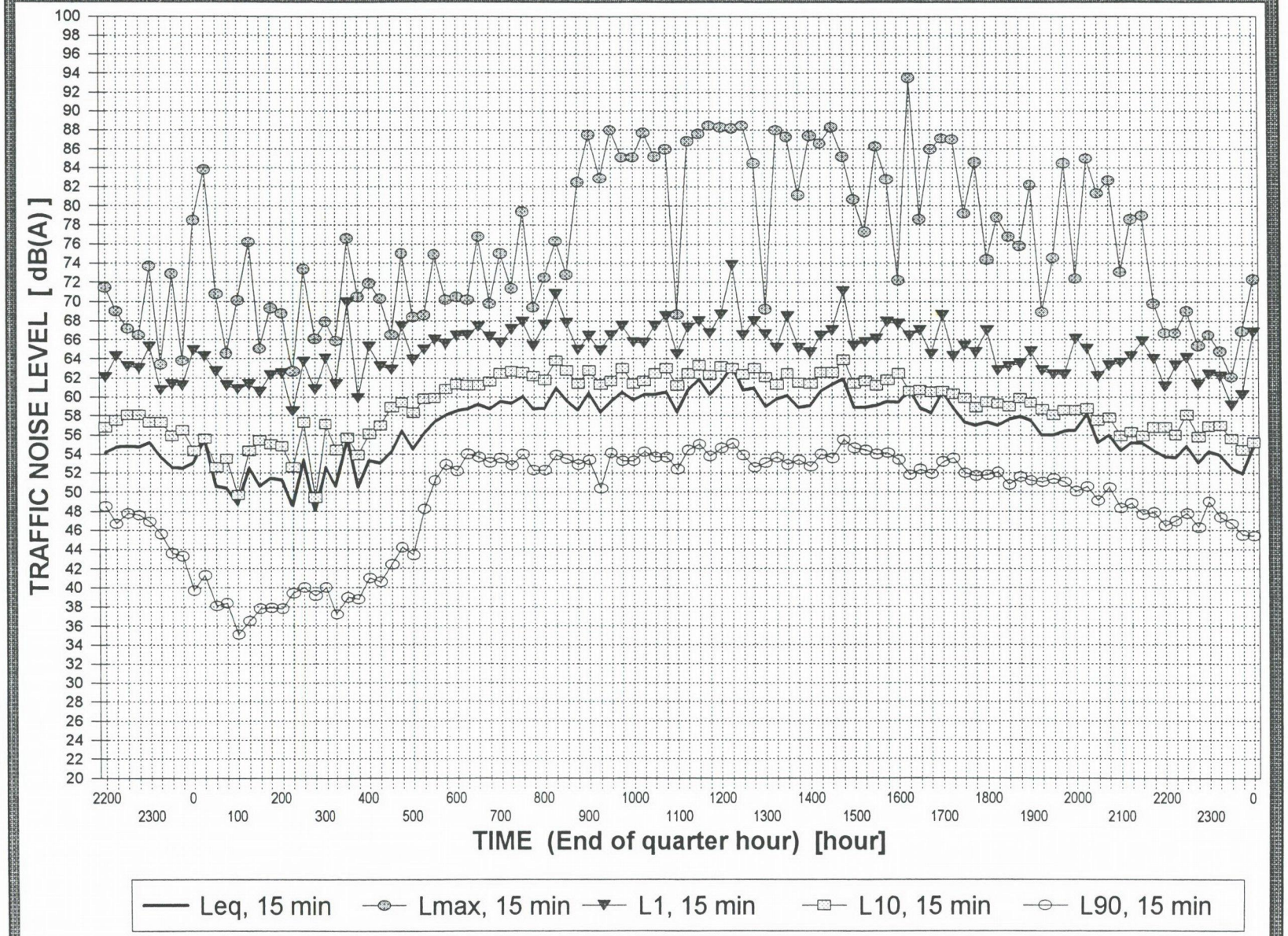
KOIKAS ACOUSTICS PTY LTD

11 Jane Place, Cecil Hills

DAY 7

Friday 2 June 2000

Norsonics S/N 20324



KOIKAS ACOUSTICS PTY LTD

11 Jane Place, Cecil Hills — DAY 1

Saturday 27 May 2000 — Norsonics S/N 20324

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	526	2215	53.0	66.7	63.0	58.0	55.6	49.6	43.4	39.4	13.7
2000	526	2230	53.1	66.9	62.3	58.0	55.5	49.1	43.9	40.6	13.8
2000	526	2245	52.3	66.4	61.0	58.1	56.1	49.3	43.9	39.1	14.1
2000	526	2300	50.6	65.8	59.8	55.4	53.0	48.4	43.5	39.9	15.2
2000	526	2315	49.9	66.2	60.0	54.3	52.4	47.5	42.3	39.2	16.3
2000	526	2330	50.6	63.3	60.4	55.3	53.3	47.9	43.1	39.8	12.7
2000	526	2345	50.1	65.9	59.5	54.8	52.7	47.6	42.3	40.0	15.8
2000	526	0	50.2	65.9	59.0	54.4	53.0	48.0	42.0	38.3	15.7
2000	527	15	50.1	65.8	59.5	55.5	53.1	48.5	41.5	38.0	15.7
2000	527	30	50.0	65.6	59.4	55.4	53.1	46.9	41.1	36.7	15.6
2000	527	45	49.8	65.8	58.8	56.7	53.3	46.3	40.9	37.0	16.0
2000	527	100	49.9	65.4	59.0	55.0	53.3	45.8	39.1	34.9	15.5
2000	527	115	49.5	65.9	59.1	53.4	51.3	44.1	38.2	33.5	16.4
2000	527	130	49.6	64.9	58.4	52.0	50.0	42.6	36.7	33.0	15.3
2000	527	145	49.0	65.0	58.2	52.9	50.0	44.8	36.8	32.0	16.0
2000	527	200	48.8	64.4	58.6	53.3	51.1	44.9	36.8	32.0	15.6
2000	527	215	48.7	64.2	59.0	52.3	50.3	40.7	35.7	32.2	15.5
2000	527	230	48.2	64.0	58.8	53.8	51.0	42.1	36.6	32.7	15.8
2000	527	245	47.2	63.0	58.2	53.8	50.7	41.7	35.8	32.2	15.8
2000	527	300	47.8	63.2	59.0	54.8	50.6	42.2	36.9	33.1	15.4
2000	527	315	46.7	64.8	57.9	52.5	49.9	41.4	35.2	30.2	18.1
2000	527	330	48.2	68.2	58.8	52.8	50.0	40.4	35.4	32.3	20.0
2000	527	345	46.2	64.4	57.9	51.3	48.7	40.6	36.3	30.7	18.2
2000	527	400	46.4	60.8	57.3	52.5	49.9	40.2	34.5	31.7	14.4
2000	527	415	50.8	71.0	63.7	56.2	52.1	41.9	36.1	31.5	20.2
2000	527	430	50.0	64.5	60.7	57.1	53.8	43.5	36.9	33.0	14.5
2000	527	445	51.3	69.0	61.8	57.6	54.5	45.9	39.1	35.0	17.7
2000	527	500	50.9	72.1	60.6	55.6	52.9	44.2	37.7	33.1	21.2
2000	527	515	50.6	69.2	59.8	56.9	54.7	46.2	38.9	33.8	18.6
2000	527	530	54.0	72.6	63.9	59.6	56.7	49.1	41.9	35.4	18.6
2000	527	545	53.7	70.0	64.4	59.1	56.5	50.3	44.9	39.9	16.3
2000	527	600	54.5	70.8	64.3	60.0	57.5	51.2	45.4	41.0	16.3
2000	527	615	54.6	69.5	63.1	60.4	58.6	51.6	46.0	41.5	14.9
2000	527	630	57.1	77.2	68.4	61.0	58.8	53.1	47.8	43.0	20.1
2000	527	645	55.6	68.1	63.8	61.0	59.2	53.1	48.4	44.0	12.5
2000	527	700	55.3	70.8	63.5	60.4	58.8	52.8	47.9	41.3	15.5
2000	527	715	55.4	70.1	64.8	60.8	58.4	52.6	47.7	43.6	14.7
2000	527	730	55.0	67.6	64.3	60.6	58.4	52.0	47.5	42.3	12.6
2000	527	745	55.7	68.0	66.6	60.6	58.4	51.6	46.0	41.2	12.3
2000	527	800	54.9	68.0	63.0	60.4	58.6	52.0	47.6	42.2	13.1
2000	527	815	56.8	68.8	65.3	62.2	60.4	54.3	49.5	45.1	12.0
2000	527	830	56.7	71.4	65.3	62.3	60.3	54.1	49.4	43.2	14.7
2000	527	845	57.0	71.0	65.4	62.0	60.0	54.0	49.3	42.6	14.0
2000	527	900	58.0	74.0	70.7	61.7	59.3	53.0	48.7	42.9	16.0
2000	527	915	58.3	83.3	67.8	62.3	60.1	53.1	48.3	43.3	25.0
2000	527	930	56.8	84.5	64.5	60.1	58.1	52.5	48.4	43.8	27.7
2000	527	945	57.5	80.5	67.6	61.8	59.5	53.6	49.7	44.4	23.0
2000	527	1000	57.1	75.9	65.2	61.7	59.9	53.7	48.6	43.9	18.8
2000	527	1015	56.5	69.9	65.2	60.8	59.4	54.3	50.0	44.9	13.4
2000	527	1030	55.6	72.4	64.8	60.1	57.9	53.1	49.8	46.7	16.8
2000	527	1045	55.2	67.2	63.0	60.0	58.5	53.3	48.5	43.7	12.0
2000	527	1100	56.1	69.8	63.0	60.8	59.5	54.2	50.4	44.3	13.7
2000	527	1115	56.6	72.0	64.7	60.5	58.9	54.9	51.5	46.7	15.4
2000	527	1130	57.8	78.4	64.4	61.9	60.7	56.3	53.0	49.5	20.6
2000	527	1145	58.4	86.5	63.8	61.4	60.3	56.2	53.2	49.7	28.1
2000	527	1200	56.4	70.5	61.9	60.1	59.1	55.5	52.6	48.4	14.1
2000	527	1215	56.1	73.6	63.6	59.4	58.0	54.6	50.8	45.1	17.5
2000	527	1230	56.5	73.1	64.1	60.4	59.0	55.1	52.0	49.1	16.6
2000	527	1245	57.6	68.8	65.3	61.2	59.8	56.4	53.4	49.1	11.2
2000	527	1300	56.8	73.4	64.6	61.3	59.7	55.0	52.2	49.7	16.6
2000	527	1315	57.5	73.1	67.5	62.4	59.7	54.7	51.3	45.6	15.6
2000	527	1330	56.0	70.1	62.5	59.9	58.7	54.8	51.5	47.5	14.1
2000	527	1345	58.8	72.5	66.8	64.0	62.3	56.0	52.8	47.7	13.7
2000	527	1400	59.0	81.3	66.9	64.8	62.7	56.5	53.5	48.1	22.3
2000	527	1415	58.1	82.0	65.5	62.0	60.6	55.9	53.1	47.9	23.9
2000	527	1430	56.3	72.6	62.5	59.8	58.6	55.3	51.3	47.8	16.3
2000	527	1445	55.3	68.9	61.0	58.8	57.8	54.4	51.5	48.6	13.6
2000	527	1500	56.7	65.7	61.9	60.2	59.0	56.0	53.0	49.7	9.0
2000	527	1515	55.7	70.1	62.7	60.1	58.4	54.3	50.1	45.7	14.4
2000	527	1530	54.7	69.3	60.3	58.0	57.1	53.8	50.6	47.6	14.6
2000	527	1545	55.0	82.9	60.8	57.9	59.4	53.9	50.7	46.6	27.9
2000	527	1600	53.3	66.8	61.1	57.6	55.9	51.9	48.2	44.5	13.5
2000	527	1615	54.2	73.6	62.3	58.1	55.8	52.0	47.7	42.0	19.4
2000	527	1630	55.3	92.9	63.1	58.2	57.4	52.0	48.0	41.5	37.6
2000	527	1645	54.3	91.2	62.8	57.8	57.0	52.7	48.8	44.1	36.9
2000	527	1700	54.2	82.9	61.8	57.5	57.1	52.4	48.5	44.1	28.7
2000	527	1715	54.5	91.6	60.8	57.5	56.2	52.6	49.3	45.6	37.1
2000	527	1730	54.5	82.2	60.8	57.7	56.4	52.7	49.8	43.4	27.7
2000	527	1745	54.3	87.0	60.5	56.9	55.7	52.5	49.7	44.4	32.7
2000	527	1800	54.2	90.9	60.3	57.0	55.9	52.6	49.1	44.7	36.7
2000	527	1815	55.1	91.8	61.2	58.2	56.2	53.0	48.8	45.0	36.7
2000	527	1830	55.2	87.4	61.5	58.2	55.9	52.7	49.3	44.3	32.2
2000	527	1845	55.0	81.2	61.4	57.7	55.6	51.7	47.9	44.3	26.2
2000	527	1900	54.3	96.3	61.5	57.2	55.3	51.7	48.7	44.8	42.0
2000	527	1915	55.1	79.5	61.8	57.6	55.7	52.1	49.0	43.1	24.4
2000	527	1930	54.9	87.0	61.8	57.8	55.5	52.3	48.0	42.2	32.1
2000	527	1945	52.8	89.0	60.5	56.9	55.3	52.0	48.9	43.6	36.2
2000	527	2000	51.8	63.1	58.0	56.0	54.6	50.5	45.9	40.6	11.3
2000	527	2015	51.1	61.6	57.7	54.9	53.7	50.1	46.1	41.6	10.5
2000	527	2030	51.5	81.5	58.3	56.2	54.6	50.3	45.4	40.4	30.0
2000	527	2045	51.6	89.8	59.3	56.2	57.3	49.9	44.8	40.5	38.2
2000	527	2100	51.7	74.0	61.4	55.9	53.8	48.4	44.5	40.7	22.3
2000	527	2115	52.6	74.7	61.2	56.8	54.7	50.4	44.9	40.5	22.1
2000	527	2130	52.1	71.3	60.5	55.3	53.9	50.6	47.4	42.0	19.2
2000	527	2145	50.6	64.8	58.7	55.0	53.2	48.8	44.9	41.7	14.2
2000	527	2200	50.1	62.4	58.2	54.2	52.4	48.9	44.6	40.3	12.3
2000	527	2215	51.2	70.5	59.0	54.9	53.4	49.0	44.1	39.5	19.3
2000	527	2230	50.1	63.6	57.0	54.3	53.0	48.7	43.5	39.0	13.5
2000	527	2245	49.9	61.1	57.5	54.6	53.2	48.1	43.6	40.5	11.2
2000	527	2300	49.8	62.4	57.5	54.0	52.8	48.3	43.5	40.4	12.6
2000	527	2315	49.8	64.8	56.8	53.8	52.5	48.5	44.3	40.1	15.0
2000	527	2330	50.2	69.1	57.6	53.9	52.8	48.6	44.6	40.7	18.9
2000	527	2345	50.3	87.7	57.7	54.0	52.8	48.5	44.4	40.2	37.4
2000	527	0	50.4	71.6	57.9	53.5	52.3	48.3	43.3	39.0	21.2

DAY 1	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**54.5**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**50.4**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**55.7**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**51.6**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**57.2**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**46.0**	dB(A)

11 Jane Place, Cecil Hills — DAY 2

Sunday 28 May 2000 — Norsonics S/N 20324

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	527	2200	50.1	62.4	58.2	54.2	52.4	48.9	44.6	40.3	12.3
2000	527	2215	51.2	70.5	59.0	54.9	53.4	49.0	44.1	39.5	19.3
2000	527	2230	50.1	63.6	57.0	54.3	53.0	48.7	43.5	39.0	13.5
2000	527	2245	49.9	61.1	57.5	54.6	53.2	48.1	43.6	40.5	11.2
2000	527	2300	49.8	62.4	57.5	54.0	52.8	48.3	43.5	40.4	12.6
2000	527	2315	49.8	64.8	56.8	53.8	52.5	48.5	44.3	40.1	15.0
2000	527	2330	50.2	69.1	57.6	53.9	52.8	48.6	44.6	40.7	18.9
2000	527	2345	50.3	87.7	57.7	54.0	52.8	48.5	44.4	40.2	37.4
2000	527	0	50.4	71.6	57.9	53.5	52.3	48.3	43.3	39.0	21.2
2000	528	15	51.4	64.8	61.4	55.7	53.6	49.3	45.2	40.2	13.4
2000	528	30	50.5	77.3	58.3	53.7	52.4	48.0	43.1	37.9	26.8
2000	528	45	50.9	68.2	59.4	55.5	53.8	49.0	44.0	38.9	17.3
2000	528	100	49.0	58.8	55.4	53.1	52.1	47.8	44.0	40.6	9.8
2000	528	115	48.6	63.0	55.4	52.8	51.7	46.8	43.2	40.3	14.4
2000	528	130	49.8	70.7	59.3	53.3	51.8	47.5	43.1	38.5	20.9
2000	528	145	46.6	56.5	52.6	50.6	49.7	45.6	40.3	36.4	9.9
2000	528	200	49.6	82.1	55.6	52.1	50.9	45.4	41.1	36.6	32.5
2000	528	215	44.8	60.5	51.7	49.4	48.2	42.4	38.1	33.7	15.7
2000	528	230	47.0	68.8	55.5	50.9	49.4	43.6	37.2	32.8	21.8
2000	528	245	46.3	65.9	54.8	51.5	50.0	42.2	36.9	32.3	19.6
2000	528	300	44.8	62.3	54.9	50.0	47.6	40.9	36.2	33.4	17.5
2000	528	315	45.2	63.5	54.8	50.0	48.1	41.6	37.9	34.6	18.3
2000	528	330	45.6	63.4	55.6	51.2	49.0	41.9	36.3	30.0	17.8
2000	528	345	45.6	91.8	55.6	51.5	49.2	42.2	36.5	30.5	46.2
2000	528	400	45.5	90.5	55.5	51.2	49.0	42.5	36.5	30.5	45.0
2000	528	415	45.2	58.7	55.2	51.1	49.4	41.2	36.2	31.2	13.5
2000	528	430	45.4	58.7	55.3	51.1	49.0	41.4	35.9	32.6	13.3
2000	528	445	46.5	81.6	52.9	50.2	48.3	41.2	35.8	31.5	35.1
2000	528	500	46.4	72.5	54.2	50.8	47.8	37.8	33.1	28.7	26.1
2000	528	515	46.0	65.2	55.2	51.1	48.9	39.6	32.3	26.4	19.2
2000	528	530	47.8	67.8	57.0	52.5	50.5	43.7	35.6	30.3	20.0
2000	528	545	49.4	69.5	58.9	54.4	52.0	45.1	37.6	31.2	20.1
2000	528	600	48.9	69.3	61.0	53.5	51.2	43.7	37.3	32.8	20.4
2000	528	615	49.5	76.0	58.8	55.0	52.4	45.2	38.0	33.6	26.5
2000	528	630	49.2	64.2	59.4	54.8	52.3	45.4	39.1	33.8	15.0
2000	528	645	51.1	66.6	60.0	57.0	54.4	47.9	40.6	35.6	15.5
2000	528	700	51.4	72.2	58.9	55.0	53.7	48.2	42.4	36.3	20.8
2000	528	715	50.1	63.5	58.4	55.6	53.7	47.6	41.6	37.0	13.4
2000	528	730	52.3	66.9	63.0	57.5	55.2	49.1	42.3	36.6	14.6
2000	528	745	51.6	66.3	60.4	56.4	54.4	49.5	44.7	40.2	14.7
2000	528	800	55.0	82.2	60.2	55.6	54.1	50.4	46.1	42.2	27.2
2000	528	815	51.2	63.9	59.3	55.9	54.3	49.5	44.1	39.1	12.7
2000	528	830	55.7	85.5	62.7	57.9	56.1	50.6	45.9	40.3	29.8
2000	528	845	52.3	65.9	60.2	57.1	55.4	50.4	46.2	42.2	13.6
2000	528	900	52.8	68.8	60.3	57.3	55.9	51.0	47.1	42.6	16.0
2000	528	915	53.5	64.1	61.1	56.3	54.7	51.1	46.7	41.5	10.6
2000	528	930	53.2	69.4	61.8	58.0	55.9	51.0	47.1	40.6	16.2
2000	528	945	55.0	82.7	61.9	58.3	55.9	52.1	47.7	42.9	27.7
2000	528	1000	54.2	72.5	61.5	58.2	56.1	53.1	48.0	43.5	18.3
2000	528	1015	54.8	88.0	61.2	58.5	56.5	52.8	48.2	43.2	33.2
2000	528	1030	54.6	89.3	61.5	58.1	56.8	52.5	48.5	43.5	34.7
2000	528	1045	55.6	79.9	61.0	57.8	56.5	52.6	48.9	44.5	24.3
2000	528	1100	55.0	93.3	60.8	57.7	56.0	52.8	49.2	45.2	38.3
2000	528	1115	54.8	89.1	60.8	57.5	56.2	52.9	50.0	45.6	34.3
2000	528	1130	54.5	83.1	60.6	57.8	56.5	53.2	50.7	46.0	28.6
2000	528	1145	54.4	73.0	60.7	57.9	56.6	53.1	50.1	46.1	18.6
2000	528	1200	55.8	88.8	61.9	59.1	57.6	53.6	50.6	45.3	33.0
2000	528	1215	55.8	76.3	62.1	59.5	57.9	53.7	51.0	47.0	20.5
2000	528	1230	56.2	77.7	61.6	58.9	57.8	54.5	51.6	47.8	21.5
2000	528	1245	54.4	70.7	61.4	58.2	56.8	53.1	50.7	48.6	16.3
2000	528	1300	54.8	64.9	61.3	58.9	57.8	53.6	49.4	44.8	10.1
2000	528	1315	55.7	69.5	63.2	60.1	58.7	54.0	50.8	46.5	13.8
2000	528	1330	54.4	67.3	60.8	57.7	56.9	53.5	49.9	44.8	12.9
2000	528	1345	55.0	68.0	61.9	59.2	57.8	53.4	50.3	45.5	13.0
2000	528	1400	54.1	66.8	61.1	57.4	56.4	53.0	50.3	46.5	12.7
2000	528	1415	54.8	65.4	61.1	58.8	57.8	53.6	50.6	45.7	10.6
2000	528	1430	54.7	67.9	61.9	58.9	57.3	53.5	49.8	44.3	13.2
2000	528	1445	56.5	86.3	62.3	59.0	57.3	52.4	49.5	42.8	29.8
2000	528	1500	56.2	93.3	63.1	59.7	57.5	52.9	49.5	44.5	37.1
2000	528	1515	55.7	83.5	64.1	58.1	56.7	52.6	49.3	44.0	27.8
2000	528	1530	56.8	77.1	65.7	60.1	58.9	54.2	51.0	47.1	20.3
2000	528	1545	54.8	78.1	62.1	57.9	56.9	53.4	50.1	43.6	23.3
2000	528	1600	53.3	90.6	60.6	57.1	55.7	51.8	47.6	42.1	37.3
2000	528	1615	52.7	70.1	58.8	56.1	54.9	51.6	48.3	43.5	17.4
2000	528	1630	54.4	69.4	63.3	58.3	56.5	52.7	49.6	44.7	15.0
2000	528	1645	53.8	69.6	62.2	57.3	55.7	52.3	48.4	43.9	15.8
2000	528	1700	55.4	74.5	63.2	57.7	57.2	53.3	48.9	43.1	19.1
2000	528	1715	55.2	86.2	62.3	57.9	56.5	53.4	49.5	44.6	31.0
2000	528	1730	54.5	66.9	62.2	57.7	56.7	53.6	50.0	46.0	12.4
2000	528	1745	54.9	68.6	63.3	59.0	57.2	53.3	50.5	46.3	13.7
2000	528	1800	55.3	77.2	64.8	59.1	57.1	52.8	49.8	45.0	21.9
2000	528	1815	54.7	86.8	58.5	56.5	55.3	52.0	48.6	45.1	32.1
2000	528	1830	54.5	80.3	63.9	56.8	54.8	51.1	47.8	45.2	25.8
2000	528	1845	53.2	64.6	59.9	57.4	56.0	52.0	48.5	44.3	11.4
2000	528	1900	51.8	72.2	58.2	54.7	53.8	50.9	46.7	40.6	20.4
2000	528	1915	50.9	61.2	56.7	54.7	53.7	50.1	45.6	41.4	10.3
2000	528	1930	52.3	83.2	57.0	55.2	53.2	50.5	45.4	39.9	30.9
2000	528	1945	52.3	76.0	57.2	56.0	51.0	50.3	44.2	40.9	23.7
2000	528	2000	52.6	92.1	57.9	56.2	55.0	50.6	44.7	38.7	39.5
2000	528	2015	52.0	94.6	57.5	56.3	55.5	50.7	43.6	39.2	42.6
2000	528	2030	52.5	96.3	58.0	56.3	55.2	50.7	45.5	40.7	43.8
2000	528	2045	52.6	88.1	58.5	56.4	55.3	50.6	46.4	41.3	35.5
2000	528	2100	52.5	80.5	59.0	56.0	54.6	50.6	45.8	39.9	28.0
2000	528	2115	51.8	62.8	59.2	56.3	54.9	50.5	44.7	40.5	11.0
2000	528	2130	51.7	65.6	60.1	56.0	54.6	49.9	44.1	39.6	13.9
2000	528	2145	51.7	66.5	62.3	56.5	54.1	48.8	43.5	39.6	14.8
2000	528	2200	50.4	65.2	59.9	54.8	53.0	47.9	42.8	37.8	14.8
2000	528	2215	50.8	68.4	59.5	56.2	53.7	46.9	41.4	37.3	17.6
2000	528	2230	51.5	67.7	60.4	56.6	54.9	48.8	41.7	38.7	16.2
2000	528	2245	49.2	65.1	57.1	53.5	52.2	47.2	41.7	37.8	15.9
2000	528	2300	50.2	90.5	57.5	53.6	52.8	47.5	41.4	34.7	40.3
2000	528	2315	50.6	82.8	57.6	53.6	52.7	47.6	40.3	34.9	32.2
2000	528	2330	50.2	71.6	58.3	55.2	52.8	47.4	40.1	35.2	21.4
2000	528	2345	49.2	62.7	59.7	54.7	52.4	45.5	38.7	34.2	13.5

DAY 2	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**52.8**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**48.5**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**54.2**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**48.8**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**55.4**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**41.6**	dB(A)

11 Jane Place, Cecil Hills — DAY 3

Monday 29 May 2000 — **Norsonics S/N 20324**

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	528	2215	50.8	68.4	59.5	56.2	53.7	46.9	41.4	37.3	17.6
2000	528	2230	51.5	67.7	60.4	56.6	54.9	48.8	41.7	38.7	16.2
2000	528	2245	49.2	65.1	57.1	53.5	52.2	47.2	41.7	37.8	15.9
2000	528	2300	50.2	90.5	57.5	53.6	52.8	47.5	41.4	34.7	40.3
2000	528	2315	50.6	82.8	57.6	53.6	52.7	47.6	40.3	34.9	32.2
2000	528	2330	50.2	71.6	58.3	55.2	52.8	47.4	40.1	35.2	21.4
2000	528	2345	49.2	62.7	59.7	54.7	52.4	45.5	38.7	34.2	13.5
2000	528	0	48.0	63.3	57.5	52.8	51.2	44.7	37.3	34.0	15.3
2000	529	15	47.9	67.9	58.7	53.2	50.3	42.8	37.3	34.0	20.0
2000	529	30	50.0	70.1	59.8	55.8	52.9	44.3	35.6	30.7	20.1
2000	529	45	48.3	67.4	60.3	53.3	51.1	43.1	34.9	30.2	19.1
2000	529	100	50.3	69.1	61.6	55.7	52.9	44.8	37.0	30.5	18.8
2000	529	115	47.9	67.8	60.3	53.4	50.8	38.3	30.2	24.3	19.9
2000	529	130	50.0	69.9	63.7	53.3	49.4	39.9	32.9	28.6	19.9
2000	529	145	49.2	65.8	60.0	53.3	50.4	40.0	33.9	31.3	16.6
2000	529	200	49.9	66.4	62.0	54.3	50.7	40.4	33.2	30.1	16.5
2000	529	215	52.2	70.9	62.8	54.1	50.2	40.6	32.5	30.2	18.7
2000	529	230	52.3	65.8	61.2	54.2	52.3	40.0	31.5	29.5	13.5
2000	529	245	50.7	72.7	62.8	53.2	51.0	41.3	30.8	28.2	22.0
2000	529	300	52.3	66.1	63.1	52.8	50.1	40.5	30.5	27.3	13.8
2000	529	315	44.5	61.6	57.1	52.9	48.0	36.5	30.0	27.0	17.1
2000	529	330	47.0	66.1	59.3	53.2	49.9	39.6	30.1	26.7	19.1
2000	529	345	49.9	69.0	60.3	54.2	50.0	40.5	32.5	30.0	19.1
2000	529	400	50.6	78.4	61.8	56.0	52.7	41.2	34.9	30.7	27.8
2000	529	415	50.9	69.1	61.3	57.5	54.9	45.4	36.4	28.6	18.2
2000	529	430	54.7	76.3	63.2	59.4	57.5	49.9	40.5	33.8	21.6
2000	529	445	53.5	66.0	62.0	59.4	57.7	50.0	42.9	38.2	12.5
2000	529	500	52.3	64.8	62.0	58.5	56.5	48.1	42.8	38.1	12.5
2000	529	515	54.9	67.6	63.8	60.9	58.7	51.9	46.3	38.4	12.7
2000	529	530	57.4	67.4	65.1	62.4	60.9	55.3	50.1	45.5	10.0
2000	529	545	58.9	71.5	68.6	64.2	61.7	56.3	52.6	46.8	12.6
2000	529	600	57.2	70.6	66.8	62.6	60.6	54.3	49.8	45.6	13.4
2000	529	615	58.3	73.0	66.1	63.4	61.7	55.9	50.9	47.2	14.7
2000	529	630	58.5	72.4	66.9	62.9	61.0	56.8	53.1	50.4	13.9
2000	529	645	59.9	76.8	69.6	63.8	62.2	57.5	53.4	50.1	16.9
2000	529	700	59.4	73.7	67.4	63.8	62.3	57.4	52.8	50.1	14.3
2000	529	715	60.3	80.1	67.4	64.8	63.4	57.8	53.8	48.8	19.8
2000	529	730	57.7	68.1	64.1	62.2	60.9	56.1	52.3	48.2	10.4
2000	529	745	59.8	86.7	66.9	63.2	61.6	56.5	52.0	48.7	26.9
2000	529	800	59.1	76.1	68.8	63.5	61.6	56.4	51.2	48.0	17.0
2000	529	815	57.8	69.6	65.2	62.8	61.2	55.7	50.6	46.9	11.8
2000	529	830	57.5	69.8	64.7	62.8	61.4	54.9	50.1	46.6	12.3
2000	529	845	60.7	86.7	70.4	62.8	60.8	55.6	50.6	45.7	26.0
2000	529	900	57.9	74.1	66.4	62.9	61.2	55.3	49.7	46.1	16.2
2000	529	915	58.5	71.7	66.3	63.4	61.7	56.4	51.5	47.2	13.2
2000	529	930	58.4	78.8	69.0	62.8	60.8	54.6	48.4	40.8	20.4
2000	529	945	58.6	76.3	70.0	62.6	61.0	55.2	49.3	44.5	17.7
2000	529	1000	57.2	71.1	64.8	62.0	60.1	55.6	51.2	44.6	13.9
2000	529	1015	57.6	74.4	65.6	62.3	60.8	55.4	51.6	45.7	16.8
2000	529	1030	57.5	72.7	64.8	61.9	60.5	56.0	51.0	45.2	15.2
2000	529	1045	58.5	73.9	66.7	62.6	61.0	56.4	52.9	47.7	15.4
2000	529	1100	56.5	68.8	63.5	60.9	59.5	54.6	50.5	45.4	12.3
2000	529	1115	58.7	80.2	66.8	63.1	61.6	56.7	51.5	47.1	21.5
2000	529	1130	57.4	68.4	64.3	62.0	60.4	55.8	52.0	46.1	11.0
2000	529	1145	56.9	76.4	65.3	61.3	59.8	54.7	50.7	45.4	19.5
2000	529	1200	58.0	79.9	65.7	62.0	60.8	54.6	49.4	42.2	21.9
2000	529	1215	57.5	80.9	66.2	62.3	60.5	54.2	48.8	42.3	23.4
2000	529	1230	57.1	76.4	65.9	62.5	60.3	53.9	48.2	43.5	19.3
2000	529	1245	55.6	66.9	62.7	60.2	58.7	54.2	49.1	44.7	11.3
2000	529	1300	59.3	95.1	63.2	63.7	61.7	56.4	52.5	48.5	35.8
2000	529	1315	59.7	86.0	66.3	63.2	61.9	57.9	53.9	46.6	26.3
2000	529	1330	59.9	69.2	66.0	64.2	63.2	58.8	54.1	48.8	9.3
2000	529	1345	59.3	69.7	65.3	63.1	62.2	58.2	54.3	49.6	10.4
2000	529	1400	59.6	71.1	65.4	62.9	62.1	58.5	55.6	52.0	11.5
2000	529	1415	60.3	74.8	67.7	64.7	63.5	58.4	55.0	50.3	14.5
2000	529	1430	59.1	70.5	65.6	63.0	61.9	58.1	54.3	48.8	11.4
2000	529	1445	59.7	87.4	66.3	62.3	60.8	56.6	51.6	45.8	27.7
2000	529	1500	59.2	71.0	66.5	64.1	62.5	57.4	52.6	47.0	11.8
2000	529	1515	59.7	74.2	67.0	64.0	62.6	58.3	54.3	51.4	14.5
2000	529	1530	60.0	94.7	67.1	64.3	63.2	58.9	55.3	51.3	34.7
2000	529	1545	60.0	81.3	67.1	64.4	63.2	59.3	55.9	51.9	21.3
2000	529	1600	59.3	80.9	65.1	62.6	61.7	58.3	55.2	51.4	21.6
2000	529	1615	60.8	91.4	66.5	62.5	61.9	57.2	52.7	48.0	30.6
2000	529	1630	60.4	92.9	65.0	61.9	60.7	56.5	53.1	47.7	32.5
2000	529	1645	58.1	75.0	66.4	63.2	61.5	55.6	52.4	47.7	16.9
2000	529	1700	58.2	86.0	66.8	62.8	60.6	54.6	51.6	47.1	27.8
2000	529	1715	58.0	93.7	67.3	62.3	59.9	54.7	50.9	44.6	35.7
2000	529	1730	57.8	92.6	66.7	61.3	59.7	54.5	51.5	44.6	34.8
2000	529	1745	57.0	90.9	66.1	60.7	58.6	53.4	50.2	44.4	33.9
2000	529	1800	57.0	85.4	65.8	61.1	59.4	54.4	50.3	46.2	28.4
2000	529	1815	56.0	89.1	65.9	59.7	57.7	53.3	48.6	45.3	33.1
2000	529	1830	54.1	77.3	63.2	58.5	56.9	52.5	48.6	44.1	23.2
2000	529	1845	55.0	92.7	63.5	59.0	57.8	53.2	48.9	43.9	37.7
2000	529	1900	55.3	89.8	63.4	59.2	58.0	52.5	48.5	43.7	34.5
2000	529	1915	54.8	89.8	63.8	58.8	57.8	52.9	48.2	43.1	35.0
2000	529	1930	55.2	89.8	63.5	58.5	57.9	53.0	47.5	43.2	34.6
2000	529	1945	55.0	86.4	63.7	58.6	56.4	51.1	46.6	41.8	31.4
2000	529	2000	55.7	87.8	64.3	58.7	56.8	50.8	46.0	42.7	32.1
2000	529	2015	54.3	92.4	63.5	58.5	56.5	50.8	45.6	40.4	38.1
2000	529	2030	54.0	95.5	62.5	58.2	56.4	49.8	44.4	40.5	41.5
2000	529	2045	53.6	87.8	62.2	57.8	55.8	49.5	43.0	39.8	34.2
2000	529	2100	52.3	68.9	61.3	57.7	55.4	49.8	44.5	40.1	16.6
2000	529	2115	53.4	69.5	62.6	60.1	57.6	49.4	44.1	40.6	16.1
2000	529	2130	53.9	71.2	64.6	59.4	56.7	49.7	45.1	41.5	17.3
2000	529	2145	53.7	74.4	65.1	58.7	55.8	48.9	43.3	39.8	20.7
2000	529	2200	53.4	67.0	61.5	59.1	57.4	51.0	44.5	40.2	13.6
2000	529	2215	54.1	76.9	62.9	59.7	57.7	50.1	44.5	40.1	22.8
2000	529	2230	52.5	65.8	62.2	58.1	55.8	49.6	42.8	37.4	13.3
2000	529	2245	52.8	82.9	62.4	58.1	55.8	48.6	43.8	39.6	30.1
2000	529	2300	51.8	68.0	62.1	57.7	55.0	47.9	42.5	39.9	16.2
2000	529	2315	48.7	61.7	57.8	53.9	52.0	46.1	41.3	38.0	13.0
2000	529	2330	48.8	63.6	59.7	54.1	51.9	44.9	40.1	37.2	14.8
2000	529	2345	50.4	68.3	61.8	56.6	52.9	44.4	39.7	35.9	17.9
2000	529	0	50.8	67.7	62.2	57.5	54.3	44.0	37.5	33.2	16.9

DAY 3	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**56.8**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**52.1**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**58.0**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**53.8**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**59.5**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**48.2**	dB(A)

11 Jane Place, Cecil Hills — DAY 4

Tuesday 30 May 2000 — Norsonics S/N 20324

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	529	2215	54.1	76.9	62.9	59.7	57.7	50.1	44.5	40.1	22.8
2000	529	2230	52.5	65.8	62.2	58.1	55.8	49.6	42.8	37.4	13.3
2000	529	2245	52.8	82.9	62.4	58.1	55.8	48.6	43.8	39.6	30.1
2000	529	2300	51.8	68.0	62.1	57.7	55.0	47.9	42.5	39.9	16.2
2000	529	2315	48.7	61.7	57.8	53.9	52.0	46.1	41.3	38.0	13.0
2000	529	2330	48.8	63.6	59.7	54.1	51.9	44.9	40.1	37.2	14.8
2000	529	2345	50.4	68.3	61.8	56.6	52.9	44.4	39.7	35.9	17.9
2000	529	0	50.8	67.7	62.2	57.5	54.3	44.0	37.5	33.2	16.9
2000	530	15	48.5	65.5	60.4	54.4	51.4	41.8	35.2	32.0	17.0
2000	530	30	48.2	68.8	61.5	55.3	53.3	43.0	34.6	29.2	20.6
2000	530	45	47.8	84.3	60.5	55.6	54.9	40.0	33.8	28.5	36.5
2000	530	100	46.4	63.3	58.2	52.9	48.9	39.0	34.4	30.6	16.9
2000	530	115	48.8	65.7	61.2	55.8	51.6	39.3	32.6	28.3	16.9
2000	530	130	52.6	75.8	66.9	57.0	50.4	37.5	32.9	30.0	23.2
2000	530	145	46.7	62.7	58.2	54.0	49.8	38.1	33.5	30.0	16.0
2000	530	200	50.8	71.6	62.9	58.5	53.1	39.5	32.5	27.0	20.8
2000	530	215	50.1	77.5	61.3	54.6	50.9	40.7	35.9	31.7	27.4
2000	530	230	53.0	78.5	63.5	53.4	48.9	40.7	36.9	32.8	25.5
2000	530	245	50.8	71.3	62.6	58.2	53.5	41.4	37.0	31.5	20.5
2000	530	300	53.6	87.1	56.0	51.0	47.5	39.0	33.7	29.1	33.5
2000	530	315	47.9	67.5	61.0	54.5	49.4	39.8	34.0	28.9	19.6
2000	530	330	54.7	79.1	65.9	57.5	54.5	42.6	35.7	31.6	24.4
2000	530	345	51.2	73.4	64.0	56.0	52.4	40.8	35.7	31.0	22.2
2000	530	400	48.6	68.8	59.8	54.1	51.2	40.3	34.1	29.8	20.2
2000	530	415	51.4	69.9	61.7	57.0	54.0	45.1	39.3	33.2	18.5
2000	530	430	54.7	73.7	64.9	60.5	58.5	49.4	42.6	38.0	19.0
2000	530	445	51.5	63.8	61.2	58.4	55.9	46.9	40.5	35.3	12.3
2000	530	500	52.8	78.7	62.1	57.6	55.4	47.7	40.0	33.5	25.9
2000	530	515	56.5	75.6	67.2	61.9	59.0	51.4	45.9	40.9	19.1
2000	530	530	55.5	68.1	64.8	60.7	58.4	52.8	47.8	43.4	12.6
2000	530	545	57.7	71.6	64.6	62.7	61.4	55.6	51.3	45.7	13.9
2000	530	600	57.5	76.6	67.2	62.1	60.1	54.8	50.4	46.3	19.1
2000	530	615	57.8	70.6	66.4	62.3	60.6	55.8	52.4	45.2	12.8
2000	530	630	58.7	67.2	65.5	63.6	62.2	57.0	51.7	48.5	8.5
2000	530	645	60.5	78.3	67.8	65.0	63.6	57.4	52.8	49.5	17.8
2000	530	700	59.3	73.8	67.0	64.5	62.5	57.1	52.5	47.6	14.5
2000	530	715	59.6	79.0	67.4	63.0	61.9	57.2	53.2	50.7	19.4
2000	530	730	61.0	76.3	71.6	65.8	63.5	58.1	53.8	50.6	15.3
2000	530	745	58.6	71.6	65.6	63.1	61.6	57.1	53.2	49.7	13.0
2000	530	800	58.3	71.4	65.2	62.9	61.6	56.5	50.9	48.3	13.1
2000	530	815	59.7	76.0	70.1	65.4	62.3	56.1	50.9	47.2	16.3
2000	530	830	57.6	69.3	66.6	62.9	60.8	55.0	50.7	45.9	11.7
2000	530	845	57.4	73.7	64.2	61.4	60.3	56.1	50.2	45.5	16.3
2000	530	900	58.8	72.2	66.5	63.9	62.4	56.7	51.6	46.1	13.4
2000	530	915	59.4	74.5	67.8	63.9	62.4	57.3	51.9	48.1	15.1
2000	530	930	64.3	87.6	77.1	66.8	63.4	56.1	50.4	46.8	23.3
2000	530	945	57.0	76.6	64.3	61.8	60.2	55.2	51.3	45.3	19.6
2000	530	1000	59.8	87.9	65.3	61.6	60.5	56.4	52.4	46.2	28.1
2000	530	1015	59.3	76.4	66.5	63.3	61.9	57.6	54.2	49.4	17.1
2000	530	1030	58.5	75.1	65.6	62.5	61.1	56.0	51.5	47.6	16.6
2000	530	1045	60.1	77.1	69.7	64.5	62.7	57.8	52.3	45.9	17.0
2000	530	1100	58.6	74.7	65.8	62.8	61.8	56.8	53.1	48.5	16.1
2000	530	1115	59.3	84.9	65.5	63.4	62.3	57.4	51.9	47.0	25.6
2000	530	1130	60.1	86.3	65.7	63.8	62.9	58.8	54.7	49.6	26.2
2000	530	1145	61.2	77.1	71.5	64.4	63.1	58.9	55.8	50.7	15.9
2000	530	1200	60.7	88.0	66.7	64.2	62.7	58.5	54.3	49.5	27.3
2000	530	1215	60.2	73.9	67.3	64.2	63.0	58.8	54.8	50.8	13.7
2000	530	1230	61.0	85.4	70.0	65.5	63.6	58.3	53.7	49.0	24.4
2000	530	1245	59.6	77.2	67.7	63.4	61.9	57.7	54.7	51.0	17.6
2000	530	1300	61.3	87.7	70.5	66.1	63.7	58.3	53.4	48.9	26.4
2000	530	1315	60.1	76.5	70.5	63.7	62.1	57.6	54.0	49.7	16.4
2000	530	1330	59.5	71.0	65.9	63.7	62.4	58.4	53.7	49.1	11.5
2000	530	1345	57.5	69.0	64.3	61.5	60.3	56.3	52.4	48.4	11.5
2000	530	1400	58.0	69.0	64.2	62.0	60.9	56.8	52.6	48.2	11.0
2000	530	1415	58.4	78.6	64.9	62.7	61.2	57.1	53.0	48.9	20.2
2000	530	1430	59.9	75.5	67.7	64.3	62.8	57.9	53.4	48.4	15.6
2000	530	1445	58.9	70.1	65.3	63.0	61.9	57.7	53.5	49.1	11.2
2000	530	1500	63.8	94.0	69.7	63.9	62.1	57.6	53.7	50.0	30.2
2000	530	1515	59.5	78.7	67.7	63.3	61.9	57.6	54.6	50.7	19.2
2000	530	1530	58.5	74.3	66.0	62.9	61.3	57.0	53.3	49.3	15.8
2000	530	1545	59.4	75.0	67.4	63.6	62.2	57.5	53.6	49.8	15.6
2000	530	1600	59.3	76.1	69.1	63.9	61.8	56.8	52.8	47.0	16.8
2000	530	1615	58.3	76.0	66.9	62.2	60.5	56.6	53.4	49.6	17.7
2000	530	1630	59.5	78.8	67.5	63.4	62.0	57.1	53.2	48.3	19.3
2000	530	1645	60.3	77.6	71.5	64.0	61.4	57.0	53.3	50.3	17.3
2000	530	1700	57.8	73.1	65.0	62.1	60.2	56.5	53.9	50.2	15.3
2000	530	1715	58.2	88.0	63.9	61.3	60.1	55.9	52.7	48.1	29.8
2000	530	1730	58.6	84.0	65.7	61.6	60.1	56.1	52.9	49.4	25.4
2000	530	1745	58.2	73.6	66.5	62.4	60.8	56.4	52.7	50.1	15.4
2000	530	1800	59.6	86.5	66.3	62.4	60.2	54.9	52.0	48.6	26.9
2000	530	1815	58.4	78.0	65.5	62.3	60.5	55.8	52.2	49.1	19.6
2000	530	1830	60.7	91.0	65.5	61.0	59.5	55.3	52.0	48.5	30.3
2000	530	1845	56.4	68.5	63.6	60.6	59.2	55.1	51.3	47.4	12.1
2000	530	1900	58.1	76.9	68.9	62.5	60.0	54.8	50.6	46.8	18.8
2000	530	1915	59.1	84.0	66.4	62.0	60.4	54.1	49.6	44.4	24.9
2000	530	1930	54.9	65.8	61.8	59.5	58.2	53.4	49.7	43.8	10.9
2000	530	1945	54.1	71.5	62.5	59.2	57.1	51.7	47.0	43.0	17.4
2000	530	2000	56.7	74.2	68.7	62.2	58.2	51.9	47.0	42.9	17.5
2000	530	2015	54.7	69.8	62.3	58.7	57.1	53.3	49.4	43.7	15.1
2000	530	2030	56.3	73.8	65.4	61.2	59.0	53.6	48.1	43.3	17.5
2000	530	2045	54.7	65.6	62.3	59.5	57.9	53.0	48.3	42.8	10.9
2000	530	2100	55.8	68.3	64.3	61.0	58.8	53.7	49.3	43.3	12.5
2000	530	2115	54.8	66.0	62.6	59.5	57.9	53.3	48.1	43.9	11.2
2000	530	2130	53.6	69.4	62.4	57.7	55.7	51.9	48.3	42.7	15.8
2000	530	2145	54.8	71.5	65.3	60.0	57.3	51.6	47.5	44.1	16.7
2000	530	2200	54.1	72.1	63.2	59.8	57.6	50.7	46.5	43.3	18.0
2000	530	2215	54.5	73.7	63.9	59.9	58.1	50.6	46.4	42.2	19.2
2000	530	2230	54.3	83.5	62.9	58.6	56.6	51.7	47.3	41.8	29.2
2000	530	2245	56.0	69.8	66.0	61.8	59.9	52.2	47.3	42.4	13.8
2000	530	2300	52.4	64.5	60.4	57.7	56.0	50.3	43.9	40.1	12.1
2000	530	2315	53.0	68.8	62.7	58.4	56.0	50.3	42.9	39.2	15.8
2000	530	2330	52.4	64.3	61.1	57.7	55.5	50.1	45.0	40.7	11.9
2000	530	2345	53.6	70.0	64.0	59.8	57.2	49.3	43.5	39.8	16.4
2000	530	0	52.4	72.1	63.8	58.0	54.2	45.9	40.9	38.3	19.7

DAY 4	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**57.8**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**52.4**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**59.1**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**54.0**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**60.5**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**50.2**	dB(A)

11 Jane Place, Cecil Hills											DAY 5
Wednesday 31 May 2000									Norsonics S/N 20324		
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	530	2215	54.5	73.7	63.9	59.9	58.1	50.6	46.4	42.2	19.2
2000	530	2230	54.3	83.5	62.9	58.6	56.6	51.7	47.3	41.8	29.2
2000	530	2245	56.0	69.8	66.0	61.8	59.9	52.2	47.3	42.4	13.8
2000	530	2300	52.4	64.5	60.4	57.7	56.0	50.3	43.9	40.1	12.1
2000	530	2315	53.0	68.8	62.7	58.4	56.0	50.3	42.9	39.2	15.8
2000	530	2330	52.4	64.3	61.1	57.7	55.5	50.1	45.0	40.7	11.9
2000	530	2345	53.6	70.0	64.0	59.8	57.2	49.3	43.5	39.8	16.4
2000	530	0	52.4	72.1	63.8	58.0	54.2	45.9	40.9	38.3	19.7
2000	531	15	48.0	62.7	58.2	53.6	51.6	43.9	39.0	36.5	14.7
2000	531	30	50.0	67.3	60.6	55.9	52.9	44.8	39.6	35.7	17.3
2000	531	45	52.6	79.0	64.5	55.4	53.8	42.6	36.4	33.1	26.4
2000	531	100	53.4	75.9	65.9	57.2	55.8	43.7	35.8	31.5	22.5
2000	531	115	52.7	74.1	66.5	56.8	53.4	42.2	36.0	33.0	21.4
2000	531	130	49.8	62.2	60.5	57.6	54.5	42.8	35.8	32.0	12.4
2000	531	145	51.5	70.8	63.7	58.2	54.2	41.2	33.5	28.4	19.3
2000	531	200	46.8	64.6	57.3	53.0	50.3	40.1	33.9	30.3	17.8
2000	531	215	48.9	78.9	57.7	53.1	50.6	38.3	34.3	31.9	30.0
2000	531	230	51.7	69.9	61.4	54.6	53.2	40.9	35.8	32.5	18.2
2000	531	245	48.9	65.4	60.7	55.1	52.3	41.9	36.1	33.4	16.5
2000	531	300	52.8	82.8	61.8	58.0	54.9	44.9	41.0	37.0	30.0
2000	531	315	52.6	69.8	63.6	59.4	56.4	45.7	41.4	36.7	17.2
2000	531	330	49.3	66.4	59.0	55.7	53.3	43.0	38.2	35.3	17.1
2000	531	345	54.1	72.1	65.0	60.4	58.2	47.5	42.0	37.4	18.0
2000	531	400	49.2	66.8	62.5	55.1	51.6	40.5	37.2	34.6	17.6
2000	531	415	47.8	60.8	57.3	54.0	51.0	44.1	40.6	38.1	13.0
2000	531	430	52.2	65.7	61.1	58.4	56.4	48.5	42.9	38.8	13.5
2000	531	445	54.8	69.2	63.3	60.2	58.5	51.5	44.1	40.0	14.4
2000	531	500	54.3	66.2	62.9	60.4	58.3	50.1	44.9	40.7	11.9
2000	531	515	55.3	71.5	65.8	60.1	58.4	51.8	45.3	41.0	16.2
2000	531	530	56.8	69.3	64.2	61.5	59.9	55.1	50.4	43.8	12.5
2000	531	545	56.7	69.7	63.5	60.6	59.5	55.5	50.6	46.3	13.0
2000	531	600	57.1	78.2	63.5	60.6	59.4	55.6	50.4	45.9	21.1
2000	531	615	58.5	71.4	66.4	63.1	61.5	56.4	53.0	47.7	12.9
2000	531	630	59.2	70.5	67.5	64.1	62.4	57.2	53.2	49.7	11.3
2000	531	645	60.4	74.5	69.2	65.1	63.2	58.3	53.6	49.5	14.1
2000	531	700	60.8	73.9	69.8	65.5	63.9	58.7	54.2	50.5	13.1
2000	531	715	59.9	72.6	68.4	64.9	63.1	57.4	53.5	48.7	12.7
2000	531	730	58.9	69.6	66.6	63.9	62.6	56.5	52.3	49.9	10.7
2000	531	745	58.5	70.2	64.8	62.7	61.6	57.3	52.9	49.1	11.7
2000	531	800	57.9	73.2	64.8	62.4	61.1	56.1	51.6	48.5	15.3
2000	531	815	58.5	70.5	65.9	63.2	61.5	56.8	52.5	49.1	12.0
2000	531	830	57.9	71.7	64.3	62.3	61.1	56.6	52.1	47.7	13.8
2000	531	845	58.8	74.0	68.6	63.4	60.9	56.4	52.4	48.7	15.2
2000	531	900	59.8	78.3	68.7	64.9	63.1	56.7	51.6	46.6	18.5
2000	531	915	59.2	76.0	69.4	63.3	61.3	56.1	51.6	46.1	16.8
2000	531	930	58.0	75.3	65.6	62.4	60.8	56.3	51.8	45.9	17.3
2000	531	945	59.3	76.0	68.4	64.3	62.1	56.7	52.4	47.3	16.7
2000	531	1000	58.7	77.7	68.3	62.3	61.0	55.9	52.1	47.8	19.0
2000	531	1015	61.0	87.4	68.6	63.9	62.3	57.7	53.3	48.3	26.4
2000	531	1030	62.0	89.4	68.3	64.1	62.0	57.5	52.9	47.0	27.4
2000	531	1045	59.4	74.6	67.0	63.9	62.3	57.7	52.8	46.6	15.2
2000	531	1100	59.4	72.1	65.9	63.2	62.2	58.4	53.9	49.4	12.7
2000	531	1115	60.1	86.8	65.3	63.2	62.3	57.8	53.5	48.9	26.7
2000	531	1130	60.8	83.6	68.9	64.7	63.2	58.6	54.4	49.9	22.8
2000	531	1145	60.8	88.6	67.6	64.2	62.9	58.7	55.0	50.4	27.8
2000	531	1200	60.0	85.9	67.4	63.8	62.4	58.2	54.3	50.2	25.9
2000	531	1215	59.8	86.8	65.1	63.0	62.0	58.0	53.2	46.8	27.0
2000	531	1230	59.3	78.4	68.4	62.7	61.4	56.7	52.4	47.3	19.1
2000	531	1245	60.3	86.1	69.8	65.3	63.2	57.1	52.4	44.7	25.8
2000	531	1300	58.4	72.7	67.3	62.8	61.1	56.4	50.8	43.7	14.3
2000	531	1315	59.0	72.4	66.9	63.6	62.2	57.0	52.8	48.5	13.4
2000	531	1330	58.3	76.9	65.9	62.3	61.1	55.9	50.7	45.6	18.6
2000	531	1345	59.2	75.6	67.0	63.7	62.3	57.1	53.4	47.2	16.4
2000	531	1400	58.1	72.6	67.3	62.1	60.6	56.1	52.6	43.9	14.5
2000	531	1415	58.1	70.9	64.7	62.6	61.2	56.7	52.7	49.5	12.8
2000	531	1430	58.3	80.8	65.9	63.0	61.0	56.3	51.8	47.8	22.5
2000	531	1445	58.9	92.9	65.2	63.5	61.5	57.2	52.5	47.5	34.0
2000	531	1500	58.2	83.8	65.3	63.2	60.8	56.7	52.9	49.2	25.6
2000	531	1515	57.9	70.2	64.9	62.4	60.9	56.6	52.6	47.8	12.3
2000	531	1530	57.8	73.0	66.8	62.0	60.1	55.7	52.4	48.0	15.2
2000	531	1545	58.7	76.5	69.6	62.2	60.8	56.0	51.7	47.8	17.8
2000	531	1600	61.1	89.9	66.3	62.2	60.9	57.2	54.2	49.9	28.8
2000	531	1615	57.7	81.6	63.9	60.8	59.7	56.3	52.1	47.8	23.9
2000	531	1630	58.0	85.3	63.9	61.0	59.7	55.7	51.7	47.2	27.3
2000	531	1645	58.7	73.1	67.2	63.4	62.0	56.6	52.1	46.6	14.4
2000	531	1700	57.6	75.8	66.5	62.0	60.0	55.8	52.1	48.7	18.2
2000	531	1715	57.7	68.2	64.5	62.3	61.0	56.2	52.9	49.4	10.5
2000	531	1730	57.1	73.4	64.6	61.5	59.7	55.6	52.0	47.6	16.3
2000	531	1745	57.8	82.4	65.3	62.4	59.5	54.3	50.6	45.8	24.6
2000	531	1800	57.0	84.7	65.1	63.3	61.0	55.2	51.5	45.1	27.7
2000	531	1815	56.8	73.8	65.3	60.9	59.1	54.9	51.5	46.3	17.0
2000	531	1830	57.8	75.4	68.6	62.1	60.4	55.2	51.0	46.1	17.6
2000	531	1845	58.0	78.0	68.5	61.8	60.2	54.1	49.8	45.1	20.0
2000	531	1900	57.3	78.8	68.2	61.4	58.8	54.2	49.8	44.5	21.5
2000	531	1915	55.4	71.9	61.9	59.7	58.0	54.2	50.4	46.5	16.5
2000	531	1930	57.4	78.2	67.4	61.1	59.0	53.6	49.8	44.6	20.8
2000	531	1945	57.3	71.5	67.2	62.3	60.2	54.6	50.3	45.5	14.2
2000	531	2000	56.1	70.5	64.8	60.7	59.0	54.0	49.4	43.8	14.4
2000	531	2015	56.5	76.5	64.4	60.3	58.4	53.7	49.9	45.2	20.0
2000	531	2030	55.2	72.0	63.1	59.9	58.0	52.8	47.2	42.5	16.8
2000	531	2045	57.1	73.1	66.9	62.9	60.8	53.8	48.9	44.0	16.0
2000	531	2100	56.6	73.9	68.9	60.9	57.9	52.6	47.3	42.8	17.3
2000	531	2115	55.3	78.5	63.6	60.3	58.5	52.4	48.3	43.7	23.2
2000	531	2130	53.9	74.0	62.0	58.5	56.5	52.0	47.3	41.5	20.1
2000	531	2145	55.3	85.0	63.8	59.2	57.5	51.9	47.1	42.2	29.7
2000	531	2200	53.8	77.5	60.8	57.9	56.4	51.4	46.8	42.1	23.7
2000	531	2215	53.8	72.7	62.5	58.8	56.9	51.4	47.0	41.7	18.9
2000	531	2230	52.3	75.9	61.1	55.9	54.0	49.7	45.4	39.3	23.6
2000	531	2245	54.7	72.4	63.9	59.9	57.7	51.9	45.2	39.6	17.7
2000	531	2300	53.2	73.6	60.9	58.3	56.7	50.6	45.5	41.0	20.4
2000	531	2315	52.5	65.8	60.8	57.4	55.7	50.1	46.0	42.2	13.3
2000	531	2330	52.5	66.4	60.8	58.1	56.2	50.0	44.7	38.4	13.9
2000	531	2345	53.6	69.1	64.5	59.8	56.0	49.4	43.6	38.5	15.5
2000	531	0	52.2	65.2	61.5	58.5	56.3	48.3	41.8	36.8	13.0

DAY 5	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**57.4**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**53.0**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**58.5**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**54.6**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**60.3**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**50.6**	dB(A)

11 Jane Place, Cecil Hills — DAY 6

Thursday 1 June 2000 — Norsonics S/N 20324

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	531	2215	53.8	72.7	62.5	58.8	56.9	51.4	47.0	41.7	18.9
2000	531	2230	52.3	75.9	61.1	55.9	54.0	49.7	45.4	39.3	23.6
2000	531	2245	54.7	72.4	63.9	59.9	57.7	51.9	45.2	39.6	17.7
2000	531	2300	53.2	73.6	60.9	58.3	56.7	50.6	45.5	41.0	20.4
2000	531	2315	52.5	65.8	60.8	57.4	55.7	50.1	46.0	42.2	13.3
2000	531	2330	52.5	66.4	60.8	58.1	56.2	50.0	44.7	38.4	13.9
2000	531	2345	53.6	69.1	64.5	59.8	56.0	49.4	43.6	38.5	15.5
2000	531	0	52.2	65.2	61.5	58.5	56.3	48.3	41.8	36.8	13.0
2000	601	15	48.1	61.2	57.8	53.3	51.7	45.3	37.9	33.3	13.1
2000	601	30	49.0	63.8	58.7	55.2	52.5	45.2	38.0	33.9	14.8
2000	601	45	48.9	63.8	60.1	54.8	52.0	44.3	37.4	31.2	14.9
2000	601	100	51.7	70.4	61.6	57.9	55.0	46.1	38.5	31.9	18.7
2000	601	115	49.8	69.7	60.7	56.1	51.6	42.1	35.9	31.2	19.9
2000	601	130	50.2	70.1	62.8	55.4	50.8	42.7	36.7	31.2	19.9
2000	601	145	49.6	65.3	61.8	56.6	53.2	41.8	33.6	29.8	15.7
2000	601	200	49.5	63.4	61.4	57.0	52.4	42.1	35.3	27.7	13.9
2000	601	215	50.9	69.0	63.8	56.6	53.1	43.2	30.9	26.8	18.1
2000	601	230	49.4	67.1	60.5	55.5	52.8	42.4	34.4	28.0	17.7
2000	601	245	52.2	71.2	63.4	58.9	55.5	44.7	38.9	31.3	19.0
2000	601	300	50.6	66.0	60.9	58.2	55.2	43.7	35.6	30.1	15.4
2000	601	315	47.5	62.3	57.9	54.6	51.1	41.7	34.1	29.3	14.8
2000	601	330	53.5	74.2	63.1	58.9	56.5	46.8	40.8	34.7	20.7
2000	601	345	50.7	73.7	62.0	56.9	54.3	44.4	38.5	35.2	23.0
2000	601	400	49.4	65.2	61.2	56.8	52.5	42.1	35.7	32.1	15.8
2000	601	415	51.5	74.0	63.2	57.2	54.7	42.7	36.7	32.9	22.5
2000	601	430	56.1	77.0	66.5	60.6	57.6	50.1	43.8	39.4	20.9
2000	601	445	55.0	73.5	64.4	60.8	58.7	50.6	45.5	42.0	18.5
2000	601	500	54.8	69.0	64.2	60.8	59.1	50.8	45.0	38.3	14.2
2000	601	515	55.8	71.0	65.5	62.2	59.1	52.3	47.1	41.8	15.2
2000	601	530	59.0	82.8	70.3	61.9	60.2	55.6	50.8	44.5	23.8
2000	601	545	58.3	69.6	64.6	62.3	61.1	57.2	53.6	47.5	11.3
2000	601	600	58.7	71.6	65.6	63.0	61.7	57.4	52.8	49.3	12.9
2000	601	615	59.1	76.2	66.0	63.1	61.8	57.4	53.7	49.8	17.1
2000	601	630	58.4	69.5	65.1	62.7	61.3	57.2	53.8	50.4	11.1
2000	601	645	61.0	73.4	69.3	66.1	64.4	58.6	54.0	51.5	12.4
2000	601	700	59.3	70.8	67.7	64.2	62.4	57.1	52.9	48.6	11.5
2000	601	715	59.0	75.9	66.2	63.4	62.2	57.1	52.5	49.5	16.9
2000	601	730	60.0	71.6	68.8	65.2	63.2	57.9	53.4	50.4	11.6
2000	601	745	58.2	72.6	65.5	62.9	61.3	56.2	52.6	49.7	14.4
2000	601	800	58.9	72.6	66.4	63.4	62.2	56.5	52.9	49.7	13.7
2000	601	815	60.8	84.1	72.1	64.2	62.4	56.8	52.2	49.0	23.3
2000	601	830	58.8	70.5	65.9	63.5	62.2	57.0	52.8	49.6	11.7
2000	601	845	58.3	70.3	67.2	63.2	61.5	56.1	51.4	46.1	12.0
2000	601	900	58.6	76.2	67.5	64.0	61.9	55.8	50.8	47.4	17.6
2000	601	915	59.1	72.0	66.5	64.1	62.8	57.0	51.6	48.0	12.9
2000	601	930	58.0	73.7	65.8	62.0	60.8	56.4	51.6	45.9	15.7
2000	601	945	57.4	72.8	66.6	61.7	60.3	55.4	49.1	43.2	15.4
2000	601	1000	57.5	75.1	66.5	62.4	60.1	55.1	50.5	42.1	17.6
2000	601	1015	57.9	83.3	65.4	62.8	60.9	54.2	49.5	43.8	25.4
2000	601	1030	57.2	71.6	65.6	61.9	60.5	55.3	49.4	42.9	14.4
2000	601	1045	57.4	69.1	63.9	62.1	60.6	56.2	51.3	43.7	11.7
2000	601	1100	58.2	75.9	68.0	63.8	61.0	55.2	50.2	44.2	17.7
2000	601	1115	59.1	80.1	68.7	64.1	61.9	56.3	50.5	43.3	21.0
2000	601	1130	58.5	76.2	69.0	62.5	61.0	55.6	51.1	45.4	17.7
2000	601	1145	59.9	79.0	69.5	64.6	62.4	56.8	52.0	43.7	19.1
2000	601	1200	56.5	66.1	63.0	61.2	59.8	54.9	49.8	42.9	9.6
2000	601	1215	59.2	71.9	68.3	64.5	62.7	56.4	50.9	44.0	12.7
2000	601	1230	58.6	77.0	69.1	64.4	61.4	54.3	49.7	45.1	18.4
2000	601	1245	59.5	74.2	69.4	65.3	62.6	56.4	50.9	45.8	14.7
2000	601	1300	58.3	70.4	66.8	63.6	61.9	56.0	50.9	43.1	12.1
2000	601	1315	57.3	69.5	66.3	62.8	60.8	54.4	49.0	42.8	12.2
2000	601	1330	56.5	73.0	65.3	61.1	59.5	54.1	48.6	42.7	16.5
2000	601	1345	56.3	70.7	64.9	61.3	59.2	53.8	48.9	44.5	14.4
2000	601	1400	58.3	70.2	66.2	63.2	61.8	56.7	49.7	43.3	11.9
2000	601	1415	58.2	76.3	66.5	62.5	60.4	55.3	51.0	46.9	18.1
2000	601	1430	59.5	74.2	69.4	65.4	62.9	55.9	49.8	41.7	14.7
2000	601	1445	60.7	91.0	67.4	62.5	60.5	55.1	50.6	44.3	30.3
2000	601	1500	57.0	68.0	64.9	62.2	60.6	54.7	50.2	42.3	11.0
2000	601	1515	57.3	70.9	66.1	62.0	60.3	55.1	50.1	41.4	13.6
2000	601	1530	56.7	82.3	63.5	60.8	59.3	54.2	50.8	46.6	25.6
2000	601	1545	57.3	80.5	64.8	61.3	60.9	55.4	51.0	47.0	23.2
2000	601	1600	58.0	73.8	67.0	62.9	61.0	55.4	51.6	47.1	15.8
2000	601	1615	58.0	78.9	65.3	62.5	60.9	55.4	51.2	46.4	20.9
2000	601	1630	58.4	80.8	65.7	61.7	60.1	55.5	52.3	45.8	22.4
2000	601	1645	58.8	81.8	66.2	61.4	61.2	55.8	50.8	46.3	23.0
2000	601	1700	58.8	82.5	66.1	61.0	59.8	55.4	51.5	45.9	23.7
2000	601	1715	58.5	79.1	65.4	61.8	60.0	55.3	51.6	45.8	20.6
2000	601	1730	57.0	76.1	64.5	60.6	59.2	55.8	52.3	47.5	19.1
2000	601	1745	56.6	73.7	64.2	60.4	58.8	55.1	52.0	47.1	17.1
2000	601	1800	58.4	75.0	68.0	62.3	60.7	56.4	52.7	47.1	16.6
2000	601	1815	59.8	86.3	67.1	63.0	61.4	56.9	51.7	46.7	26.5
2000	601	1830	58.8	86.0	64.3	61.9	60.7	56.8	52.2	45.0	27.2
2000	601	1845	57.7	67.5	63.8	62.0	60.8	56.6	52.9	48.8	9.8
2000	601	1900	58.1	86.7	64.7	61.5	59.9	56.0	52.0	47.0	28.6
2000	601	1915	55.4	65.5	62.7	59.6	58.4	54.3	48.2	43.2	10.1
2000	601	1930	56.2	73.2	63.5	60.4	58.7	54.6	50.3	44.6	17.0
2000	601	1945	55.9	67.4	62.9	60.3	59.3	54.4	49.5	44.1	11.5
2000	601	2000	56.3	72.7	64.1	60.9	59.2	54.3	49.4	43.7	16.4
2000	601	2015	57.2	77.8	63.9	58.8	57.8	53.6	48.0	41.8	20.6
2000	601	2030	55.3	81.1	63.4	60.0	58.3	52.4	47.7	43.6	25.8
2000	601	2045	56.9	85.5	65.0	60.4	57.6	52.5	47.8	42.1	28.6
2000	601	2100	54.9	67.3	62.5	59.7	57.8	53.2	49.0	41.4	12.4
2000	601	2115	56.0	75.5	65.2	60.2	57.9	53.3	47.8	42.9	19.5
2000	601	2130	53.8	65.8	61.1	58.5	56.5	52.5	48.6	42.7	12.0
2000	601	2145	54.2	73.3	62.1	59.0	57.2	52.1	48.4	44.3	19.1
2000	601	2200	54.1	71.5	62.1	58.5	56.8	51.9	48.5	44.0	17.4
2000	601	2215	54.7	69.0	64.3	59.5	57.5	52.2	46.7	41.7	14.3
2000	601	2230	54.8	67.2	63.2	59.8	58.1	52.6	47.8	42.8	12.4
2000	601	2245	54.7	66.5	63.0	59.9	58.1	52.3	47.6	42.5	11.8
2000	601	2300	55.2	73.7	65.3	60.6	57.3	52.0	46.9	42.0	18.5
2000	601	2315	53.7	63.4	60.7	58.7	57.3	52.0	45.6	41.1	9.7
2000	601	2330	52.6	72.9	61.3	58.0	55.9	50.0	43.6	40.1	20.3
2000	601	2345	52.5	63.8	61.2	58.6	56.5	49.9	43.3	38.5	11.3
2000	601	0	53.1	78.5	64.9	57.5	54.3	47.4	39.7	35.8	25.4

DAY 6	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**57.1**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**53.4**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**58.0**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**54.8**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**60.1**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**48.6**	dB(A)

11 Jane Place, Cecil Hills — DAY 7

Friday 2 June 2000 — Norsonics S/N 20324

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	Lmin	Lmax - Leq
2000	601	2215	54.7	69.0	64.3	59.5	57.5	52.2	46.7	41.7	14.3
2000	601	2230	54.8	67.2	63.2	59.8	58.1	52.6	47.8	42.8	12.4
2000	601	2245	54.7	66.5	63.0	59.9	58.1	52.3	47.6	42.5	11.8
2000	601	2300	55.2	73.7	65.3	60.6	57.3	52.0	46.9	42.0	18.5
2000	601	2315	53.7	63.4	60.7	58.7	57.3	52.0	45.6	41.1	9.7
2000	601	2330	52.6	72.9	61.3	58.0	55.9	50.0	43.6	40.1	20.3
2000	601	2345	52.5	63.8	61.2	58.6	56.5	49.9	43.3	38.5	11.3
2000	601	0	53.1	78.5	64.9	57.5	54.3	47.4	39.7	35.8	25.4
2000	602	15	55.6	83.8	64.3	59.0	55.6	48.0	41.3	35.7	28.2
2000	602	30	50.6	70.8	62.7	55.8	52.6	45.4	38.1	32.7	20.2
2000	602	45	50.4	64.6	61.2	56.8	53.5	46.0	38.4	33.3	14.2
2000	602	100	48.7	70.1	60.8	51.9	49.7	42.0	35.1	30.7	21.4
2000	602	115	52.5	76.2	61.3	57.3	54.3	45.7	36.5	32.4	23.7
2000	602	130	50.6	65.1	60.5	57.4	55.4	45.2	37.8	32.7	14.5
2000	602	145	51.4	69.3	62.3	58.4	55.0	44.2	37.9	34.5	17.9
2000	602	200	51.2	68.8	62.5	57.7	54.8	43.3	37.8	35.1	17.6
2000	602	215	48.6	62.7	58.5	55.3	52.6	44.2	39.4	34.5	14.1
2000	602	230	53.4	73.4	63.7	59.6	57.3	45.3	40.0	37.3	20.0
2000	602	245	48.1	66.1	60.8	53.7	49.4	42.0	39.2	36.3	18.0
2000	602	300	52.6	67.9	64.0	60.2	57.1	44.4	40.0	37.1	15.3
2000	602	315	50.6	65.9	61.3	57.8	54.4	44.5	37.2	34.7	15.3
2000	602	330	55.6	76.6	69.9	59.2	55.7	45.8	39.0	34.9	21.0
2000	602	345	50.5	70.5	59.9	55.9	53.9	45.0	38.8	35.0	20.0
2000	602	400	53.3	71.9	65.3	58.2	56.1	47.4	41.0	36.7	18.6
2000	602	415	53.0	70.3	63.2	59.5	57.0	47.6	40.6	36.5	17.3
2000	602	430	54.2	66.5	62.9	60.7	58.9	49.3	42.4	34.5	12.3
2000	602	445	56.4	75.0	67.4	61.3	59.4	51.1	44.2	39.6	18.6
2000	602	500	54.5	68.4	63.9	60.2	58.3	50.4	43.4	38.7	13.9
2000	602	515	56.2	68.6	65.0	61.4	59.8	53.5	48.2	42.4	12.4
2000	602	530	57.3	74.9	66.0	61.5	59.9	55.1	51.2	45.9	17.6
2000	602	545	58.0	70.2	65.6	62.5	60.8	56.7	52.9	48.1	12.2
2000	602	600	58.5	70.5	66.4	62.8	61.3	57.0	52.2	47.5	12.0
2000	602	615	58.7	70.2	66.5	62.6	61.2	57.3	54.0	50.1	11.5
2000	602	630	59.2	76.8	67.4	62.3	61.2	57.7	53.7	49.7	17.6
2000	602	645	58.7	69.8	66.3	63.0	61.6	57.2	53.1	49.8	11.1
2000	602	700	59.5	75.0	65.7	63.6	62.5	58.5	53.6	50.4	15.5
2000	602	715	59.3	71.4	67.1	64.3	62.7	57.4	52.8	50.2	12.1
2000	602	730	60.0	79.4	67.9	64.0	62.6	58.0	54.0	50.9	19.4
2000	602	745	58.7	69.4	65.4	63.4	62.2	57.2	52.3	49.6	10.7
2000	602	800	58.8	72.5	67.6	63.2	61.8	56.8	52.3	49.3	13.7
2000	602	815	60.9	76.3	70.8	65.7	63.8	57.8	53.9	50.1	15.4
2000	602	830	59.6	72.8	67.8	64.6	62.8	57.7	53.5	50.9	13.2
2000	602	845	58.6	82.5	65.0	62.7	61.4	57.0	52.9	50.6	23.9
2000	602	900	60.4	87.5	66.4	63.9	62.8	58.3	53.4	49.1	27.1
2000	602	915	58.4	82.9	64.9	62.6	61.3	56.6	50.4	44.1	24.5
2000	602	930	59.5	88.0	66.5	62.9	61.7	57.7	54.1	49.3	28.5
2000	602	945	60.5	85.1	67.5	64.3	63.0	57.8	53.3	48.8	24.6
2000	602	1000	59.7	85.1	65.8	62.6	61.4	57.6	53.3	46.7	25.4
2000	602	1015	60.2	87.7	65.7	63.0	61.7	58.2	54.2	49.8	27.5
2000	602	1030	60.2	85.2	67.5	63.9	62.5	58.1	53.7	49.0	25.0
2000	602	1045	60.5	86.0	68.5	64.5	63.0	57.8	53.7	48.5	25.5
2000	602	1100	58.4	68.7	64.5	62.3	61.2	57.5	52.4	47.8	10.3
2000	602	1115	60.7	86.8	67.3	63.8	62.5	59.0	54.4	48.9	26.1
2000	602	1130	61.9	87.6	68.0	64.7	63.3	59.0	55.0	50.7	25.7
2000	602	1145	60.2	88.5	66.7	63.9	62.3	57.9	53.8	48.7	28.3
2000	602	1200	61.5	88.3	68.7	65.0	63.2	58.9	54.6	49.2	26.8
2000	602	1215	63.3	88.2	73.8	64.6	63.0	58.8	55.1	49.9	24.9
2000	602	1230	60.7	88.5	66.5	63.6	62.4	58.3	53.9	50.5	27.8
2000	602	1245	60.9	84.5	68.0	64.7	63.0	57.9	52.6	47.1	23.6
2000	602	1300	59.0	69.2	66.6	63.1	62.1	57.6	53.1	47.7	10.2
2000	602	1315	59.8	88.0	65.2	62.7	61.3	57.3	53.7	47.3	28.2
2000	602	1330	60.1	87.3	68.5	64.3	62.5	57.6	52.9	47.5	27.2
2000	602	1345	58.9	81.1	65.2	62.8	61.5	57.8	53.4	45.9	22.2
2000	602	1400	59.1	87.4	64.7	62.5	61.4	57.6	52.7	49.3	28.3
2000	602	1415	60.6	86.6	66.4	63.8	62.6	58.4	54.0	47.1	26.0
2000	602	1430	61.3	88.3	67.0	64.1	62.6	58.7	53.6	48.1	27.0
2000	602	1445	61.9	85.2	71.1	65.9	63.9	58.8	55.5	50.6	23.3
2000	602	1500	58.9	80.7	65.4	62.4	61.4	57.9	54.6	50.7	21.8
2000	602	1515	58.9	77.3	65.8	62.6	61.7	57.0	54.4	49.9	18.4
2000	602	1530	59.1	86.3	66.1	62.5	61.2	56.7	54.0	51.0	27.2
2000	602	1545	59.5	82.8	67.9	63.3	61.8	57.6	54.1	49.0	23.3
2000	602	1600	59.4	72.2	67.7	64.4	62.5	57.5	53.4	50.2	12.8
2000	602	1615	60.7	93.5	66.4	62.6	60.6	56.0	51.8	48.1	32.8
2000	602	1630	58.8	78.6	67.0	62.2	60.7	55.8	52.4	48.4	19.8
2000	602	1645	58.3	86.0	64.5	61.8	60.5	56.6	51.9	46.9	27.7
2000	602	1700	60.5	87.1	68.6	62.1	60.6	56.8	53.2	47.1	26.6
2000	602	1715	58.8	87.0	64.3	61.7	60.3	56.5	53.6	49.3	28.2
2000	602	1730	57.3	79.2	65.4	61.5	59.9	54.9	52.0	46.2	21.9
2000	602	1745	57.0	84.6	64.7	60.0	58.9	54.9	51.7	48.1	27.6
2000	602	1800	57.3	74.4	67.0	61.8	59.5	54.9	51.8	48.9	17.1
2000	602	1815	57.0	78.8	62.8	60.3	59.3	55.8	52.1	47.1	21.8
2000	602	1830	57.6	76.8	63.2	60.7	59.0	54.7	50.8	45.1	19.2
2000	602	1845	57.9	75.8	63.5	61.6	59.9	55.0	51.6	48.0	17.9
2000	602	1900	57.5	82.2	64.8	61.3	59.4	54.8	51.2	46.6	24.7
2000	602	1915	56.0	68.9	62.8	60.5	58.7	54.8	51.1	47.0	12.9
2000	602	1930	56.0	74.6	62.4	59.4	58.1	54.6	51.4	46.2	18.6
2000	602	1945	56.4	84.5	62.4	59.7	58.6	54.7	51.1	47.6	28.1
2000	602	2000	56.5	72.4	66.1	60.8	58.6	54.3	50.1	44.6	15.9
2000	602	2015	58.2	85.0	65.1	60.6	58.8	54.1	50.6	45.9	26.8
2000	602	2030	55.2	81.3	62.2	59.0	57.5	53.7	49.1	44.5	26.1
2000	602	2045	56.0	82.7	63.3	59.4	57.8	53.5	50.5	46.4	26.7
2000	602	2100	54.3	73.1	63.6	57.9	55.9	52.1	48.3	43.5	18.8
2000	602	2115	55.2	78.6	64.3	58.3	56.3	52.5	48.8	43.8	23.4
2000	602	2130	55.1	79.0	65.9	58.0	55.9	51.8	47.7	42.7	23.9
2000	602	2145	54.3	69.8	64.0	58.5	56.8	52.2	47.9	42.3	15.5
2000	602	2200	53.7	66.7	61.1	58.9	56.8	52.1	46.5	43.4	13.0
2000	602	2215	53.6	66.7	63.3	58.6	56.0	51.4	47.0	42.7	13.1
2000	602	2230	54.8	69.0	64.1	59.9	58.1	52.0	47.8	43.0	14.2
2000	602	2245	53.1	65.4	61.3	57.3	55.8	51.6	46.3	38.9	12.3
2000	602	2300	54.2	66.5	62.4	58.9	56.9	52.4	49.0	43.0	12.3
2000	602	2315	53.9	64.8	62.2	58.9	57.0	52.1	47.4	41.9	10.9
2000	602	2330	52.5	62.1	59.1	56.7	55.6	51.1	46.7	43.5	9.6
2000	602	2345	51.9	66.9	60.2	55.7	54.4	50.1	45.5	41.1	15.0
2000	602	0	54.7	72.3	66.8	58.5	55.2	50.5	45.4	40.6	17.6

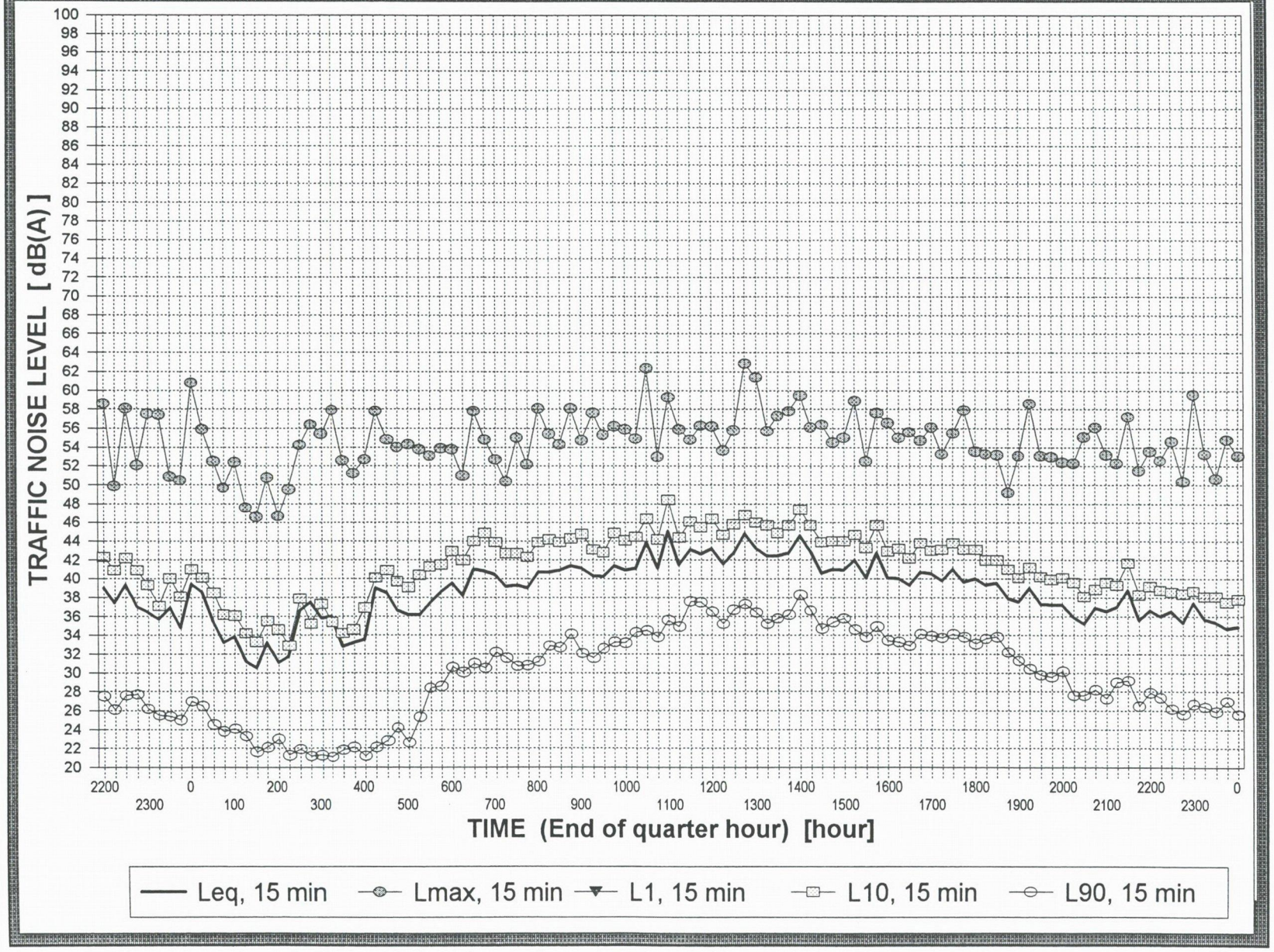
DAY 7	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	**Leq, 24 hours**	between 00:00 and 24:00 hours	**58.0**	dB(A)
Night Time	**Leq, 8 hours**	between 22:00 and 06:00 hours	**53.9**	dB(A)
Daytime	**Leq, 15 hours**	between 07:00 and 22:00 hours	**59.2**	dB(A)
Night Time	**Leq, 9 hours**	between 22:00 and 07:00 hours	**55.0**	dB(A)
Daytime	**L10, 18 hours**	between 06:00 and 24:00 hours	**60.4**	dB(A)
Daytime	**minimum L90, 15 min**	between 07:00 and 18:00 hours	**50.4**	dB(A)

John The Baptist Primary School - Portable Building

DAY 1

Saturday 27 May 2000

RION NL14



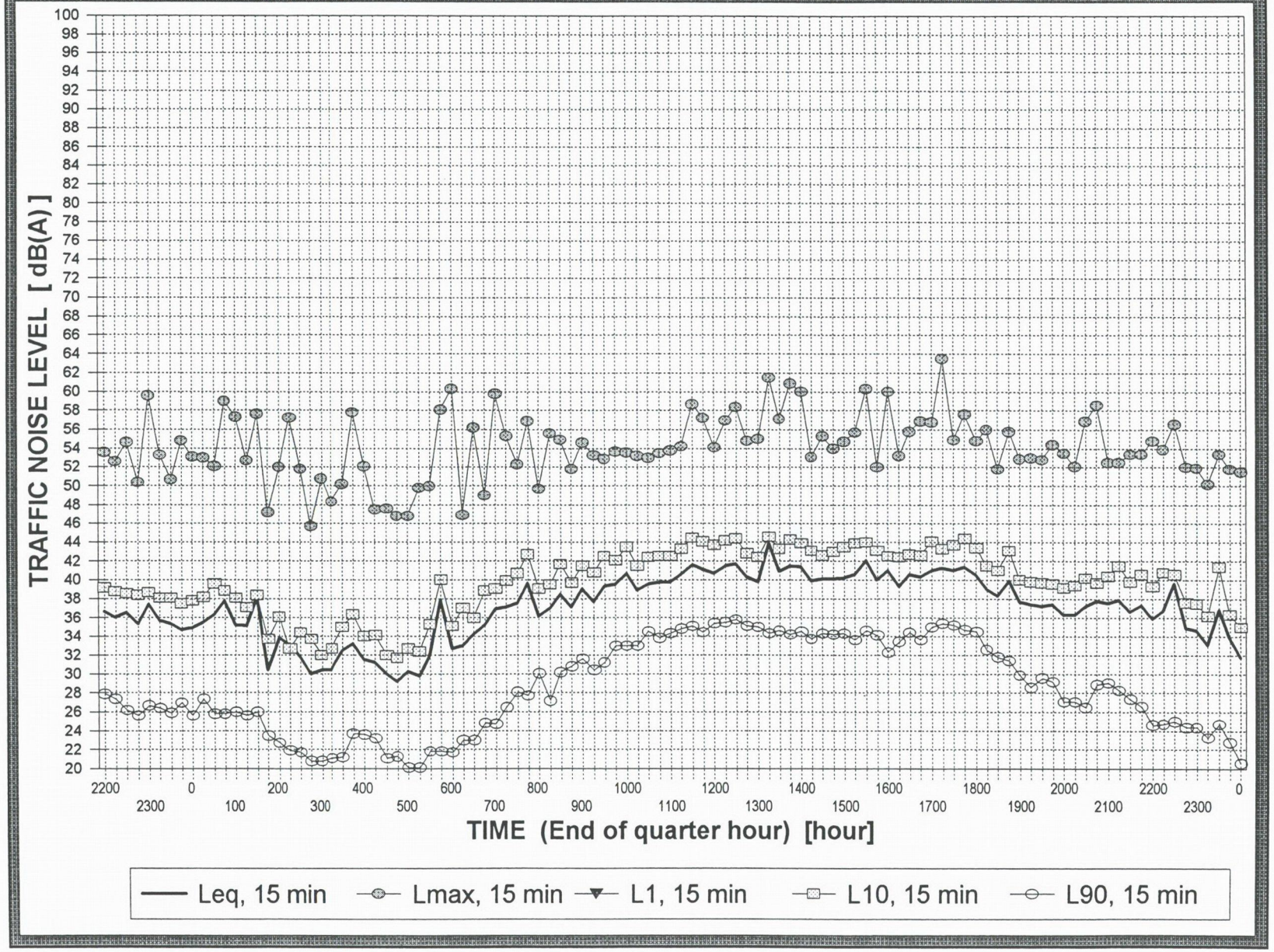
KOIKAS ACOUSTICS PTY LTD

John The Baptist Primary School - Portable Building

DAY 2

Sunday 28 May 2000

RION NL14



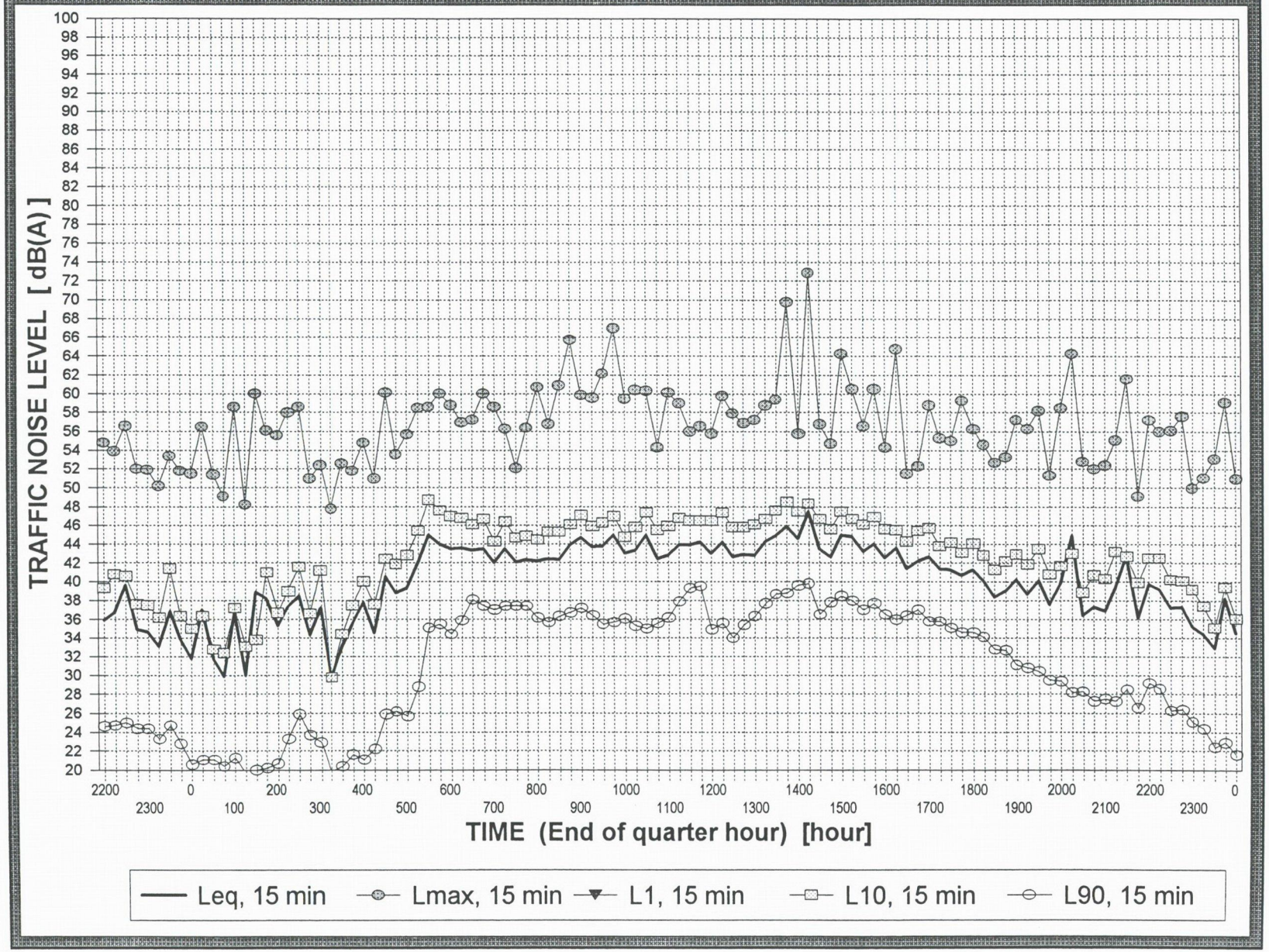
KOIKAS ACOUSTICS PTY LTD

John The Baptist Primary School - Portable Building

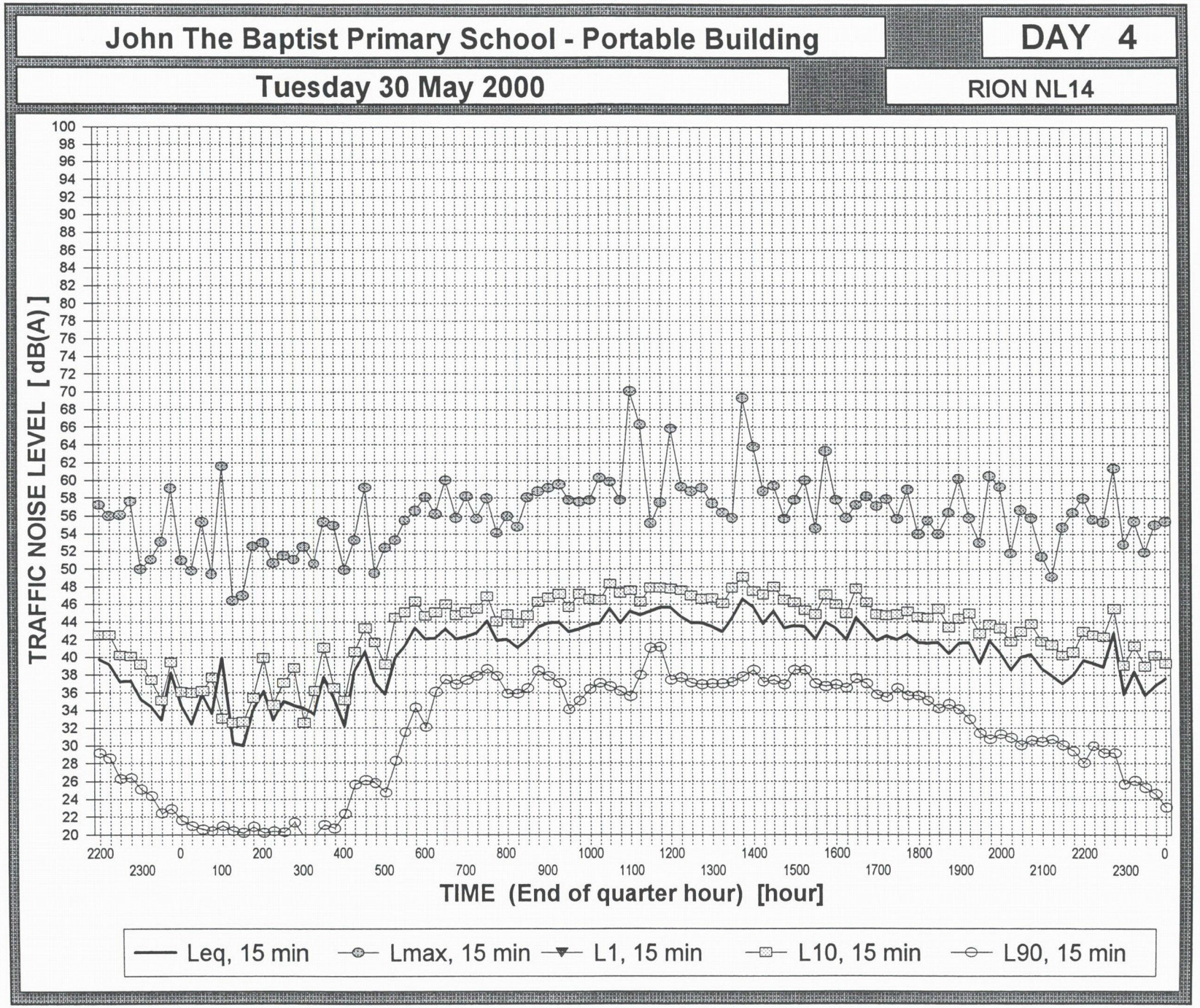
DAY 3

Monday 29 May 2000

RION NL14



KOIKAS ACOUSTICS PTY LTD



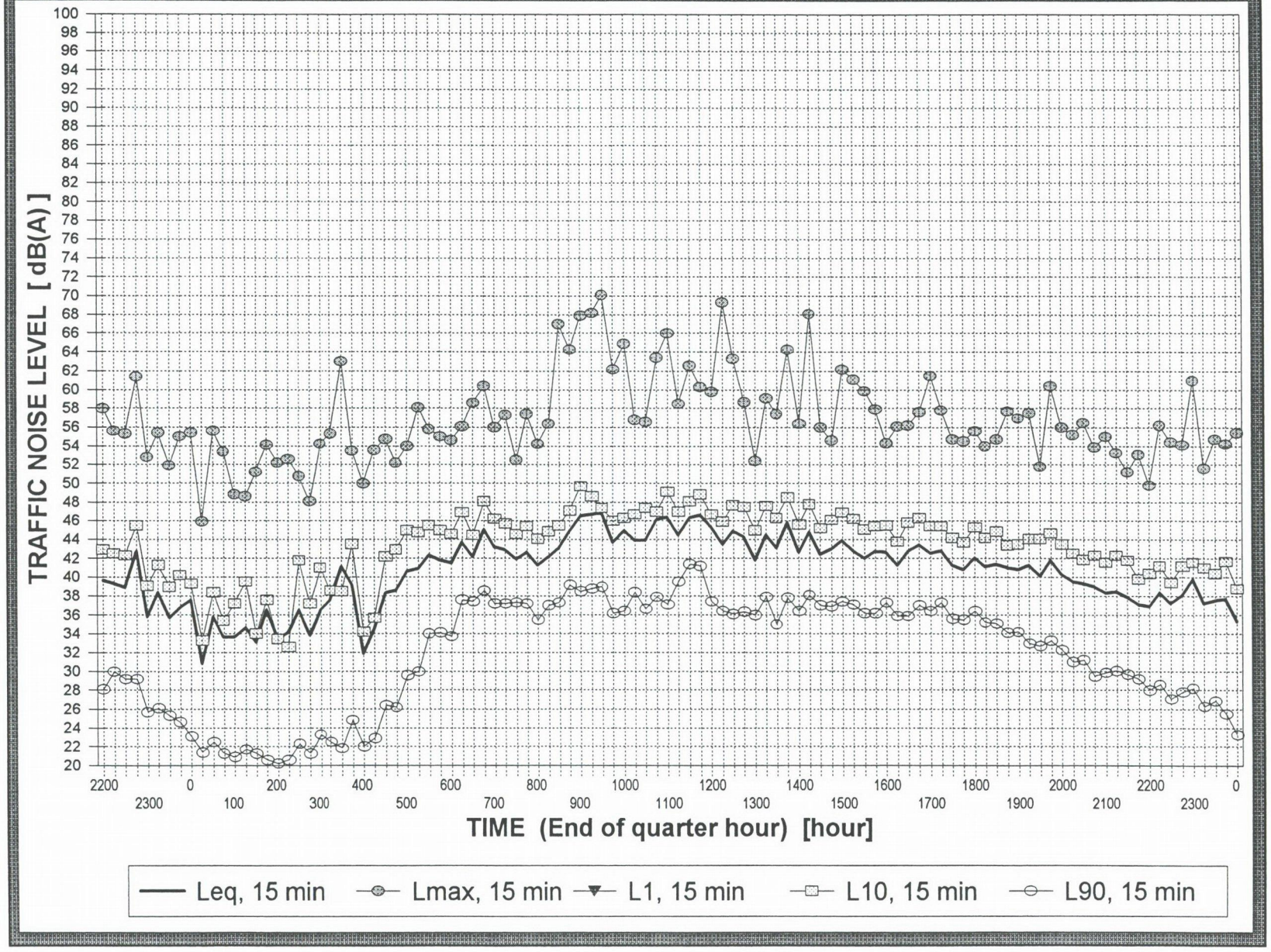
KOIKAS ACOUSTICS PTY LTD

John The Baptist Primary School - Portable Building

DAY 5

Wednesday 31 May 2000

RION NL14



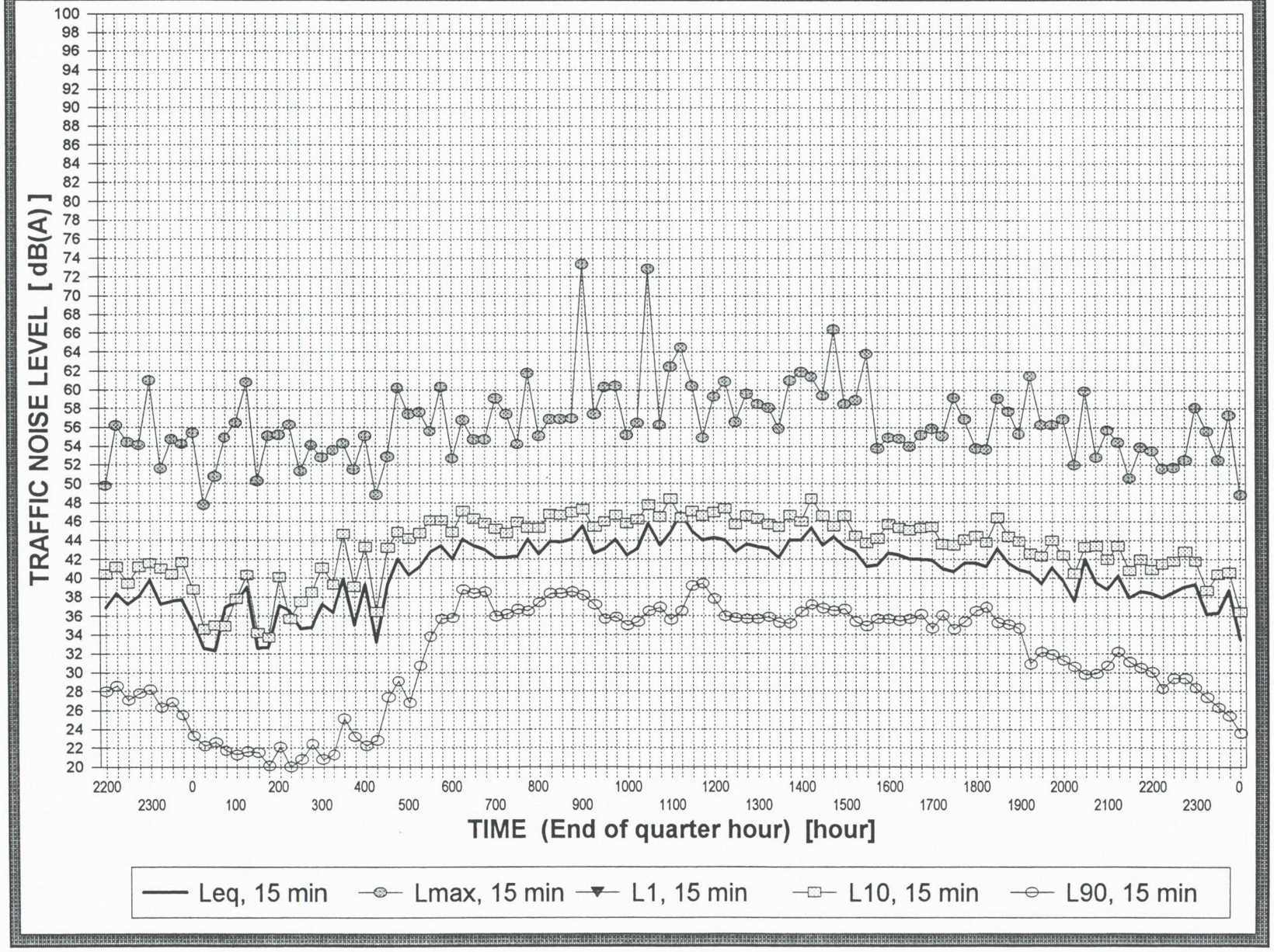
KOIKAS ACOUSTICS PTY LTD

John The Baptist Primary School - Portable Building

DAY 6

Thursday 1 June 2000

RION NL14



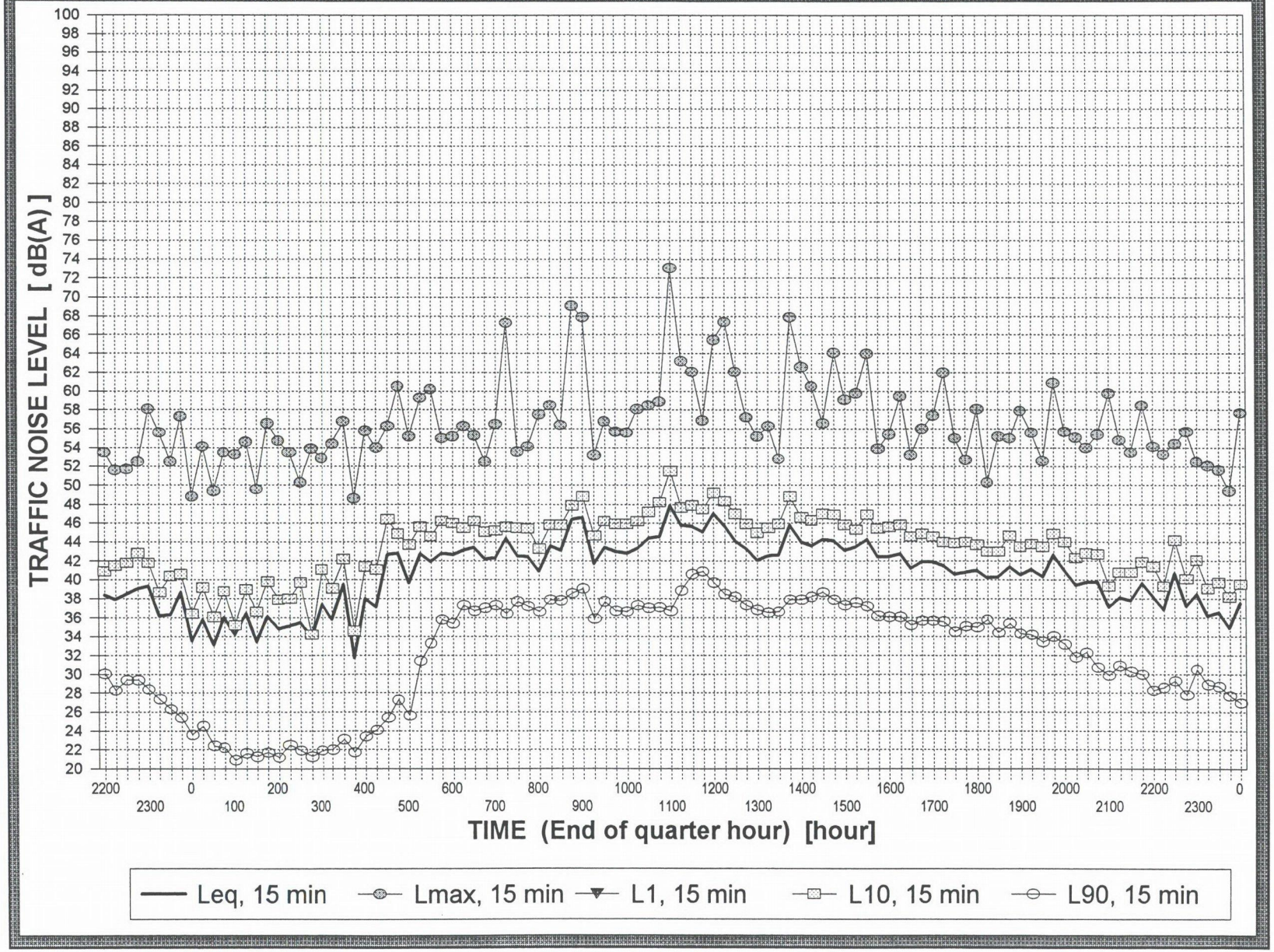
KOIKAS ACOUSTICS PTY LTD

John The Baptist Primary School - Portable Building

DAY 7

Friday 2 June 2000

RION NL14



KOIKAS ACOUSTICS PTY LTD

John The Baptist Primary School - Portable Building

DAY 1

Saturday 27 May 2000

RION NL14

YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	L95	Lmax - Leq
2000	526	2215	37.4	49.9	0.0	43.2	40.9	33.5	26.1	24.9	12.5
2000	526	2230	39.3	58.1	0.0	45.1	42.2	33.5	27.6	26.5	18.8
2000	526	2245	37.0	52.1	0.0	42.8	40.9	32.7	27.7	26.6	15.1
2000	526	2300	36.4	57.5	0.0	41.7	39.3	31.4	26.2	25.0	21.1
2000	526	2315	35.7	57.4	0.0	40.4	37.1	31.2	25.5	24.3	21.7
2000	526	2330	36.9	50.9	0.0	43.0	40.0	32.6	25.4	24.3	14.0
2000	526	2345	34.8	50.5	0.0	40.7	38.1	31.8	25.0	24.2	15.7
2000	526	0	39.4	60.8	0.0	43.0	41.0	35.3	27.0	25.3	21.4
2000	527	15	38.6	55.9	0.0	43.9	40.1	32.4	26.5	25.3	17.3
2000	527	30	35.4	52.5	0.0	41.2	38.5	30.7	24.5	23.6	17.1
2000	527	45	33.2	49.7	0.0	38.3	36.2	29.1	23.8	22.6	16.5
2000	527	100	33.8	52.4	0.0	38.7	36.1	29.4	24.1	23.2	18.6
2000	527	115	31.2	47.6	0.0	36.1	34.2	28.0	23.3	22.6	16.4
2000	527	130	30.5	46.6	0.0	36.6	33.3	25.8	21.6	21.0	16.1
2000	527	145	33.2	50.8	0.0	38.1	35.5	27.6	22.1	21.4	17.6
2000	527	200	31.1	46.7	0.0	36.9	34.6	27.5	23.0	22.1	15.6
2000	527	215	31.7	49.5	0.0	36.4	32.9	24.8	21.3	20.7	17.8
2000	527	230	36.6	54.2	0.0	41.9	37.9	26.9	21.9	21.3	17.6
2000	527	245	37.5	56.4	0.0	40.9	35.2	24.1	21.2	20.6	18.9
2000	527	300	35.8	55.4	0.0	41.1	37.3	26.0	21.3	20.8	19.6
2000	527	315	36.0	57.9	0.0	39.5	35.4	25.7	21.1	20.5	21.9
2000	527	330	32.8	52.6	0.0	38.6	34.2	25.8	21.8	21.3	19.8
2000	527	345	33.2	51.2	0.0	38.2	34.6	25.4	22.1	21.8	18.0
2000	527	400	33.5	52.7	0.0	41.0	36.9	24.5	21.2	20.8	19.2
2000	527	415	39.0	57.8	0.0	44.8	40.1	26.5	22.1	21.6	18.8
2000	527	430	38.5	54.8	0.0	45.3	40.9	28.5	22.8	22.1	16.3
2000	527	445	36.6	54.0	0.0	42.5	39.7	29.7	24.2	23.4	17.4
2000	527	500	36.2	54.3	0.0	43.4	39.1	28.4	22.6	22.0	18.1
2000	527	515	36.2	53.8	0.0	42.2	40.4	31.1	25.3	24.3	17.6
2000	527	530	37.4	53.1	0.0	43.2	41.3	33.7	28.4	26.2	15.7
2000	527	545	38.6	53.9	0.0	45.5	41.5	33.9	28.6	27.6	15.3
2000	527	600	39.5	53.8	0.0	44.8	42.9	36.2	30.6	29.2	14.3
2000	527	615	38.2	51.0	0.0	44.0	42.0	35.1	30.1	29.2	12.8
2000	527	630	41.0	57.8	0.0	46.2	44.0	37.6	31.0	29.8	16.8
2000	527	645	40.8	54.8	0.0	46.5	44.9	37.5	30.5	29.3	14.0
2000	527	700	40.4	52.7	0.0	45.9	43.9	37.4	32.2	31.1	12.3
2000	527	715	39.2	50.4	0.0	44.5	42.7	36.6	31.6	29.8	11.2
2000	527	730	39.3	55.0	0.0	45.0	42.7	35.9	30.7	29.8	15.7
2000	527	745	39.0	52.2	0.0	44.4	42.3	36.1	30.8	29.6	13.2
2000	527	800	40.7	58.1	0.0	46.3	43.9	36.9	31.2	29.9	17.4
2000	527	815	40.7	55.4	0.0	46.2	44.2	37.0	32.9	31.9	14.7
2000	527	830	40.9	54.3	0.0	45.9	43.9	38.2	32.7	31.2	13.4
2000	527	845	41.4	58.1	0.0	46.6	44.3	38.7	34.1	32.5	16.7
2000	527	900	41.1	54.7	0.0	46.7	44.8	37.4	32.1	31.0	13.6
2000	527	915	40.3	57.6	0.0	45.2	43.1	37.1	31.6	30.5	17.3
2000	527	930	40.2	55.3	0.0	45.4	42.8	37.0	32.6	31.4	15.1
2000	527	945	41.4	56.2	0.0	46.9	44.9	38.5	33.3	31.9	14.8
2000	527	1000	40.9	55.9	0.0	46.1	44.1	37.7	33.2	31.7	15.0
2000	527	1015	41.1	54.9	0.0	46.1	44.5	38.7	34.3	33.4	13.8
2000	527	1030	43.9	62.4	0.0	49.6	46.4	39.0	34.5	33.4	18.5
2000	527	1045	41.1	53.0	0.0	46.0	44.2	38.8	33.8	32.3	11.9
2000	527	1100	45.1	59.3	0.0	51.5	48.4	40.1	35.6	34.5	14.2
2000	527	1115	41.5	55.9	0.0	45.7	44.4	39.5	34.9	34.0	14.4
2000	527	1130	43.1	54.8	0.0	48.0	46.1	41.4	37.6	36.4	11.7
2000	527	1145	42.6	56.3	0.0	47.0	45.5	40.9	37.5	36.8	13.7
2000	527	1200	43.2	56.2	0.0	48.3	46.4	40.7	36.5	35.5	13.0
2000	527	1215	41.6	53.7	0.0	46.2	44.7	40.0	35.2	34.1	12.1
2000	527	1230	42.7	55.8	0.0	47.7	45.8	40.1	36.7	35.9	13.1
2000	527	1245	44.8	62.9	0.0	48.9	46.8	40.8	37.3	36.5	18.1
2000	527	1300	43.2	61.4	0.0	47.8	46.0	40.3	36.4	35.0	18.2
2000	527	1315	42.4	55.7	0.0	48.1	45.7	39.8	35.2	34.1	13.3
2000	527	1330	42.4	57.3	0.0	46.9	44.9	39.6	35.8	34.6	14.9
2000	527	1345	42.7	57.8	0.0	47.4	45.7	40.2	36.2	35.3	15.1
2000	527	1400	44.6	59.5	0.0	49.3	47.4	42.1	38.3	37.0	14.9
2000	527	1415	42.9	56.1	0.0	47.0	45.7	41.0	36.6	34.6	13.2
2000	527	1430	40.6	56.4	0.0	45.5	43.9	38.7	34.7	33.2	15.8
2000	527	1445	41.0	54.5	0.0	45.3	44.0	39.5	35.4	34.5	13.5
2000	527	1500	40.9	55.0	0.0	45.3	44.0	39.0	35.8	35.0	14.1
2000	527	1515	42.0	58.9	0.0	46.9	44.7	39.2	34.6	33.3	16.9
2000	527	1530	40.1	52.5	0.0	44.9	43.3	38.1	33.8	32.8	12.4
2000	527	1545	42.7	57.6	0.0	47.7	45.7	39.8	34.9	33.8	14.9
2000	527	1600	40.1	56.6	0.0	45.0	42.9	37.2	33.4	32.1	16.5
2000	527	1615	40.0	55.0	0.0	45.2	43.2	37.7	33.3	31.6	15.0
2000	527	1630	39.3	55.6	0.0	43.6	42.2	37.1	32.9	32.0	16.3
2000	527	1645	40.7	54.7	0.0	46.0	43.8	38.0	34.1	33.4	14.0
2000	527	1700	40.5	56.1	0.0	45.2	43.0	37.7	33.9	32.6	15.6
2000	527	1715	39.8	53.3	0.0	44.8	43.1	37.2	33.7	32.8	13.5
2000	527	1730	41.0	55.5	0.0	46.1	43.8	38.0	34.1	33.3	14.5
2000	527	1745	39.6	57.9	0.0	44.6	43.1	37.2	33.8	32.7	18.3
2000	527	1800	40.0	53.6	0.0	45.3	43.1	37.3	33.1	32.0	13.6
2000	527	1815	39.3	53.3	0.0	43.9	42.0	37.3	33.6	31.9	14.0
2000	527	1830	39.5	53.2	0.0	45.1	42.0	37.0	33.8	33.0	13.7
2000	527	1845	37.9	49.2	0.0	42.7	41.0	36.0	32.2	31.2	11.3
2000	527	1900	37.5	53.1	0.0	41.7	40.1	35.5	31.3	30.2	15.6
2000	527	1915	39.0	58.6	0.0	43.3	41.2	35.6	30.4	28.6	19.6
2000	527	1930	37.3	53.1	0.0	42.6	40.2	34.8	29.8	28.8	15.8
2000	527	1945	37.2	53.0	0.0	42.1	39.9	34.4	29.6	28.4	15.8
2000	527	2000	37.2	52.4	0.0	42.2	40.1	34.2	30.2	29.1	15.2
2000	527	2015	35.9	52.3	0.0	41.5	39.6	32.9	27.6	26.2	16.4
2000	527	2030	35.2	55.1	0.0	39.9	38.1	33.1	27.6	26.4	19.9
2000	527	2045	36.9	56.1	0.0	41.5	38.9	32.9	28.2	27.0	19.2
2000	527	2100	36.5	53.2	0.0	42.0	39.6	32.5	27.3	25.9	16.7
2000	527	2115	37.0	52.3	0.0	42.1	39.3	33.6	29.0	28.0	15.3
2000	527	2130	38.8	57.2	0.0	44.1	41.7	34.3	29.2	27.7	18.4
2000	527	2145	35.6	51.5	0.0	40.4	38.3	32.1	26.5	25.3	15.9
2000	527	2200	36.6	53.6	0.0	42.1	39.2	33.0	27.9	26.6	17.0
2000	527	2215	36.0	52.6	0.0	40.9	38.8	32.5	27.4	26.1	16.6
2000	527	2230	36.5	54.6	0.0	41.0	38.6	32.1	26.2	24.8	18.1
2000	527	2245	35.3	50.4	0.0	40.7	38.4	31.7	25.6	24.1	15.1
2000	527	2300	37.4	59.6	0.0	41.2	38.7	31.8	26.7	25.9	22.2
2000	527	2315	35.7	53.3	0.0	41.3	38.1	31.4	26.4	25.2	17.6
2000	527	2330	35.3	50.7	0.0	40.3	38.1	32.8	25.9	24.7	15.4
2000	527	2345	34.7	54.8	0.0	38.7	37.5	32.3	27.0	25.8	20.1
2000	527	0	34.9	53.1	0.0	39.4	37.8	31.8	25.6	24.8	18.2

DAY 1	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	Leq, 24 hours	between 00:00 and 24:00 hours	39.8	dB(A)
Night Time	Leq, 8 hours	between 22:00 and 06:00 hours	36.3	dB(A)
Daytime	Leq, 15 hours	between 07:00 and 22:00 hours	40.9	dB(A)
Night Time	Leq, 9 hours	between 22:00 and 07:00 hours	37.0	dB(A)
Daytime	L10, 18 hours	between 06:00 and 24:00 hours	42.8	dB(A)
Daytime	max Leq, 1 hour	between 07:00 and 22:00 hours	43.2	dB(A)
Daytime	minimum L90, 15 min	between 07:00 and 18:00 hours	30.7	dB(A)

John The Baptist Primary School - Portable Building											DAY 2
Sunday 28 May 2000									RION NL14		
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	L95	Lmax - Leq
2000	527	2200	36.6	53.6	0.0	42.1	39.2	33.0	27.9	26.6	17.0
2000	527	2215	36.0	52.6	0.0	40.9	38.8	32.5	27.4	26.1	16.6
2000	527	2230	36.5	54.6	0.0	41.0	38.6	32.1	26.2	24.8	18.1
2000	527	2245	35.3	50.4	0.0	40.7	38.4	31.7	25.6	24.1	15.1
2000	527	2300	37.4	59.6	0.0	41.2	38.7	31.8	26.7	25.9	22.2
2000	527	2315	35.7	53.3	0.0	41.3	38.1	31.4	26.4	25.2	17.6
2000	527	2330	35.3	50.7	0.0	40.3	38.1	32.8	25.9	24.7	15.4
2000	527	2345	34.7	54.8	0.0	38.7	37.5	32.3	27.0	25.8	20.1
2000	527	0	34.9	53.1	0.0	39.4	37.8	31.8	25.6	24.8	18.2
2000	528	15	35.5	53.0	0.0	40.3	38.2	32.7	27.4	26.5	17.5
2000	528	30	36.3	52.1	0.0	42.2	39.6	31.6	25.8	24.8	15.8
2000	528	45	37.8	59.0	0.0	41.8	38.9	31.8	25.8	24.9	21.2
2000	528	100	35.2	57.3	0.0	40.5	38.1	31.5	26.0	24.8	22.1
2000	528	115	35.1	52.7	0.0	39.2	37.1	31.0	25.6	24.5	17.6
2000	528	130	38.2	57.6	0.0	41.5	38.4	31.4	26.0	24.9	19.4
2000	528	145	30.4	47.2	0.0	35.2	33.7	27.7	23.5	22.8	16.8
2000	528	200	33.8	52.0	0.0	39.2	36.1	27.6	22.7	22.1	18.2
2000	528	215	33.1	57.2	0.0	35.8	32.7	26.1	21.9	21.2	24.1
2000	528	230	31.8	51.8	0.0	37.1	34.4	27.6	21.7	21.0	20.0
2000	528	245	30.0	45.7	0.0	36.2	33.7	25.5	20.8	20.5	15.7
2000	528	300	30.4	50.8	0.0	35.7	32.0	24.2	20.8	20.4	20.4
2000	528	315	30.4	48.3	0.0	35.7	32.7	24.2	21.1	20.7	17.9
2000	528	330	32.5	50.2	0.0	38.2	35.0	25.9	21.2	20.7	17.7
2000	528	345	33.2	57.8	0.0	38.9	36.3	28.3	23.7	23.0	24.6
2000	528	400	31.5	52.1	0.0	35.9	34.0	27.9	23.6	22.9	20.6
2000	528	415	31.2	47.5	0.0	37.3	34.1	27.0	23.2	22.6	16.3
2000	528	430	30.0	47.6	0.0	34.8	32.0	24.6	21.1	20.6	17.6
2000	528	445	29.2	46.8	0.0	33.6	31.7	24.3	21.3	20.7	17.6
2000	528	500	30.3	46.8	0.0	36.5	32.7	22.2	20.1	19.9	16.5
2000	528	515	29.8	49.8	0.0	35.1	32.4	23.8	20.1	19.8	20.0
2000	528	530	32.0	50.0	0.0	37.6	35.3	26.8	21.8	21.3	18.0
2000	528	545	37.9	58.1	0.0	43.0	40.0	29.2	21.8	21.2	20.2
2000	528	600	32.7	60.3	0.0	38.0	35.1	27.5	21.7	20.9	27.6
2000	528	615	33.0	46.9	0.0	39.0	37.0	29.2	23.0	22.0	13.9
2000	528	630	34.2	56.2	0.0	37.9	36.0	29.0	23.0	22.2	22.0
2000	528	645	35.2	49.0	0.0	41.3	38.9	30.6	24.8	23.8	13.8
2000	528	700	36.9	59.8	0.0	42.8	39.1	30.1	24.7	23.9	22.9
2000	528	715	37.1	55.3	0.0	42.1	39.9	32.1	26.5	25.4	18.2
2000	528	730	37.5	52.3	0.0	43.1	40.7	33.6	28.1	27.1	14.8
2000	528	745	39.6	56.9	0.0	45.7	42.7	34.3	27.7	26.3	17.3
2000	528	800	36.2	49.7	0.0	40.9	39.1	34.3	30.1	28.7	13.5
2000	528	815	37.0	55.6	0.0	42.0	39.5	33.5	27.2	25.9	18.6
2000	528	830	38.5	54.9	0.0	43.4	41.7	35.4	30.2	28.5	16.4
2000	528	845	37.1	51.8	0.0	41.5	39.7	35.3	30.8	29.8	14.7
2000	528	900	39.1	54.6	0.0	44.8	41.5	36.1	31.6	30.5	15.5
2000	528	915	37.7	53.3	0.0	42.4	40.8	34.9	30.4	28.8	15.6
2000	528	930	39.3	52.9	0.0	45.3	42.5	35.7	31.2	29.9	13.6
2000	528	945	39.5	53.7	0.0	44.4	42.1	36.6	33.0	31.8	14.2
2000	528	1000	40.7	53.6	0.0	45.7	43.5	38.1	33.0	31.7	12.9
2000	528	1015	38.9	53.2	0.0	43.4	41.5	37.0	33.0	32.1	14.3
2000	528	1030	39.5	53.0	0.0	43.7	42.4	37.9	34.5	33.5	13.5
2000	528	1045	39.7	53.5	0.0	44.4	42.5	37.5	33.8	32.7	13.8
2000	528	1100	39.7	53.8	0.0	44.2	42.5	37.9	34.3	33.0	14.1
2000	528	1115	40.6	54.2	0.0	45.4	43.3	38.7	34.8	33.6	13.6
2000	528	1130	41.6	58.7	0.0	46.3	44.5	39.7	35.1	34.0	17.1
2000	528	1145	41.1	57.2	0.0	46.2	44.1	38.2	34.4	33.2	16.1
2000	528	1200	40.7	54.1	0.0	45.4	43.7	38.9	35.4	34.5	13.4
2000	528	1215	41.5	57.0	0.0	46.2	44.2	39.1	35.5	34.5	15.5
2000	528	1230	41.7	58.4	0.0	46.4	44.4	39.2	35.8	34.7	16.7
2000	528	1245	40.3	54.8	0.0	45.0	42.8	38.5	35.1	34.3	14.5
2000	528	1300	39.8	55.0	0.0	43.9	42.4	38.3	35.0	34.0	15.2
2000	528	1315	43.9	61.5	0.0	47.2	44.6	38.8	34.3	33.0	17.6
2000	528	1330	40.9	57.1	0.0	45.4	43.3	38.3	34.6	33.1	16.2
2000	528	1345	41.5	60.9	0.0	46.5	44.3	38.8	34.2	33.2	19.4
2000	528	1400	41.4	60.0	0.0	45.9	43.9	38.9	34.5	33.0	18.6
2000	528	1415	39.9	53.1	0.0	44.7	43.1	38.2	33.7	32.3	13.2
2000	528	1430	40.1	55.3	0.0	44.7	42.6	37.9	34.3	33.3	15.2
2000	528	1445	40.1	54.0	0.0	44.7	43.0	38.1	34.2	33.3	13.9
2000	528	1500	40.2	54.7	0.0	44.9	43.5	38.4	34.3	33.1	14.5
2000	528	1515	40.6	55.7	0.0	45.2	43.9	38.2	33.6	32.4	15.1
2000	528	1530	42.1	60.3	0.0	46.1	44.0	39.0	34.6	33.4	18.2
2000	528	1545	40.0	52.0	0.0	44.5	43.1	38.4	34.1	32.9	12.0
2000	528	1600	41.0	60.0	0.0	45.1	42.5	36.6	32.3	30.8	19.0
2000	528	1615	39.3	53.2	0.0	44.2	42.4	37.6	33.4	31.9	13.9
2000	528	1630	40.6	55.8	0.0	45.1	42.7	38.1	34.4	33.6	15.2
2000	528	1645	40.3	56.9	0.0	44.8	42.6	37.7	33.6	32.4	16.6
2000	528	1700	41.0	56.8	0.0	46.2	44.1	38.5	35.0	34.1	15.8
2000	528	1715	41.3	63.5	0.0	45.5	43.3	38.9	35.4	34.6	22.2
2000	528	1730	41.0	54.9	0.0	45.2	43.7	39.4	35.2	33.7	13.9
2000	528	1745	41.4	57.6	0.0	46.6	44.4	38.6	34.7	33.7	16.2
2000	528	1800	40.5	54.8	0.0	45.2	43.4	38.0	34.5	33.5	14.3
2000	528	1815	39.1	56.0	0.0	43.4	41.5	36.5	32.6	31.5	16.9
2000	528	1830	38.3	51.8	0.0	43.3	41.0	35.9	31.8	30.9	13.5
2000	528	1845	39.9	55.8	0.0	45.1	43.1	36.8	31.4	30.2	15.9
2000	528	1900	37.7	52.9	0.0	42.3	40.0	34.8	29.9	28.5	15.2
2000	528	1915	37.4	53.0	0.0	42.4	39.8	34.2	28.6	27.0	15.6
2000	528	1930	37.2	52.8	0.0	42.6	39.7	34.4	29.6	28.3	15.6
2000	528	1945	37.4	54.4	0.0	42.5	39.6	33.6	29.2	28.1	17.0
2000	528	2000	36.3	53.5	0.0	41.4	39.2	33.0	27.1	25.9	17.2
2000	528	2015	36.3	52.1	0.0	41.6	39.4	33.6	27.1	25.9	15.8
2000	528	2030	37.2	56.9	0.0	42.8	40.2	33.1	26.5	25.5	19.7
2000	528	2045	37.8	58.6	0.0	41.7	39.7	33.9	28.9	27.8	20.8
2000	528	2100	37.5	52.5	0.0	43.0	40.4	34.1	29.1	28.1	15.0
2000	528	2115	37.9	52.5	0.0	43.9	41.5	34.3	28.3	27.1	14.6
2000	528	2130	36.6	53.4	0.0	42.2	39.8	32.8	27.4	26.1	16.8
2000	528	2145	37.3	53.4	0.0	43.9	40.6	32.6	26.6	25.4	16.1
2000	528	2200	35.9	54.8	0.0	41.6	39.3	30.5	24.6	23.5	18.9
2000	528	2215	36.7	53.9	0.0	43.9	40.8	30.8	24.7	23.8	17.2
2000	528	2230	39.6	56.6	0.0	45.3	40.6	31.7	25.0	23.9	17.0
2000	528	2245	34.9	52.0	0.0	41.0	37.6	30.0	24.4	23.6	17.1
2000	528	2300	34.6	51.9	0.0	39.8	37.5	29.9	24.4	23.6	17.3
2000	528	2315	33.1	50.2	0.0	39.4	36.2	28.4	23.3	22.3	17.1
2000	528	2330	36.8	53.4	0.0	43.3	41.4	30.0	24.7	23.5	16.6
2000	528	2345	33.8	51.8	0.0	40.2	36.3	28.1	22.8	21.8	18.0

DAY 2	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	Leq, 24 hours	between 00:00 and 24:00 hours	38.4	dB(A)
Night Time	Leq, 8 hours	between 22:00 and 06:00 hours	34.4	dB(A)
Daytime	Leq, 15 hours	between 07:00 and 22:00 hours	39.7	dB(A)
Night Time	Leq, 9 hours	between 22:00 and 07:00 hours	34.4	dB(A)
Daytime	L10, 18 hours	between 06:00 and 24:00 hours	41.4	dB(A)
Daytime	max Leq, 1 hour	between 07:00 and 22:00 hours	41.8	dB(A)
Daytime	minimum L90, 15 min	between 07:00 and 18:00 hours	24.7	dB(A)

John The Baptist Primary School - Portable Building											DAY 3
Monday 29 May 2000									RION NL14		
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	L95	Lmax - Leq
2000	528	2215	36.7	53.9	0.0	43.9	40.8	30.8	24.7	23.8	17.2
2000	528	2230	39.6	56.6	0.0	45.3	40.6	31.7	25.0	23.9	17.0
2000	528	2245	34.9	52.0	0.0	41.0	37.6	30.0	24.4	23.6	17.1
2000	528	2300	34.6	51.9	0.0	39.8	37.5	29.9	24.4	23.6	17.3
2000	528	2315	33.1	50.2	0.0	39.4	36.2	28.4	23.3	22.3	17.1
2000	528	2330	36.8	53.4	0.0	43.3	41.4	30.0	24.7	23.5	16.6
2000	528	2345	33.8	51.8	0.0	40.2	36.3	28.1	22.8	21.8	18.0
2000	528	0	31.8	51.5	0.0	38.3	35.0	25.7	20.6	20.1	19.7
2000	529	15	37.0	56.5	0.0	41.8	36.3	26.3	21.1	20.4	19.5
2000	529	30	31.7	51.4	0.0	36.0	32.8	25.6	21.1	20.5	19.7
2000	529	45	29.9	49.1	0.0	35.1	32.4	25.3	20.4	20.0	19.2
2000	529	100	36.7	58.6	0.0	42.2	37.2	26.5	21.3	20.8	21.9
2000	529	115	30.0	48.2	0.0	35.8	33.1	22.3	19.7	19.6	18.2
2000	529	130	38.9	60.0	0.0	41.2	33.8	23.8	20.0	19.7	21.1
2000	529	145	38.2	56.1	0.0	43.8	41.0	25.0	20.2	19.9	17.9
2000	529	200	35.3	55.6	0.0	40.2	36.7	24.6	20.7	20.4	20.3
2000	529	215	37.3	58.0	0.0	42.4	39.0	28.6	23.3	22.5	20.7
2000	529	230	38.5	58.6	0.0	45.1	41.6	32.1	25.9	25.1	20.1
2000	529	245	34.3	51.0	0.0	39.5	36.6	29.3	23.7	22.6	16.7
2000	529	300	37.2	52.4	0.0	44.3	41.2	29.1	22.9	21.5	15.2
2000	529	315	29.6	47.8	0.0	34.0	29.8	21.3	19.8	19.6	18.2
2000	529	330	33.1	52.6	0.0	38.9	34.4	24.3	20.4	20.1	19.5
2000	529	345	35.6	51.8	0.0	42.0	37.5	25.9	21.6	21.1	16.2
2000	529	400	37.8	54.8	0.0	45.2	40.0	25.5	21.1	20.6	17.0
2000	529	415	34.5	51.0	0.0	41.0	37.6	27.6	22.2	21.6	16.5
2000	529	430	40.5	60.1	0.0	45.4	42.4	33.6	25.9	24.8	19.6
2000	529	445	38.8	53.6	0.0	45.4	41.9	32.7	26.2	24.4	14.8
2000	529	500	39.3	55.7	0.0	46.3	42.8	31.9	25.7	24.6	16.4
2000	529	515	42.1	58.5	0.0	48.5	45.4	35.5	28.8	27.3	16.4
2000	529	530	45.0	58.6	0.0	51.5	48.7	40.4	35.1	33.3	13.6
2000	529	545	44.0	60.0	0.0	49.5	47.6	40.3	35.5	33.8	16.0
2000	529	600	43.5	58.8	0.0	48.9	47.0	39.8	34.4	33.1	15.3
2000	529	615	43.6	57.0	0.0	48.8	46.8	41.0	35.9	34.6	13.4
2000	529	630	43.3	57.2	0.0	48.0	46.1	41.2	38.1	37.2	13.9
2000	529	645	43.5	60.0	0.0	48.2	46.7	41.5	37.4	36.5	16.5
2000	529	700	42.0	58.6	0.0	46.1	44.3	40.4	37.0	36.1	16.6
2000	529	715	43.5	56.3	0.0	48.0	46.4	41.4	37.4	36.3	12.8
2000	529	730	42.1	52.1	0.0	46.0	44.7	41.1	37.4	36.6	10.0
2000	529	745	42.3	56.4	0.0	46.2	44.9	40.5	37.4	36.8	14.1
2000	529	800	42.2	60.7	0.0	46.3	44.5	40.0	36.2	35.4	18.5
2000	529	815	42.4	56.8	0.0	47.2	45.3	40.0	35.7	34.7	14.4
2000	529	830	42.3	60.9	0.0	46.9	45.3	39.8	36.3	35.4	18.6
2000	529	845	43.9	65.8	0.0	47.6	46.1	41.1	36.7	35.7	21.9
2000	529	900	44.7	59.9	0.0	48.8	47.1	41.0	37.2	36.0	15.2
2000	529	915	43.7	59.6	0.0	47.7	45.9	40.9	36.4	34.8	15.9
2000	529	930	43.8	62.2	0.0	48.0	46.3	41.3	35.5	33.7	18.4
2000	529	945	45.0	67.0	0.0	50.4	47.0	40.1	35.7	34.5	22.0
2000	529	1000	43.0	59.5	0.0	46.7	44.8	39.9	36.1	35.2	16.5
2000	529	1015	43.3	60.4	0.0	47.7	45.8	40.4	35.3	33.8	17.1
2000	529	1030	45.0	60.3	0.0	51.0	47.4	40.6	35.0	33.7	15.3
2000	529	1045	42.4	54.3	0.0	47.4	45.5	40.2	35.6	34.4	11.9
2000	529	1100	42.8	60.1	0.0	47.8	45.9	40.8	36.2	35.2	17.3
2000	529	1115	43.9	59.0	0.0	48.6	46.8	41.8	37.9	37.1	15.1
2000	529	1130	43.9	56.0	0.0	48.2	46.5	42.5	39.3	38.6	12.1
2000	529	1145	44.2	56.6	0.0	48.3	46.5	42.5	39.5	38.7	12.4
2000	529	1200	43.0	55.8	0.0	48.2	46.5	40.4	34.9	32.9	12.8
2000	529	1215	44.2	59.8	0.0	50.0	47.4	41.3	35.6	33.6	15.6
2000	529	1230	42.6	57.9	0.0	48.0	45.8	39.4	34.0	32.7	15.3
2000	529	1245	42.9	56.9	0.0	48.5	45.8	39.8	35.4	34.2	14.0
2000	529	1300	42.8	57.2	0.0	47.9	46.1	40.8	36.3	35.2	14.4
2000	529	1315	44.3	58.8	0.0	49.1	46.7	41.5	37.7	36.8	14.5
2000	529	1330	44.9	59.4	0.0	49.0	47.6	42.7	38.7	37.8	14.5
2000	529	1345	45.9	69.8	0.0	50.7	48.5	42.9	38.8	37.6	23.9
2000	529	1400	44.6	55.8	0.0	48.6	47.5	43.5	39.6	38.4	11.2
2000	529	1415	47.5	72.9	0.0	50.6	48.3	43.6	39.8	38.8	25.4
2000	529	1430	43.5	56.8	0.0	48.2	46.7	41.7	36.5	35.2	13.3
2000	529	1445	42.6	54.7	0.0	47.0	45.6	41.1	37.8	36.8	12.1
2000	529	1500	45.0	64.3	0.0	49.8	47.5	42.5	38.5	37.6	19.3
2000	529	1515	44.8	60.5	0.0	49.6	46.7	42.2	38.0	37.5	15.7
2000	529	1530	43.2	56.6	0.0	48.0	46.1	40.9	37.0	36.2	13.4
2000	529	1545	44.0	60.5	0.0	48.1	46.9	42.0	37.7	36.4	16.5
2000	529	1600	42.5	54.3	0.0	47.0	45.6	41.0	36.5	35.6	11.8
2000	529	1615	43.6	64.8	0.0	47.9	45.5	39.6	36.0	35.2	21.2
2000	529	1630	41.4	51.5	0.0	45.8	44.3	39.9	36.4	35.2	10.1
2000	529	1645	42.2	52.3	0.0	47.1	45.4	40.3	37.0	35.9	10.1
2000	529	1700	42.6	58.8	0.0	47.5	45.7	39.3	35.8	35.0	16.2
2000	529	1715	41.4	55.3	0.0	45.4	43.8	39.4	35.8	34.8	13.9
2000	529	1730	41.3	55.0	0.0	46.0	44.2	39.2	35.1	34.2	13.7
2000	529	1745	40.7	59.3	0.0	45.0	43.1	38.3	34.6	33.5	18.6
2000	529	1800	41.3	56.3	0.0	45.6	44.1	38.9	34.6	33.6	15.0
2000	529	1815	40.1	54.6	0.0	44.6	42.8	37.8	34.1	33.3	14.5
2000	529	1830	38.4	52.7	0.0	42.7	41.3	36.8	32.8	31.4	14.3
2000	529	1845	39.1	53.3	0.0	43.7	42.2	36.9	32.7	31.6	14.2
2000	529	1900	40.2	57.2	0.0	45.1	42.9	36.5	31.1	29.9	17.0
2000	529	1915	38.7	56.3	0.0	43.6	41.9	35.7	30.8	29.5	17.6
2000	529	1930	40.1	58.2	0.0	45.9	43.5	35.5	30.4	29.1	18.1
2000	529	1945	37.6	51.3	0.0	43.3	40.8	34.7	29.5	28.4	13.7
2000	529	2000	39.8	58.5	0.0	45.5	41.7	34.7	29.4	28.1	18.7
2000	529	2015	44.9	64.3	0.0	46.7	43.0	34.1	28.2	26.9	19.4
2000	529	2030	36.4	52.8	0.0	41.6	38.9	33.0	28.3	27.2	16.4
2000	529	2045	37.3	52.0	0.0	43.3	40.7	32.9	27.3	26.5	14.7
2000	529	2100	36.9	52.4	0.0	42.8	40.3	33.3	27.5	26.4	15.5
2000	529	2115	39.4	55.1	0.0	45.7	43.2	33.3	27.3	26.0	15.7
2000	529	2130	42.7	61.6	0.0	46.2	42.7	33.6	28.5	27.3	18.9
2000	529	2145	36.2	49.1	0.0	42.0	39.9	32.5	26.6	25.1	12.9
2000	529	2200	39.7	57.2	0.0	44.8	42.5	34.1	29.2	28.0	17.5
2000	529	2215	39.2	56.0	0.0	44.6	42.5	33.8	28.6	27.2	16.8
2000	529	2230	37.2	56.1	0.0	42.9	40.2	33.2	26.3	25.0	18.9
2000	529	2245	37.3	57.6	0.0	42.6	40.1	31.9	26.4	25.6	20.3
2000	529	2300	35.2	50.0	0.0	41.6	39.2	30.4	25.1	24.2	14.8
2000	529	2315	34.4	51.1	0.0	40.2	37.4	30.0	24.4	23.3	16.7
2000	529	2330	32.9	53.1	0.0	37.5	35.1	28.0	22.4	21.5	20.2
2000	529	2345	38.2	59.1	0.0	43.4	39.4	27.9	22.9	22.3	20.9
2000	529	0	34.5	51.0	0.0	40.3	36.1	26.6	21.6	20.9	16.5

DAY 3	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	Leq, 24 hours	between 00:00 and 24:00 hours	41.8	dB(A)
Night Time	Leq, 8 hours	between 22:00 and 06:00 hours	38.2	dB(A)
Daytime	Leq, 15 hours	between 07:00 and 22:00 hours	42.8	dB(A)
Night Time	Leq, 9 hours	between 22:00 and 07:00 hours	39.2	dB(A)
Daytime	L10, 18 hours	between 06:00 and 24:00 hours	44.3	dB(A)
Daytime	max Leq, 1 hour	between 07:00 and 22:00 hours	45.1	dB(A)
Daytime	minimum L90, 15 min	between 07:00 and 18:00 hours	34.0	dB(A)

John The Baptist Primary School - Portable Building										DAY 4	
Tuesday 30 May 2000									RION NL14		
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	L95	Lmax - Leq
2000	529	2215	39.2	56.0	0.0	44.6	42.5	33.8	28.6	27.2	16.8
2000	529	2230	37.2	56.1	0.0	42.9	40.2	33.2	26.3	25.0	18.9
2000	529	2245	37.3	57.6	0.0	42.6	40.1	31.9	26.4	25.6	20.3
2000	529	2300	35.2	50.0	0.0	41.6	39.2	30.4	25.1	24.2	14.8
2000	529	2315	34.4	51.1	0.0	40.2	37.4	30.0	24.4	23.3	16.7
2000	529	2330	32.9	53.1	0.0	37.5	35.1	28.0	22.4	21.5	20.2
2000	529	2345	38.2	59.1	0.0	43.4	39.4	27.9	22.9	22.3	20.9
2000	529	0	34.5	51.0	0.0	40.3	36.1	26.6	21.6	20.9	16.5
2000	530	15	32.4	49.8	0.0	39.1	36.0	25.5	21.0	20.5	17.4
2000	530	30	35.8	55.3	0.0	40.3	36.2	25.2	20.6	20.3	19.5
2000	530	45	33.6	49.4	0.0	41.5	37.7	24.5	20.4	20.1	15.8
2000	530	100	39.9	61.6	0.0	39.0	33.1	23.8	21.0	20.6	21.7
2000	530	115	30.3	46.4	0.0	37.6	32.6	22.9	20.4	20.1	16.1
2000	530	130	30.0	47.0	0.0	36.4	32.7	22.9	20.2	20.0	17.0
2000	530	145	34.0	52.6	0.0	40.7	35.4	23.7	20.9	20.6	18.6
2000	530	200	36.2	53.0	0.0	43.9	39.9	24.7	20.2	19.9	16.8
2000	530	215	32.9	50.7	0.0	39.2	34.6	23.7	20.4	19.9	17.8
2000	530	230	35.0	51.5	0.0	42.6	37.1	24.6	20.3	19.8	16.5
2000	530	245	34.5	51.1	0.0	41.7	38.8	25.0	21.4	20.8	16.6
2000	530	300	34.2	52.5	0.0	38.7	32.6	22.4	19.8	19.7	18.3
2000	530	315	33.5	50.6	0.0	40.7	36.2	23.8	19.8	19.6	17.1
2000	530	330	37.7	55.3	0.0	44.1	41.1	26.2	21.1	20.4	17.6
2000	530	345	35.3	54.9	0.0	41.2	36.5	24.7	20.7	20.4	19.6
2000	530	400	32.2	49.9	0.0	37.8	35.1	26.2	22.3	21.7	17.7
2000	530	415	38.4	53.3	0.0	44.3	40.6	33.8	25.6	24.6	14.9
2000	530	430	40.6	59.2	0.0	46.2	43.3	32.9	26.1	25.3	18.6
2000	530	445	37.1	49.5	0.0	43.6	41.7	32.7	25.8	25.1	12.4
2000	530	500	35.8	52.4	0.0	41.4	39.2	30.6	24.7	23.9	16.6
2000	530	515	40.0	53.3	0.0	46.6	44.5	34.8	28.3	27.3	13.3
2000	530	530	41.3	55.5	0.0	47.1	45.1	37.1	31.5	30.1	14.2
2000	530	545	43.3	56.6	0.0	48.4	46.3	40.3	34.3	32.4	13.3
2000	530	600	42.1	58.1	0.0	47.9	44.7	38.2	32.1	30.7	16.0
2000	530	615	42.2	56.2	0.0	46.8	45.1	40.0	36.1	35.1	14.0
2000	530	630	43.2	60.0	0.0	47.9	46.0	40.9	37.5	36.4	16.8
2000	530	645	42.1	55.8	0.0	46.6	44.8	40.5	36.9	36.1	13.7
2000	530	700	42.3	58.2	0.0	46.7	45.1	40.5	37.4	36.3	15.9
2000	530	715	42.7	55.7	0.0	47.1	45.5	41.0	37.9	37.1	13.0
2000	530	730	44.1	58.0	0.0	49.2	46.9	41.9	38.7	38.0	13.9
2000	530	745	41.9	54.1	0.0	45.8	44.1	40.4	37.9	37.3	12.2
2000	530	800	42.1	56.0	0.0	46.4	44.9	40.5	35.9	34.8	13.9
2000	530	815	41.1	54.8	0.0	46.1	43.9	38.8	35.9	35.3	13.7
2000	530	830	42.1	58.1	0.0	47.5	44.8	39.6	36.5	35.8	16.0
2000	530	845	43.4	58.8	0.0	47.8	46.3	41.7	38.5	37.7	15.4
2000	530	900	43.9	59.2	0.0	48.1	46.8	41.8	37.9	36.9	15.3
2000	530	915	44.0	59.6	0.0	48.7	47.2	41.5	37.1	36.1	15.6
2000	530	930	42.9	57.8	0.0	47.4	45.7	40.2	34.1	32.8	14.9
2000	530	945	43.2	57.6	0.0	48.8	47.2	40.0	35.1	33.8	14.4
2000	530	1000	43.7	57.8	0.0	48.7	46.6	41.1	36.4	34.7	14.1
2000	530	1015	43.9	60.3	0.0	48.2	46.5	41.7	37.1	35.8	16.4
2000	530	1030	45.5	59.9	0.0	51.1	48.3	41.2	36.7	35.4	14.4
2000	530	1045	43.9	57.8	0.0	49.3	47.3	41.2	36.2	35.0	13.9
2000	530	1100	45.2	70.1	0.0	49.8	47.6	41.0	35.6	34.6	24.9
2000	530	1115	44.8	66.3	0.0	47.7	46.3	41.6	38.0	37.1	21.5
2000	530	1130	45.2	55.2	0.0	49.0	47.9	44.2	41.1	40.5	10.0
2000	530	1145	45.6	57.5	0.0	49.2	47.9	44.4	41.2	40.4	11.9
2000	530	1200	45.6	65.9	0.0	49.3	47.8	42.4	37.4	35.7	20.3
2000	530	1215	44.6	59.3	0.0	49.2	47.6	42.1	37.7	36.7	14.7
2000	530	1230	43.9	58.8	0.0	48.7	47.0	41.6	37.1	35.9	14.9
2000	530	1245	43.9	59.2	0.0	48.0	46.6	41.4	36.9	35.7	15.3
2000	530	1300	43.5	57.4	0.0	48.2	46.7	41.6	37.0	35.6	13.9
2000	530	1315	42.9	56.4	0.0	47.4	46.1	41.0	37.0	36.1	13.5
2000	530	1330	44.5	55.8	0.0	50.0	47.9	41.6	37.2	36.3	11.3
2000	530	1345	46.6	69.3	0.0	51.4	49.1	42.4	37.8	36.4	22.7
2000	530	1400	45.7	63.8	0.0	49.0	47.5	42.5	38.6	37.7	18.1
2000	530	1415	43.8	58.8	0.0	48.5	47.1	41.4	37.2	36.3	15.0
2000	530	1430	45.2	59.4	0.0	51.2	48.0	41.6	37.4	36.1	14.2
2000	530	1445	43.3	55.7	0.0	47.9	46.5	41.3	36.9	35.7	12.4
2000	530	1500	43.6	57.8	0.0	47.9	46.2	41.8	38.6	37.6	14.2
2000	530	1515	43.5	60.0	0.0	47.5	45.3	41.6	38.6	37.2	16.5
2000	530	1530	42.1	54.6	0.0	46.4	44.9	40.6	37.0	36.3	12.5
2000	530	1545	44.0	63.3	0.0	49.6	47.1	40.9	36.7	35.7	19.3
2000	530	1600	43.3	57.8	0.0	47.9	46.0	40.9	36.9	35.7	14.5
2000	530	1615	42.0	55.8	0.0	46.7	45.0	39.7	36.5	35.8	13.8
2000	530	1630	44.5	57.2	0.0	49.9	47.8	41.8	37.6	36.8	12.7
2000	530	1645	43.2	58.2	0.0	48.1	46.2	40.7	37.0	36.3	15.0
2000	530	1700	41.9	57.1	0.0	46.6	44.9	39.5	35.8	34.8	15.2
2000	530	1715	42.4	57.9	0.0	46.7	44.8	39.9	35.5	34.5	15.5
2000	530	1730	42.0	55.7	0.0	46.8	44.9	40.0	36.5	35.4	13.7
2000	530	1745	42.6	59.0	0.0	47.1	45.2	39.2	35.7	35.0	16.4
2000	530	1800	41.7	54.0	0.0	46.5	44.6	39.6	35.7	34.5	12.3
2000	530	1815	41.6	55.5	0.0	46.9	44.5	39.3	35.1	34.0	13.9
2000	530	1830	41.7	54.0	0.0	47.1	45.5	38.9	34.2	33.1	12.3
2000	530	1845	40.4	56.4	0.0	45.0	43.4	38.1	34.7	33.5	16.0
2000	530	1900	41.6	60.2	0.0	46.4	44.4	38.8	34.1	33.2	18.6
2000	530	1915	41.7	55.8	0.0	47.2	45.0	38.1	33.0	31.4	14.1
2000	530	1930	39.3	53.0	0.0	44.6	42.7	36.0	31.4	30.6	13.7
2000	530	1945	41.9	60.5	0.0	46.4	43.7	35.2	30.7	29.6	18.6
2000	530	2000	40.5	59.3	0.0	46.0	43.3	35.8	31.3	30.2	18.8
2000	530	2015	38.6	51.8	0.0	44.0	41.8	35.6	30.9	29.8	13.2
2000	530	2030	40.0	56.7	0.0	45.1	42.9	35.4	30.1	28.8	16.7
2000	530	2045	40.3	55.8	0.0	46.7	43.8	36.3	30.6	28.6	15.5
2000	530	2100	38.7	51.4	0.0	43.9	41.8	36.1	30.4	29.1	12.7
2000	530	2115	37.9	49.1	0.0	43.4	41.4	35.3	30.7	29.6	11.2
2000	530	2130	37.0	54.7	0.0	42.3	40.2	34.5	30.1	29.2	17.7
2000	530	2145	38.0	56.4	0.0	42.8	40.6	34.9	29.4	28.4	18.4
2000	530	2200	39.6	58.0	0.0	45.3	42.9	33.6	28.1	27.0	18.4
2000	530	2215	39.3	55.6	0.0	44.9	42.5	35.5	30.0	27.9	16.3
2000	530	2230	38.9	55.3	0.0	44.6	42.3	34.2	29.2	28.3	16.4
2000	530	2245	42.7	61.4	0.0	49.1	45.5	35.9	29.2	27.8	18.7
2000	530	2300	35.8	52.8	0.0	41.5	39.1	32.1	25.7	24.7	17.0
2000	530	2315	38.4	55.4	0.0	43.9	41.3	32.4	26.1	25.1	17.0
2000	530	2330	35.7	51.9	0.0	41.4	39.0	31.2	25.3	24.4	16.2
2000	530	2345	36.7	55.0	0.0	42.5	40.2	30.9	24.6	23.6	18.3
2000	530	0	37.6	55.4	0.0	44.4	39.3	28.4	23.1	22.3	17.8

DAY 4	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	Leq, 24 hours	between 00:00 and 24:00 hours	41.9	dB(A)
Night Time	Leq, 8 hours	between 22:00 and 06:00 hours	37.2	dB(A)
Daytime	Leq, 15 hours	between 07:00 and 22:00 hours	43.1	dB(A)
Night Time	Leq, 9 hours	between 22:00 and 07:00 hours	38.3	dB(A)
Daytime	L10, 18 hours	between 06:00 and 24:00 hours	45.0	dB(A)
Daytime	max Leq, 1 hour	between 07:00 and 22:00 hours	45.3	dB(A)
Daytime	minimum L90, 15 min	between 07:00 and 18:00 hours	34.1	dB(A)

John The Baptist Primary School - Portable Building											DAY 5
Wednesday 31 May 2000									RION NL14		
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	L95	Lmax - Leq
2000	530	2215	39.3	55.6	0.0	44.9	42.5	35.5	30.0	27.9	16.3
2000	530	2230	38.9	55.3	0.0	44.6	42.3	34.2	29.2	28.3	16.4
2000	530	2245	42.7	61.4	0.0	49.1	45.5	35.9	29.2	27.8	18.7
2000	530	2300	35.8	52.8	0.0	41.5	39.1	32.1	25.7	24.7	17.0
2000	530	2315	38.4	55.4	0.0	43.9	41.3	32.4	26.1	25.1	17.0
2000	530	2330	35.7	51.9	0.0	41.4	39.0	31.2	25.3	24.4	16.2
2000	530	2345	36.7	55.0	0.0	42.5	40.2	30.9	24.6	23.6	18.3
2000	530	0	37.6	55.4	0.0	44.4	39.3	28.4	23.1	22.3	17.8
2000	531	15	30.8	45.9	0.0	36.1	33.3	25.9	21.4	20.8	15.1
2000	531	30	35.8	55.6	0.0	42.4	38.4	27.0	22.5	22.1	19.8
2000	531	45	33.6	53.4	0.0	39.6	35.4	25.2	21.3	20.9	19.8
2000	531	100	33.6	48.8	0.0	41.4	37.2	25.6	20.9	20.6	15.2
2000	531	115	34.6	48.6	0.0	41.8	39.5	26.0	21.7	21.2	14.0
2000	531	130	33.1	51.2	0.0	38.3	34.0	24.6	21.3	20.8	18.1
2000	531	145	36.5	54.1	0.0	43.3	37.6	25.2	20.6	20.3	17.6
2000	531	200	33.4	52.2	0.0	40.2	33.4	22.4	20.2	19.9	18.8
2000	531	215	34.1	52.6	0.0	35.7	32.6	23.0	20.6	20.3	18.5
2000	531	230	36.5	50.8	0.0	43.7	41.8	28.1	22.3	21.8	14.3
2000	531	245	33.8	48.1	0.0	41.6	37.2	24.9	21.3	20.9	14.3
2000	531	300	36.5	54.2	0.0	43.1	41.0	29.1	23.3	22.6	17.7
2000	531	315	37.5	55.3	0.0	43.4	38.6	28.8	22.5	21.9	17.8
2000	531	330	41.1	63.0	0.0	44.7	38.5	25.8	21.8	21.4	21.9
2000	531	345	39.2	53.5	0.0	45.9	43.5	30.9	24.8	23.8	14.3
2000	531	400	31.9	50.0	0.0	38.6	34.2	24.6	22.0	21.7	18.1
2000	531	415	34.5	53.6	0.0	40.1	35.7	26.4	22.9	22.5	19.1
2000	531	430	38.3	54.7	0.0	45.0	42.2	32.5	26.4	25.1	16.4
2000	531	445	38.6	52.2	0.0	44.9	42.9	33.5	26.2	25.4	13.6
2000	531	500	40.6	54.0	0.0	47.1	45.0	35.8	29.6	27.8	13.4
2000	531	515	40.9	58.1	0.0	47.1	44.8	35.8	30.0	28.3	17.2
2000	531	530	42.3	55.8	0.0	47.6	45.5	39.6	34.0	32.7	13.5
2000	531	545	41.8	55.0	0.0	46.9	45.0	39.7	34.1	32.9	13.2
2000	531	600	41.5	54.6	0.0	46.4	44.6	38.9	33.7	32.1	13.1
2000	531	615	43.7	56.1	0.0	48.6	46.9	41.2	37.6	36.5	12.4
2000	531	630	42.2	58.6	0.0	46.0	44.5	40.5	37.4	36.7	16.4
2000	531	645	45.1	60.4	0.0	50.4	48.1	41.4	38.6	37.9	15.3
2000	531	700	43.2	56.0	0.0	47.8	46.2	41.4	37.2	36.3	12.8
2000	531	715	42.9	57.3	0.0	47.5	45.7	41.1	37.2	35.7	14.4
2000	531	730	41.9	52.5	0.0	45.8	44.6	40.5	37.3	36.5	10.6
2000	531	745	42.6	57.4	0.0	47.1	45.4	40.8	37.2	36.6	14.8
2000	531	800	41.3	54.2	0.0	46.0	44.1	39.2	35.5	34.8	12.9
2000	531	815	42.2	56.4	0.0	46.6	44.9	40.4	37.0	36.2	14.2
2000	531	830	43.1	67.0	0.0	47.3	45.5	40.8	37.3	36.5	23.9
2000	531	845	44.9	64.3	0.0	50.2	47.1	42.4	39.2	38.4	19.4
2000	531	900	46.5	67.9	0.0	51.5	49.7	42.9	38.5	37.5	21.4
2000	531	915	46.7	68.2	0.0	50.9	48.6	42.3	38.8	37.7	21.5
2000	531	930	46.8	70.1	0.0	50.1	47.4	42.6	39.0	38.3	23.3
2000	531	945	43.7	62.2	0.0	47.9	46.0	40.9	36.2	35.1	18.5
2000	531	1000	45.0	64.9	0.0	48.9	46.3	40.2	36.4	35.6	19.9
2000	531	1015	43.9	56.8	0.0	48.3	46.7	42.2	38.4	37.4	12.9
2000	531	1030	43.9	56.6	0.0	49.4	47.4	40.3	36.6	35.8	12.7
2000	531	1045	46.1	63.4	0.0	49.7	47.0	42.0	37.9	36.8	17.3
2000	531	1100	46.4	66.0	0.0	51.1	49.1	43.5	37.1	36.2	19.6
2000	531	1115	44.5	58.5	0.0	48.6	47.0	42.5	39.5	38.7	14.0
2000	531	1130	46.3	62.6	0.0	49.8	48.1	44.5	41.4	40.6	16.3
2000	531	1145	46.6	60.3	0.0	50.6	48.8	44.2	41.2	40.4	13.7
2000	531	1200	45.3	59.8	0.0	48.8	46.7	42.4	37.4	36.1	14.5
2000	531	1215	43.5	69.3	0.0	47.6	45.9	41.2	36.4	35.3	25.8
2000	531	1230	44.9	63.3	0.0	50.2	47.7	41.1	36.1	35.1	18.4
2000	531	1245	44.3	58.7	0.0	49.9	47.5	41.1	36.3	35.1	14.4
2000	531	1300	41.8	52.4	0.0	46.6	45.0	39.9	36.0	34.8	10.6
2000	531	1315	44.5	59.1	0.0	49.6	47.6	42.2	37.9	37.0	14.6
2000	531	1330	43.1	57.4	0.0	47.8	46.3	40.3	35.0	33.6	14.3
2000	531	1345	45.8	64.3	0.0	50.8	48.5	42.4	37.8	36.4	18.5
2000	531	1400	42.6	56.4	0.0	47.0	45.6	40.9	36.4	35.2	13.8
2000	531	1415	44.8	68.1	0.0	49.9	47.8	42.1	38.1	37.2	23.3
2000	531	1430	42.4	56.0	0.0	47.2	45.2	40.7	37.0	35.7	13.6
2000	531	1445	43.0	54.6	0.0	47.8	46.1	41.2	36.9	35.7	11.6
2000	531	1500	43.9	62.2	0.0	48.5	46.9	41.9	37.4	36.3	18.3
2000	531	1515	42.8	61.1	0.0	47.4	46.2	41.8	37.1	36.0	18.3
2000	531	1530	42.0	59.9	0.0	46.5	45.1	39.5	36.2	35.5	17.9
2000	531	1545	42.7	57.9	0.0	47.2	45.4	39.9	36.2	35.4	15.2
2000	531	1600	42.6	54.3	0.0	47.5	45.5	40.7	37.3	36.6	11.7
2000	531	1615	41.3	56.1	0.0	46.0	43.8	39.4	35.9	35.1	14.8
2000	531	1630	42.7	56.2	0.0	47.8	45.8	40.0	35.9	34.9	13.5
2000	531	1645	43.4	57.6	0.0	48.4	46.3	40.9	37.0	36.2	14.2
2000	531	1700	42.5	61.5	0.0	47.0	45.4	40.3	36.4	35.3	19.0
2000	531	1715	42.8	57.8	0.0	47.1	45.4	40.4	37.3	36.7	15.0
2000	531	1730	41.3	54.7	0.0	45.7	44.2	39.0	35.6	34.8	13.4
2000	531	1745	40.8	54.5	0.0	45.5	43.7	38.7	35.5	34.6	13.7
2000	531	1800	42.1	55.6	0.0	47.1	45.3	39.6	36.4	35.7	13.5
2000	531	1815	41.1	54.0	0.0	46.2	44.2	38.8	35.2	34.4	12.9
2000	531	1830	41.4	54.7	0.0	46.5	44.9	38.9	35.1	33.8	13.3
2000	531	1845	41.0	57.7	0.0	46.1	43.4	37.9	34.1	32.5	16.7
2000	531	1900	40.8	57.0	0.0	45.2	43.5	38.2	34.2	32.9	16.2
2000	531	1915	41.3	57.5	0.0	46.8	44.1	37.1	33.0	30.9	16.2
2000	531	1930	40.1	51.8	0.0	45.8	44.1	36.8	32.7	31.7	11.7
2000	531	1945	41.8	60.4	0.0	47.0	44.7	37.9	33.3	32.3	18.6
2000	531	2000	40.3	56.0	0.0	45.4	43.5	36.6	32.3	31.5	15.7
2000	531	2015	39.5	55.2	0.0	44.7	42.5	35.8	31.0	29.9	15.7
2000	531	2030	39.3	56.5	0.0	44.6	41.9	35.6	31.2	30.3	17.2
2000	531	2045	39.0	53.9	0.0	44.6	42.3	35.1	29.5	28.5	14.9
2000	531	2100	38.3	55.0	0.0	43.7	41.6	34.9	29.9	28.8	16.7
2000	531	2115	38.5	53.3	0.0	44.6	42.3	35.1	30.1	29.1	14.8
2000	531	2130	37.9	51.2	0.0	43.8	41.8	34.6	29.7	28.5	13.3
2000	531	2145	37.1	53.1	0.0	42.3	39.8	33.8	29.2	27.6	16.0
2000	531	2200	36.9	49.8	0.0	42.7	40.4	33.4	28.0	27.0	12.9
2000	531	2215	38.4	56.2	0.0	44.6	41.2	33.9	28.6	27.4	17.8
2000	531	2230	37.2	54.4	0.0	42.6	39.4	32.7	27.1	26.2	17.2
2000	531	2245	38.1	54.1	0.0	43.6	41.2	33.5	27.8	26.9	16.0
2000	531	2300	39.8	61.0	0.0	44.4	41.6	33.7	28.2	27.0	21.2
2000	531	2315	37.2	51.6	0.0	43.3	41.0	32.2	26.3	25.1	14.4
2000	531	2330	37.5	54.7	0.0	43.1	40.4	31.8	26.9	25.7	17.2
2000	531	2345	37.7	54.2	0.0	43.9	41.7	32.0	25.5	24.5	16.5
2000	531	0	35.3	55.4	0.0	41.8	38.8	28.9	23.3	22.5	20.1

DAY 5	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	Leq, 24 hours	between 00:00 and 24:00 hours	42.1	dB(A)
Night Time	Leq, 8 hours	between 22:00 and 06:00 hours	38.0	dB(A)
Daytime	Leq, 15 hours	between 07:00 and 22:00 hours	43.2	dB(A)
Night Time	Leq, 9 hours	between 22:00 and 07:00 hours	39.3	dB(A)
Daytime	L10, 18 hours	between 06:00 and 24:00 hours	44.9	dB(A)
Daytime	max Leq, 1 hour	between 07:00 and 22:00 hours	45.8	dB(A)
Daytime	minimum L90, 15 min	between 07:00 and 18:00 hours	35.0	dB(A)

John The Baptist Primary School - Portable Building										DAY 6	
Thursday 1 June 2000									RION NL14		
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	L95	Lmax - Leq
2000	531	2215	38.4	56.2	0.0	44.6	41.2	33.9	28.6	27.4	17.8
2000	531	2230	37.2	54.4	0.0	42.6	39.4	32.7	27.1	26.2	17.2
2000	531	2245	38.1	54.1	0.0	43.6	41.2	33.5	27.8	26.9	16.0
2000	531	2300	39.8	61.0	0.0	44.4	41.6	33.7	28.2	27.0	21.2
2000	531	2315	37.2	51.6	0.0	43.3	41.0	32.2	26.3	25.1	14.4
2000	531	2330	37.5	54.7	0.0	43.1	40.4	31.8	26.9	25.7	17.2
2000	531	2345	37.7	54.2	0.0	43.9	41.7	32.0	25.5	24.5	16.5
2000	531	0	35.3	55.4	0.0	41.8	38.8	28.9	23.3	22.5	20.1
2000	601	15	32.6	47.8	0.0	38.2	34.6	27.5	22.2	21.6	15.2
2000	601	30	32.3	50.8	0.0	37.8	35.0	26.8	22.6	21.9	18.5
2000	601	45	36.9	54.9	0.0	41.1	34.9	26.7	21.7	21.1	18.0
2000	601	100	37.4	56.5	0.0	40.8	37.8	26.9	21.3	20.8	19.1
2000	601	115	39.1	60.8	0.0	44.9	40.3	26.5	21.6	21.1	21.7
2000	601	130	32.6	50.3	0.0	38.4	34.2	25.8	21.5	21.0	17.7
2000	601	145	32.7	55.1	0.0	37.1	33.7	23.0	20.1	19.9	22.4
2000	601	200	37.1	55.2	0.0	43.9	40.1	27.2	22.1	21.5	18.1
2000	601	215	36.5	56.3	0.0	40.0	35.7	27.3	20.0	19.8	19.8
2000	601	230	34.6	51.3	0.0	41.8	37.5	26.4	20.8	20.4	16.7
2000	601	245	34.8	54.1	0.0	41.4	38.5	27.9	22.4	21.8	19.3
2000	601	300	37.2	52.8	0.0	44.2	41.1	27.0	20.8	20.3	15.6
2000	601	315	36.3	53.6	0.0	42.0	39.3	26.6	21.3	20.9	17.3
2000	601	330	39.9	54.3	0.0	47.0	44.7	31.3	25.1	24.0	14.4
2000	601	345	35.0	51.5	0.0	42.2	39.1	27.5	23.2	22.7	16.5
2000	601	400	39.3	55.1	0.0	47.2	43.3	27.6	22.2	21.7	15.8
2000	601	415	33.2	48.8	0.0	39.3	36.4	26.6	22.8	22.1	15.6
2000	601	430	39.3	52.9	0.0	45.2	43.2	33.9	27.4	25.7	13.6
2000	601	445	42.0	60.2	0.0	46.8	44.9	35.7	29.1	27.1	18.2
2000	601	500	40.3	57.4	0.0	46.5	44.2	34.6	26.8	25.4	17.1
2000	601	515	41.2	57.6	0.0	47.0	44.8	36.5	30.7	29.8	16.4
2000	601	530	42.7	55.6	0.0	48.0	46.1	39.5	33.8	32.6	12.9
2000	601	545	43.4	60.3	0.0	48.1	46.1	41.1	35.7	34.2	16.9
2000	601	600	42.0	52.7	0.0	46.4	44.9	40.1	35.8	34.8	10.7
2000	601	615	44.1	56.8	0.0	48.4	47.1	42.1	38.8	38.1	12.7
2000	601	630	43.4	54.7	0.0	48.0	46.3	41.8	38.4	37.5	11.3
2000	601	645	43.0	54.7	0.0	47.2	45.8	41.7	38.6	37.7	11.7
2000	601	700	42.2	59.1	0.0	46.8	45.2	40.2	36.0	35.0	16.9
2000	601	715	42.2	57.4	0.0	46.3	44.8	40.6	36.2	34.9	15.2
2000	601	730	42.3	54.2	0.0	47.3	45.9	40.1	36.7	36.0	11.9
2000	601	745	44.1	61.8	0.0	49.3	45.3	40.1	36.5	35.8	17.7
2000	601	800	42.5	55.1	0.0	46.8	45.3	41.0	37.4	36.6	12.6
2000	601	815	43.9	56.9	0.0	48.7	46.8	41.7	38.4	37.7	13.0
2000	601	830	43.8	56.9	0.0	48.6	46.7	42.3	38.4	37.6	13.1
2000	601	845	44.1	57.0	0.0	48.5	47.0	42.4	38.6	37.8	12.9
2000	601	900	45.5	73.4	0.0	48.7	47.3	42.2	38.2	37.4	27.9
2000	601	915	42.6	57.4	0.0	46.8	45.4	40.8	37.2	36.2	14.8
2000	601	930	43.1	60.3	0.0	47.4	46.0	40.4	35.7	34.5	17.2
2000	601	945	44.1	60.4	0.0	49.0	46.7	40.6	35.9	34.3	16.3
2000	601	1000	42.4	55.2	0.0	47.6	45.8	40.2	35.0	33.6	12.8
2000	601	1015	43.1	56.5	0.0	48.2	46.2	40.3	35.4	34.1	13.4
2000	601	1030	45.8	72.9	0.0	49.9	47.8	41.2	36.5	35.2	27.1
2000	601	1045	43.5	56.3	0.0	48.2	46.5	41.6	36.9	35.4	12.8
2000	601	1100	44.8	62.5	0.0	50.4	48.4	40.4	35.6	34.3	17.7
2000	601	1115	46.9	64.5	0.0	49.5	46.4	41.2	36.5	34.8	17.6
2000	601	1130	45.0	60.4	0.0	48.9	47.1	42.4	39.2	38.3	15.4
2000	601	1145	44.0	54.9	0.0	48.1	46.6	42.7	39.4	38.5	10.9
2000	601	1200	44.3	59.3	0.0	48.5	47.0	42.0	37.8	36.8	15.0
2000	601	1215	44.0	60.9	0.0	49.1	47.4	41.8	36.0	34.9	16.9
2000	601	1230	42.8	56.6	0.0	47.3	45.7	40.6	35.8	34.8	13.8
2000	601	1245	43.6	59.6	0.0	48.3	46.6	40.7	35.7	34.8	16.0
2000	601	1300	43.3	58.5	0.0	48.0	46.3	40.7	35.7	34.3	15.2
2000	601	1315	43.1	58.1	0.0	47.9	45.7	40.9	35.9	34.7	15.0
2000	601	1330	42.2	55.9	0.0	47.1	45.4	39.9	35.3	34.4	13.7
2000	601	1345	44.0	61.0	0.0	48.6	46.7	40.5	35.2	34.1	17.0
2000	601	1400	44.0	61.9	0.0	47.9	46.0	40.6	36.4	35.1	17.9
2000	601	1415	45.3	61.4	0.0	50.9	48.4	41.6	37.2	36.2	16.1
2000	601	1430	43.5	59.4	0.0	48.3	46.6	41.3	36.8	35.8	15.9
2000	601	1445	44.4	66.4	0.0	47.0	45.5	40.4	36.5	35.4	22.0
2000	601	1500	43.3	58.5	0.0	48.2	46.6	40.9	36.7	35.7	15.2
2000	601	1515	42.8	58.9	0.0	47.3	44.5	40.2	35.4	34.2	16.1
2000	601	1530	41.2	63.8	0.0	45.5	43.7	38.3	34.9	34.1	22.6
2000	601	1545	41.4	53.8	0.0	45.8	44.2	39.4	35.7	34.9	12.4
2000	601	1600	42.6	54.9	0.0	47.7	45.7	40.0	35.7	34.9	12.3
2000	601	1615	42.4	54.8	0.0	47.5	45.3	40.1	35.5	34.7	12.4
2000	601	1630	42.0	54.0	0.0	47.3	45.1	39.5	35.7	34.6	12.0
2000	601	1645	42.0	55.2	0.0	46.8	45.3	40.1	36.2	35.3	13.2
2000	601	1700	41.9	55.9	0.0	47.7	45.4	38.9	34.7	33.8	14.0
2000	601	1715	41.0	55.1	0.0	44.9	43.6	39.3	36.1	35.2	14.1
2000	601	1730	40.7	59.2	0.0	45.6	43.5	38.8	34.6	33.7	18.5
2000	601	1745	41.6	56.9	0.0	46.1	44.1	39.1	35.4	34.5	15.3
2000	601	1800	41.6	53.8	0.0	46.3	44.5	39.5	36.5	35.5	12.2
2000	601	1815	41.2	53.7	0.0	45.3	43.8	39.8	36.9	36.2	12.5
2000	601	1830	43.1	59.1	0.0	48.6	46.4	39.2	35.3	34.2	16.0
2000	601	1845	41.6	57.7	0.0	46.4	44.4	39.3	35.1	33.5	16.1
2000	601	1900	40.9	55.3	0.0	45.3	43.9	38.7	34.7	33.4	14.4
2000	601	1915	40.6	61.5	0.0	44.3	42.6	37.0	30.9	29.7	20.9
2000	601	1930	39.4	56.3	0.0	44.0	42.3	36.9	32.2	31.1	16.9
2000	601	1945	41.1	56.3	0.0	46.2	44.0	37.0	31.9	31.0	15.2
2000	601	2000	39.7	56.9	0.0	44.5	42.4	36.1	31.3	30.3	17.2
2000	601	2015	37.5	52.0	0.0	42.5	40.5	35.2	30.6	29.2	14.5
2000	601	2030	42.0	59.9	0.0	46.1	43.3	35.4	29.8	28.6	17.9
2000	601	2045	39.5	52.8	0.0	46.1	43.4	35.1	29.9	28.6	13.3
2000	601	2100	38.8	55.7	0.0	43.9	42.0	35.5	30.7	29.6	16.9
2000	601	2115	40.2	54.4	0.0	45.7	43.4	37.0	32.2	31.4	14.2
2000	601	2130	37.9	50.6	0.0	43.2	40.8	35.4	31.1	30.4	12.7
2000	601	2145	38.6	53.9	0.0	43.8	42.0	35.9	30.5	28.9	15.3
2000	601	2200	38.4	53.5	0.0	42.7	40.9	35.4	30.1	29.0	15.1
2000	601	2215	37.9	51.6	0.0	44.2	41.5	33.4	28.3	27.3	13.7
2000	601	2230	38.5	51.7	0.0	44.0	41.8	34.8	29.4	27.7	13.2
2000	601	2245	39.1	52.5	0.0	45.0	42.8	34.9	29.4	28.2	13.4
2000	601	2300	39.3	58.1	0.0	44.5	41.8	33.8	28.4	27.5	18.8
2000	601	2315	36.2	55.6	0.0	41.1	38.7	32.2	27.4	26.3	19.4
2000	601	2330	36.3	52.5	0.0	42.4	40.4	32.4	26.3	24.4	16.2
2000	601	2345	38.7	57.3	0.0	43.6	40.6	31.7	25.4	24.0	18.6
2000	601	0	33.5	48.8	0.0	40.9	36.4	28.2	23.6	22.8	15.3

DAY 6	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	Leq, 24 hours	between 00:00 and 24:00 hours	41.8	dB(A)
Night Time	Leq, 8 hours	between 22:00 and 06:00 hours	38.4	dB(A)
Daytime	Leq, 15 hours	between 07:00 and 22:00 hours	42.8	dB(A)
Night Time	Leq, 9 hours	between 22:00 and 07:00 hours	39.4	dB(A)
Daytime	L10, 18 hours	between 06:00 and 24:00 hours	44.7	dB(A)
Daytime	max Leq, 1 hour	between 07:00 and 22:00 hours	45.2	dB(A)
Daytime	minimum L90, 15 min	between 07:00 and 18:00 hours	34.6	dB(A)

John The Baptist Primary School - Portable Building											DAY 7
Friday 2 June 2000									RION NL14		
YEAR	MoDy	TIME	Leq	Lmax	L1	L5	L10	L50	L90	L95	Lmax - Leq
2000	601	2215	37.9	51.6	0.0	44.2	41.5	33.4	28.3	27.3	13.7
2000	601	2230	38.5	51.7	0.0	44.0	41.8	34.8	29.4	27.7	13.2
2000	601	2245	39.1	52.5	0.0	45.0	42.8	34.9	29.4	28.2	13.4
2000	601	2300	39.3	58.1	0.0	44.5	41.8	33.8	28.4	27.5	18.8
2000	601	2315	36.2	55.6	0.0	41.1	38.7	32.2	27.4	26.3	19.4
2000	601	2330	36.3	52.5	0.0	42.4	40.4	32.4	26.3	24.4	16.2
2000	601	2345	38.7	57.3	0.0	43.6	40.6	31.7	25.4	24.0	18.6
2000	601	0	33.5	48.8	0.0	40.9	36.4	28.2	23.6	22.8	15.3
2000	602	15	35.8	54.1	0.0	42.6	39.2	29.7	24.5	23.5	18.3
2000	602	30	33.1	49.4	0.0	38.7	36.1	28.1	22.4	21.3	16.3
2000	602	45	36.0	53.5	0.0	42.5	38.8	28.4	22.2	21.5	17.5
2000	602	100	34.2	53.3	0.0	37.9	35.2	24.6	20.9	20.5	19.1
2000	602	115	36.4	54.6	0.0	42.7	39.0	28.2	21.6	20.9	18.2
2000	602	130	33.4	49.6	0.0	40.0	36.6	26.9	21.3	20.9	16.2
2000	602	145	36.1	56.6	0.0	42.7	39.8	27.5	21.7	21.0	20.5
2000	602	200	34.8	54.7	0.0	41.2	37.9	25.3	21.2	20.7	19.9
2000	602	215	35.1	53.5	0.0	41.4	38.0	27.5	22.5	21.8	18.4
2000	602	230	35.5	50.3	0.0	42.4	39.7	26.9	21.9	21.2	14.8
2000	602	245	34.0	53.9	0.0	38.8	34.2	23.8	21.3	20.9	19.9
2000	602	300	37.4	52.9	0.0	44.6	41.1	27.8	21.9	21.4	15.5
2000	602	315	35.8	54.4	0.0	42.6	39.1	26.1	22.0	21.5	18.6
2000	602	330	39.5	56.8	0.0	45.4	42.2	29.6	23.1	22.3	17.3
2000	602	345	31.7	48.6	0.0	37.9	34.6	26.3	21.7	20.9	16.9
2000	602	400	38.0	55.8	0.0	44.6	41.4	29.8	23.4	22.5	17.8
2000	602	415	37.1	54.0	0.0	43.7	41.1	31.2	24.1	23.0	16.9
2000	602	430	42.6	56.3	0.0	50.4	46.4	33.6	25.4	24.4	13.7
2000	602	445	42.8	60.5	0.0	47.8	44.9	33.9	27.3	26.1	17.7
2000	602	500	39.6	55.2	0.0	46.1	43.7	34.2	25.6	24.4	15.6
2000	602	515	42.7	59.3	0.0	48.3	45.6	37.6	31.4	30.1	16.6
2000	602	530	41.9	60.2	0.0	47.1	44.6	38.3	33.3	32.3	18.3
2000	602	545	42.8	55.0	0.0	48.8	46.2	39.9	35.8	34.5	12.2
2000	602	600	42.6	55.2	0.0	47.9	46.0	40.1	35.4	34.3	12.6
2000	602	615	43.1	56.3	0.0	47.5	45.5	40.7	37.3	36.6	13.2
2000	602	630	43.4	55.3	0.0	48.0	46.2	41.4	36.7	35.7	11.9
2000	602	645	42.2	52.5	0.0	46.3	45.1	40.9	37.0	36.2	10.3
2000	602	700	42.3	56.5	0.0	46.6	45.2	40.6	37.3	36.2	14.2
2000	602	715	44.4	67.3	0.0	47.8	45.6	40.4	36.4	35.6	22.9
2000	602	730	42.5	53.6	0.0	46.6	45.5	41.0	37.7	37.2	11.1
2000	602	745	42.4	54.1	0.0	47.2	45.4	40.5	37.2	36.3	11.7
2000	602	800	40.9	57.5	0.0	44.7	43.3	39.6	36.6	36.0	16.6
2000	602	815	43.6	58.5	0.0	47.1	45.8	41.7	37.9	36.9	14.9
2000	602	830	43.1	56.4	0.0	47.8	45.8	40.9	37.8	36.9	13.3
2000	602	845	46.4	69.1	0.0	50.2	47.9	42.7	38.6	37.7	22.7
2000	602	900	46.6	67.9	0.0	50.6	48.8	42.7	39.1	38.4	21.3
2000	602	915	41.7	53.2	0.0	46.3	44.7	40.0	35.9	34.9	11.5
2000	602	930	43.4	56.8	0.0	47.8	46.2	41.9	37.7	36.1	13.4
2000	602	945	43.0	55.7	0.0	47.3	45.9	41.3	36.7	35.8	12.7
2000	602	1000	42.8	55.6	0.0	47.4	45.9	41.0	36.6	35.6	12.8
2000	602	1015	43.3	58.1	0.0	47.6	46.2	41.6	37.3	36.4	14.8
2000	602	1030	44.4	58.5	0.0	49.4	47.2	41.3	37.0	36.3	14.1
2000	602	1045	44.6	58.9	0.0	49.8	48.2	41.5	37.1	36.1	14.3
2000	602	1100	47.9	73.1	0.0	53.9	51.5	41.8	36.7	35.8	25.2
2000	602	1115	45.8	63.2	0.0	49.7	47.7	43.1	38.9	37.8	17.4
2000	602	1130	45.6	62.1	0.0	49.4	47.9	43.8	40.6	39.8	16.5
2000	602	1145	45.1	56.9	0.0	48.9	47.5	43.8	40.9	39.9	11.8
2000	602	1200	47.0	65.5	0.0	51.8	49.2	43.4	39.7	38.8	18.5
2000	602	1215	45.7	67.4	0.0	50.3	48.3	43.3	38.5	37.2	21.7
2000	602	1230	44.1	62.1	0.0	48.1	47.0	42.6	38.2	37.0	18.0
2000	602	1245	43.3	57.2	0.0	47.4	45.9	41.5	37.3	36.5	13.9
2000	602	1300	42.1	55.2	0.0	46.7	45.0	40.2	36.8	35.9	13.1
2000	602	1315	42.5	56.3	0.0	47.1	45.5	40.5	36.5	35.6	13.8
2000	602	1330	42.6	52.8	0.0	47.3	45.9	40.9	36.6	35.9	10.2
2000	602	1345	45.8	67.9	0.0	50.7	48.8	42.1	37.9	36.8	22.1
2000	602	1400	44.0	62.6	0.0	48.1	46.6	41.4	37.9	36.9	18.6
2000	602	1415	43.6	60.5	0.0	47.4	46.3	41.9	38.2	36.7	16.9
2000	602	1430	44.3	56.6	0.0	48.6	47.0	42.6	38.7	37.7	12.3
2000	602	1445	44.1	64.1	0.0	48.5	46.9	41.9	37.9	36.8	20.0
2000	602	1500	43.1	59.1	0.0	47.5	45.8	41.2	37.3	36.4	16.0
2000	602	1515	43.5	59.8	0.0	48.2	45.3	41.1	37.6	36.8	16.3
2000	602	1530	44.3	64.0	0.0	49.8	46.9	40.7	37.2	36.6	19.7
2000	602	1545	42.4	53.9	0.0	46.8	45.4	40.8	36.2	35.2	11.5
2000	602	1600	42.4	55.4	0.0	47.1	45.6	39.8	36.1	35.1	13.0
2000	602	1615	42.7	59.5	0.0	47.8	45.8	40.1	36.1	34.9	16.8
2000	602	1630	41.2	53.2	0.0	46.0	44.6	39.4	35.2	34.4	12.0
2000	602	1645	41.9	56.0	0.0	46.4	44.9	39.8	35.7	34.7	14.1
2000	602	1700	41.9	57.4	0.0	46.7	44.6	39.7	35.7	34.5	15.5
2000	602	1715	41.5	62.0	0.0	45.6	44.0	39.3	35.6	34.3	20.5
2000	602	1730	40.6	55.0	0.0	45.7	43.9	38.0	34.5	33.8	14.4
2000	602	1745	40.8	52.7	0.0	45.4	44.0	38.8	35.1	34.2	11.9
2000	602	1800	41.0	58.1	0.0	45.3	43.7	38.9	35.0	33.9	17.1
2000	602	1815	40.2	50.3	0.0	44.4	43.0	38.8	35.8	34.9	10.1
2000	602	1830	40.3	55.2	0.0	45.2	43.0	37.8	34.4	33.7	14.9
2000	602	1845	41.4	55.0	0.0	46.3	44.7	38.7	35.4	34.5	13.6
2000	602	1900	40.5	57.9	0.0	45.3	43.5	38.2	34.3	33.2	17.4
2000	602	1915	41.1	55.6	0.0	45.9	43.8	38.2	34.2	33.2	14.5
2000	602	1930	40.3	52.6	0.0	45.2	43.5	37.9	33.4	32.5	12.3
2000	602	1945	42.6	60.9	0.0	47.4	44.9	38.5	34.0	32.6	18.3
2000	602	2000	41.0	55.7	0.0	46.4	44.0	36.6	33.2	32.5	14.7
2000	602	2015	39.4	55.1	0.0	45.0	42.3	36.6	31.8	30.5	15.7
2000	602	2030	39.7	54.0	0.0	45.1	42.8	36.8	32.3	30.6	14.3
2000	602	2045	39.8	55.4	0.0	44.8	42.7	36.0	30.7	29.3	15.6
2000	602	2100	37.1	59.8	0.0	42.0	39.3	33.7	29.9	28.5	22.7
2000	602	2115	38.1	54.8	0.0	42.6	40.8	35.6	30.9	29.8	16.7
2000	602	2130	37.8	53.5	0.0	42.9	40.8	34.7	30.3	28.9	15.7
2000	602	2145	39.6	58.5	0.0	44.2	41.9	35.0	30.0	29.0	18.9
2000	602	2200	38.2	54.1	0.0	43.6	41.4	33.8	28.3	27.5	15.9
2000	602	2215	36.8	53.3	0.0	42.2	39.3	33.9	28.6	27.2	16.5
2000	602	2230	40.7	54.4	0.0	47.1	44.2	36.1	29.3	28.1	13.7
2000	602	2245	37.2	55.7	0.0	42.9	40.1	33.3	27.8	26.5	18.5
2000	602	2300	38.5	52.5	0.0	44.2	42.1	35.1	30.5	29.4	14.0
2000	602	2315	36.2	52.1	0.0	41.2	39.1	33.9	28.9	27.2	15.9
2000	602	2330	36.5	51.6	0.0	42.0	39.7	33.3	28.7	27.7	15.1
2000	602	2345	34.9	49.4	0.0	40.1	38.2	32.4	27.7	26.8	14.5
2000	602	0	37.5	57.7	0.0	42.2	39.5	33.1	27.0	26.0	20.2

DAY 7	DESCRIPTOR	PERIOD	LEVEL	UNIT
Full Day	Leq, 24 hours	between 00:00 and 24:00 hours	42.1	dB(A)
Night Time	Leq, 8 hours	between 22:00 and 06:00 hours	38.5	dB(A)
Daytime	Leq, 15 hours	between 07:00 and 22:00 hours	43.1	dB(A)
Night Time	Leq, 9 hours	between 22:00 and 07:00 hours	39.3	dB(A)
Daytime	L10, 18 hours	between 06:00 and 24:00 hours	44.7	dB(A)
Daytime	max Leq, 1 hour	between 07:00 and 22:00 hours	45.9	dB(A)
Daytime	minimum L90, 15 min	between 07:00 and 18:00 hours	34.5	dB(A)