MOORABBIN AIRPORT ENVIRONMENT STRATEGY 2010

February 2010





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FOREWORD

MOOR ABBIN AIRPORT ENVIRONMENT STRATEGY 2010

Moorabbin Airport Corporation Pty Ltd is pleased to present the approved 2010 Environment Strategy.

There has been, and continues to be a strong commitment to environmental management at Moorabbin Airport and it is considered an integral part of the overall management of the Airport. The preparation and development of this Strategy builds on the current environmental management initiatives, outlining a program for further improvement over the next five year Strategy period.

The overall management objective of this Strategy is to continue to minimise potential environmental impacts, comply with regulatory requirements, and continually improve Moorabbin Airport's overall environmental management.

The updated Environmental Management System (EMS) that stems from this Strategy details the practices and procedures that Moorabbin Airport Corporation Pty Ltd (MAC) will maintain to protect the quality of the Airport's environment. It aims to minimise potential environmental impacts from Airport operations on our neighbours, and to ensure that MAC staff and Airport operators are accountable for their actions and comply with regulatory requirements.

This Strategy will be reviewed and updated to reflect ongoing improvements in environmental management practices every 5 years or more often with the approval of the Minister for Infrastructure, Transport, Regional Development and Local Government ("the Minister"). MAC will continue to report annually to the Minister on progress in relation to the programs and initiatives identified in this Strategy.

This Environment Strategy, as with previous strategies, has been prepared in accordance with the requirements of the *Airports Act 1996*. It incorporates a 5 - year plan for managing environmental issues arising from the various operations at Moorabbin Airport.

It must be noted however, that this document does not, and cannot address the environmental impacts of aircraft noise and pollution associated with aircraft operations. These issues are regulated separately under the *Commonwealth Air Navigation* (*Aircraft Engine Emissions*) Regulations 1995 and the *Commonwealth Air Navigation* (*Aircraft Noise*) Regulations 1984, that are the responsibility of Airservices Australia.

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P. McConnell

General Manager, Aviation Moorabbin Airport Corporation Pty Ltd

1 INTRODUCTION

MOOR ABBIN AIRPORT ENVIRONMENT STRATEGY 2010

1.1 Airports Act 1996

The Airports Act 1996 establishes the framework for the regulation of leased Federal Airports. The Act provides a system of separating the Airport Lessee Company (ALC), being the Airport operator, and Airport regulator roles. In the case of Moorabbin Airport, the regulatory role for environmental matters will continue to be provided by the Department of Infrastructure, Transport, Regional Development and Local Government (DITRDLG), as well as its Government-appointed Airport Environment Officer (AEO). Moorabbin Airport Corporation Pty Ltd, being the ALC, will continue to conduct the Airport operator role.

The approved 2010 Environment Strategy is a review of the previous 2004 Environment Strategy, approved by the Federal Minister for Infrastructure, Transport, Regional Development and Local Government under *Section 126* of the *Airports Act 1996*, on 10 August 2004 [herein referred to as the 2004 Environment Strategy]. This approved 2010 Environment Strategy follows on from the ongoing operation of the Airport and the implementation of the 2004 Environment Strategy over the past five years.

Under *Section 116* of the *Airports Act 1996*, an Airport Environment Strategy must, in general terms specify the following matters:

- the ALC's objectives for the environmental management of the airport;
- the areas, if any within the airport site which the ALC, in consultation with State or Territory and Federal conservation bodies, identifies as environmentally significant;
- the sources of environmental impact associated with airport operations;
- the studies, reviews and monitoring to be carried out by the ALC, in connection with the environmental impact associated with airport operations;
- the time frames for completion of those studies and reviews and for reporting on that monitoring;

- the specific measures to be carried out by the ALC, for the purposes of preventing, controlling or reducing the environmental impact associated with airport operations;
- the time frames for completion of those specific measures;
- details of the consultations undertaken in preparing the strategy (including the outcome of the consultations); and
- such other matters (if any) as are specified in the Regulations.

Other matters that are specified in the *Regulations*, namely under *Part 3 Environmental Strategies*, *Division 2 Additional Matters to be Specified in Environment Strategy* are:

- sites of indigenous significance;
- operations other than airport operations; and
- environmental management training.

The Moorabbin Airport Preliminary Draft Environment Strategy was prepared by Moorabbin Airport Corporation Pty Ltd for public comment prior to forwarding the Draft Environment Strategy to the DITRDLG for its appraisal to establish if the document fully satisfied the above criteria.

The Draft Environment Strategy was subsequently submitted and approved by the Minister on 25th February 2010.

The approved 2010 Environment Strategy relates to an operational period of 5 years, and will remain in force for this time or until another updated Environment Strategy is approved by the Minister.

1.2 Consultation

An open process of community consultation underpinned the exhibition of the Moorabbin Airport Preliminary Draft Environment Strategy. This consultation was undertaken in association with the exhibition period for the Preliminary Draft Environment Strategy.

The public consultation process has been a continuing component in the development of Environment Strategies. Consultations during the exhibition period occurred with the local community through:

- Public notice in local and statewide newspapers.
- Four meetings open to the general public
- Formal meetings and informal discussions with various representatives from the community and stakeholders.

Consultation (through meetings and informal discussions) occurred directly through the Moorabbin Airport Aviation Consultative Committee. Consultation also occurred informally with DITRDLG and the Airport Environment Officer.

1.3 Public Comments

1.3.1 Preliminary Draft Environment Strategy Advertising

Under the Airports Act 1996, the Preliminary Draft Environment Strategy was required to be placed on public exhibition for a period of 60 business days with an open invitation for public comment.

Copies of the Preliminary Draft Environment Strategy were made available from the Airport Management Centre at Moorabbin Airport during normal office hours from Wednesday 29 April - Wednesday 22 July 2009. In addition, a dedicated section on the Moorabbin Airport website allowed the viewing and downloading of the entire document. The website address is www.moorabbinairport.com.au

The public advertising process was an important part in the development of the Draft Environment Strategy and MAC addressed comments received over the 60-business day public comment period.

1.3.2 Submissions to the Preliminary Draft Environment Strategy

A total of 3 submissions were received during the public exhibition period of the Preliminary Draft Environment Strategy. These submissions were considered by MAC, and as a result of the comments received, the Preliminary Draft Environment Strategy did not require amendment, and consequently the Draft Environment Strategy remained unchanged.



Airport Layout

ENVIRONMENT STRATEGY OVERVIEW

MOOR ABBIN AIRPORT ENVIRONMENT STRATEGY 2010

2.1 Introduction

Environmental management continues to be an integral component of the overall management of Moorabbin Airport. In 1999, environmental management activities previously occurring informally and without a strategic focus were integrated into the *1999 Moorabbin Airport Environment Strategy*. As required by the *Act*, in 2004 the Environment Strategy was updated and a replacement forwarded to the Minister who approved the new 2004 Moorabbin Airport Environment Strategy on 10 August 2004.

As outlined in *Reg 3.04 - Operations other than Airport Operations of the Regulations*, the Environment Strategy applies to all operations carried out at Moorabbin Airport, whether they are connected or not with aviation.

2.2 Environmental Management Commitment

There has been, and continues to be a strong commitment to environmental management at the Airport over the years. This continues to be further strengthened by developing, implementing and updating the approved Environment Strategy that includes MAC's Environment Policy.

This Environment Policy in the approved Environment Strategy has been subject to periodic reviews, incorporates the principal guidelines and overall objectives that MAC is seeking to achieve, and demonstrates MAC's commitment to environmental management.

The overall management objective of the MAC Environment Policy is to minimise potential environmental impacts, comply with regulatory requirements, and continually improve environmental management at Moorabbin Airport.

The following Environment Policy has progressed from the previous MAC endorsed policy and reflects the current environmental management and performance status.



Moorabbin Airport Corporation Pty Ltd Environment Policy

Moorabbin Airport Corporation Pty Ltd is the Airport-Lessee Company that operates the Moorabbin Airport aerodrome. It recognises that it has a responsibility to maintain, and where practicable, enhance the quality of the environment at Moorabbin Airport.

With the commitment of the Board and senior management, **Moorabbin Airport Corporation Pty Ltd** will seek to continually improve its environmental performance through:

- continually monitoring and evaluating the environmental performance of the Airport that will assist in the development and ongoing review of objectives and targets;
- preventing and/or minimising pollution from activities carried out by implementing a range of measures from engineering pollution prevention and control, to increasing the environmental awareness of Airport stakeholders;
- complying with all statutory requirements with regard to existing regulations, codes of practice and quality standards;
- adopting industry standards applicable to the environmental management of aerodromes;
- implementing and maintaining the Environment Policy by adopting the Moorabbin Airport Corporation Pty Ltd Environment Management System;
- communicating this policy to Airport stakeholders that include employees, contractors and Airport tenants;
- providing adequate training and competent supervision; and
- implementing the Moorabbin Airport Environment Strategy.

Moorabbin Airport Environment Strategy, a cornerstone of the environmental management program for the Airport specifies:

- Moorabbin Airport Corporation Pty Ltd's objectives and targets for the environmental management of the Airport;
- areas identified as environmentally significant;
- the sources of environmental impact associated with operations at the Airport;
- the monitoring carried out by Moorabbin Airport Corporation Pty Ltd associated with the Airport operation's potential environmental impacts; and
- the measures carried out to control the environmental impacts.

2.3 The Environmental Regulatory Framework

The primary environmental legislation that ensures that environmental management is incorporated into the general management of an Airport is the Airports Act 1996 and the associated Airports (Environment Protection) Regulations 1997 ('Regulations').

Regarding the environmental regulatory framework, it must be noted that the legislative tools **do not** cover air pollution or noise generated by aircraft in flight, when landing, taking off or taxiing at the Airport. These issues are managed by Airservices Australia, a Federal Government Agency.

2.4 The 2004 Moorabbin Airport Environment Strategy Initiatives

Based on MAC's on-going commitment to environmental management in the 2004 Moorabbin Airport Environment Strategy, a number of key programs were carried out that provide the background to the new and ongoing programs to be implemented in the approved 2010 Environment Strategy. These programs were:

- 1. In consultation with the AEO, the stormwater monitoring program assessing the quality of water entering and leaving Moorabbin Airport continued to be reviewed and implemented.
- Annual environmental reviews continued to be carried out on environmentally significant tenants and/or facilities, including MAC (ie, aircraft maintenance activities, airport maintenance activities and on site manufacturing and warehousing).
- 3. Biennial environmental reviews of all tenants continued to be undertaken.
- 4. Through ongoing direct consultation, MAC provided guidance and encouraged tenants to comply with the *Airport (Environment Protection) Regulations* 1997 requirements. If required, relevant assistance from the AEO was also sought and was provided.
- 5. Remedial programs were developed and implemented to the satisfaction of the AEO for areas of the Airport where pollution was identified and confirmed by the AEO (eg, removal of a former cathodic protection bed and an underground fuel storage tank).

- 6. MAC updated its Requirements for Construction, Building and Operations at Moorabbin Airport information package for organisations wanting to carry out construction works and/or operate at the Airport. This information included requirements to provide environmental management information. Both MAC and the AEO continually reviewed EMPs to assess their suitability for the construction works to be carried out. To assess compliance with EMPs during construction, site audits continued to be undertaken by MAC and/or the AEO. MAC subsequently requested that a formalised EMP be prepared and submitted prior to the commencement of environmentally significant works.
- 7. MAC required operational EMPs from tenants with the potential for considerable environmental impact. To assess compliance with EMPs during operations, site audits continued to be carried out by MAC and/or the AEO.
- 8. MAC continued to carry out of a formal consultation process with the AEO where meetings have generally been held once a month and where the environmental management and performance of MAC, and the Airport in general were discussed.
- 9. An ongoing formal consultation process was carried out with relevant stakeholders other than the AEO, through the Moorabbin Airport Aviation Consultative Committee (MAACC). This committee includes representatives from DITRDLG, Airservices Australia, CASA, local, state and federal MPs, the state Department of Infrastructure, the City of Kingston, Airport tenants, the Dingley Village Community Association and the Moorabbin Airport Residents Association.
- Annual assessments of the MAC Environmental Management System (EMS) that were based on AS/NZS ISO 14001 "Environmental Management Systems - Specifications with Guidance for Use". This included updating and improving environmental management and operating procedures.
- 11. The installation of a total of 12 rainwater collection tanks with a combined storage capacity of just under 380 KL.
- 12. The development and maintenance of a chemicals register for the Airport.
- 13. Completed the *Updated Cultural Heritage Assessment* and the *Re-assessment of Flora and Fauna Values* of Moorabbin Airport

Other programs have also been carried out by MAC, however the above have been included to highlight the more significant programs undertaken. These best demonstrate the strong commitment MAC has on environmental management and performance.

2.5 The Preparation & Development of the Approved 2010 Moorabbin Airport Environment Strategy

This Environment Strategy ('*Strategy*') will build on the initiatives of the 2004 Moorabbin Airport Environment Strategy, seeking to further improve the environmental management and performance at the Airport. As detailed in **Section 5** of this *Strategy*, the Environmental Management Plan (EMP) will ensure that there is a program for achieving MAC's objectives and targets outlined in the EMS's updated Environment Policy.

Similar to the previous 2004 Environment Strategy, key aspects of this *Strategy* are detailed in the MAC EMS (Section 4) and EMP (Section 5). The following is a list of the key ongoing and new initiatives to be included in this *Strategy*:

- Based on the environmental management works carried out under the previous 2004 Environment Strategy, the new broad set of environmental management objectives are outlined and include policies and programs addressing the following:
 - on-going improvement in environmental outcomes from Airport activities;
 - continued implementation and review of the MAC EMS;
 - identifying and managing environmental risks and identifying any existing pollution, if any (included in the MAC EMP);
 - involvement of stakeholders, where appropriate, such as local community groups, Airport tenants and relevant government agencies in the ongoing environmental management and performance of the Airport; and
 - communicating the Environment Strategy and its performance to stakeholders.
- 2. Recommendations from risk assessments addressing potential environmentally significant areas will be incorporated into site management programs. If required, adjustments to relevant Environmental Management and/or Operating Procedures, and/or EMPs will be carried out.

- 3. Potential sources of environmental impacts associated with activities at the Airport shall continue to be included in this *Strategy*. These may include those activities that may have an impact upon air quality, water quality (including groundwater) and soil quality, as well as those activities that generate waste and noise emissions.
- Environmental reviews of airport users (and MAC) will continue to be carried out. Sources of potential environmental impact will continue to be assessed for their impact on air, water and soil quality, waste management and the generation of noise emissions.
- 5. In addition to the Environmental Reviews, investigations shall continue to be carried out where a potential environmental impact requires assessment or ongoing monitoring. Examples include site-specific land contamination assessments due to activities carried out at a particular site, or stormwater quality investigations that periodically monitor the Airport's impact on the local surface waters.
- 6. Measures designed to prevent or mitigate potential environmental impacts shall continue to be included, reviewed and updated where improvement is feasible. Such measures will include the various assessment processes outlined above, as well as implementing and maintaining the MAC EMS, and involving relevant stakeholders through formal and informal consultation processes.
- 7. Implementing and maintaining the *Strategy*. This will again include distributing copies of the *Strategy* to environmentally significant airport users, advising other airport users of its availability, and ensuring all relevant MAC staff and contractors are aware their responsibilities.

- 8. Continual improvement together with airport users. This should occur through:
 - Periodic environmental reviews,
 - Implementing operational EMPs of tenants with the potential for considerable environmental impact,
 - MAC providing assistance through its Environment & Safety Manager,
 - Supporting the MAACC,
 - In lease conditions, and
 - The AEO providing assistance to ensure that other Airport users are aware of their environmental responsibilities
- 9. Similar to the previous 2004 Environment Strategy, annually reviewing and updating EMPs that give effect to this *Strategy*. These shall include
 - An assessment of the level of compliance with regard to regulatory requirements,
 - Time frames and *Strategy* requirements, and
 - Assessing the level of compliance of relevant Airport users.
- 10. MAC will investigate developing protocols to assess and manage its impact with regard to climate change. Initially, this will involve MAC exploring options to assess its carbon footprint and developing a management plan that will seek to minimise its greenhouse gas emissions in relation to activities carried out.
- 11. Ongoing maintenance and new building works at the Airport will be assessed for their ecological sustainability and management plans developed to minimise energy use and carry out works in a resource-efficient manner.

It is MAC's objective that there would be some level of ongoing and/or periodic improvement to the EMPs during the life of this *Strategy*.

2.6 Communication and Consultation

This *Strategy* and the MAC EMS require MAC to have formal communication and consultation procedures in place.

Included in these procedures are the following:

- Ongoing formal monthly meetings with the AEO to discuss the progress in achieving and maintaining compliance with Part 6 of the Airports Act 1996, the Airport (Environment Protection) Regulations 1997 and this Strategy.
- Progressing quarterly meetings of the MAACC that includes DITRDLG, Airservices Australia, CASA, local, state and federal MPs, the state Department of Infrastructure, the City of Kingston, Airport tenants, the Dingley Village Community Association, and the Moorabbin Airport Residents Association.
- Continuing to consult with new Airport land users and tenants to outline the requirements contained in the updated *Requirements for Construction, Building* and Operations at Moorabbin Airport. These include the preparation of EMPs, compliance with Part 6 of the Airports Act 1996, the Airport (Environment Protection) Regulations 1997, and this Strategy. In addition, the AEO and the Airport Building Controller (ABC) shall be advised to ensure that appropriate statutory planning and building requirements are also met.
- Providing DITRDLG with the Annual Environment Report as required by the Airport (Environment Protection) Regulations 1997. This report provides an update of the Site Environmental Register, it indicates how MAC has performed in meeting its Environment Strategy requirements, and lists any pollution incidents and/or contraventions of the Airport (Environment Protection) Regulations 1997.
- Reviewing relevant procedures that manage responding to pollution incidents to ensure that all relevant emergency and other agencies are contacted as required by *Airport (Environment Protection) Regulations 1997* and this *Strategy*.
- Reviewing procedures that manage incident reporting, public enquiries and complaints.
- Consulting with relevant Airport stakeholders such as regulators, tenants and local community groups, as required.

3 MORABBIN AIRPORT SITE DESCRIPTION

MOOR ABBIN AIRPORT ENVIRONMENT STRATEGY 2010

Since the previous 2004 Moorabbin Airport Environment Strategy was published in August 2004, there has been very little change to the Airport infrastructure.

Moorabbin Airport is located approximately 21 kilometres southeast of the Melbourne Central Business District in Melbourne's bayside suburbs. It is bounded by Centre Dandenong Road to the north, Boundary Road to the east, Lower Dandenong Road to the south and Grange Road and Bundora Parade to the west.

The Airport comprises 294 hectares of relatively flat, open land used for a variety of both aviation and non-aviation uses. The Airport continues to have a significant role in the Australian aviation industry, being one of the busiest general aviation Airports in Australia. The Airport land includes the following uses:

- A dedicated aviation movement area in the centre of the site, extending from Centre Dandenong Road to Lower Dandenong Road.
- A helicopter operations and parking area to the east of Bundora Parade and to the northeast of Northern Avenue.
- A control tower, Airport terminal and Airport Management Centre office located near the corner of Bundora Parade and Second Avenue.
- Offices, hangars, apron areas and parking areas north of Second Avenue, east of Bundora Parade, and on the northern and southern sides of Northern Avenue.
- An Airport museum south of Second Avenue.
- An existing retail precinct comprised of Direct Factory Outlets and Kingston Central Plaza with associated landscaping and car parking, located in the north western section of the Airport site.
- The Chifley Business Park situated in the northeast of the site.
- Vacant land where a restaurant, timber sales retailer, and part of the Kingston Golf Course were formerly located, and where a BP service station and landscape garden suppliers are presently located on the eastern and southern periphery of the Airport.

Adjoining uses have not changed and still include:

- Land immediately to the east of the site is dominated by the Redwood Gardens Industrial Estate that is characterised by low-density industry, warehouse and commercial land uses within a high amenity, generously landscaped setting.
- The proposed Dingley Freeway easement that extends to the east of the Redwood Gardens Estate, forming a break between industrial land uses on Boundary Road and residential areas located further to the east in Dingley.
- A McDonalds Restaurant and service station are located directly across Boundary Road to the east.

Smaller scale industrial, manufacturing and warehousing premises are clustered directly to the south of the airport across Lower Dandenong Road, and also to the west opposite Grange Road. Some of the development to the west of the airport includes businesses with direct and indirect relationships to airport operations. These precincts generally cater for small to medium sized industries and do not offer the landscape/amenity environment of the Redwood Gardens Estate. A local strip-shopping centre is located towards the south-west of the airport on Lower Dandenong Road. The centre offers convenience retail facilities for the nearby residential population.

Established residential areas are located directly adjacent to the south and south-west of the Airport. These areas also extend further west and north-west of the Airport, although they are generally separated by intervening industry or open space. Another residential area is located further to the east beyond the Redwood Gardens Estate in Dingley.

Across the site to the north, land is developed with a range of public and private open space facilities, with limited market garden areas to the northeast. The Cheltenham RSL, Kingston Heath Municipal Reserve and Heatherton Recreational Reserve comprise the main public open space facilities in this area. The Capital Golf Course is a privately owned golf course and includes a golf driving range containing public facilities with a café.



Airport Facilities

4 THE ENVIRONMENTAL MANAGEMENT SYSTEM

MOORABBIN AIRPORT ENVIRONMENT STRATEGY 2010

4.1 Introduction

Since 1999, when the first Moorabbin Airport Environment Strategy was approved and adopted, MAC developed, and commenced implementing and reviewing its EMS. The MAC EMS is based on the Standard - *AS/NZS ISO 14001, "Environmental Management Systems -Specification with Guidance for Use".* The MAC EMS includes the Environmental Management Manual that describes the EMS, defines its scope, provides general guidance and introduces Environmental Management and Operating Procedures.

Since the first Environment Strategy was approved in 1999, MAC has continued to demonstrate EMS implementation through the management initiatives and actions outlined in its Annual Environment Reports submitted to the AEO and the Secretary of DITRDLG.

4.2 The Environmental Management System

The following sections detail how MAC has continued to implement, maintain and review its current EMS.

4.2.1 Environment Policy

MAC's updated Environment Policy provides the overall vision for the environmental management of the Airport, it is the guiding reference from which the EMS derives, and sets the objectives that MAC seeks to achieve. The MAC Environment Policy was recently reviewed and updated and is included in **Section 2.2** of this Strategy.

4.2.2 Planning

MAC has continued to establish and maintain procedures which identify environmental issues that require ongoing management and are associated with the range of activities carried out at the Airport. The Site Environmental Review Management Procedure has continued to be used to assess environmental risks at the Airport on an ongoing basis. As a result of reviewing and updating the EMS and as is outlined in **Section 5**, its scope shall continue to increase and will include reporting on additional environmental elements.

The Legal Aspects Management Procedure was developed, updated and is maintained to ensure MAC identifies all relevant legislative requirements. MAC has therefore continued to develop and maintain its Legal and Other Requirements Register that identifies the key Federal environmental legislation - the *Airports Act 1996* and the *Airports (Environment Protection) Regulations 1997*, as well as Victorian State environmental legislation. Examples of such state legislation include the *Environment Protection Act 1970*, the *Environment Protection (Prescribed Waste) Regulations 1998* and the *Dangerous Goods Act 1985* that mainly detail chemical and waste storage, handling and disposal management strategies to be adopted.

The Objectives, Targets and Management Plans Management Procedure was prepared to develop and monitor progress in achieving the objectives and targets incorporated in MAC EMPs. The ultimate aim of this procedure is to give effect to the MAC Environment Policy. This procedure also requires MAC to prepare an Annual Environment Report that addresses all relevant environmental aspects, objectives and targets.

The Environmental Management Program Procedure was developed and is maintained to ensure that there is a program for achieving MAC's objectives and targets. This procedure applies to all identified significant aspects of the activities carried out at the Airport that have associated environmental objectives and targets.

4.2.3 Implementation and Operation

Managing significant environmental issues requires operating systems and procedures that include the following critical aspects:

- an effective operational structure that allocates responsibility;
- training and/or awareness of the EMS and Strategy amongst relevant stakeholders;
- effective communication procedures;
- defined EMS documentation and its management;
- appropriate operational controls;
- emergency preparedness and response; and
- management reviews and auditing.

Procedures for the above more important aspects were included in the original EMS and the previous and current Environment Strategy. However, as part of the continual improvement process, MAC shall continue to review and update its operational and management procedures. This should result in the continuing and effective implementation and operation of the EMS.

4.2.3.1 Structure and Responsibility

MAC management, staff and contractors all have environmental responsibilities under the EMS and the *Strategy*. Airport tenants are also considered to have environmental responsibilities under the *Strategy*. The following are the key stakeholders and their responsibilities that impact upon successfully implementing and operating the EMS:



Table 1 -	Structure	and	Responsibility
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Stakeholder:	Responsibilities:
Moorabbin Airport Corporation Board	 Approval of the Environment Policy.
	Implementation of Environment policy.
Moorabbin Airport	 Overall Airport environment performance.
General Manager, Aviation	Ensure adequate resources are available to implement the
	Environment policy.
Airport Operations Manager	Co-ordinate EMPs.
	Ensure construction companies that are to carry out works at the Airport have an EMP in place
	 Manage the Emergency Preparedness and Incident Response
	Procedures.
	 Manage environmental enquiries.
	Liaise with external parties (ie, regulators and the community).
	Ensure all MAC employees and contractors are aware of their and interview of their and the second
	environmental responsibilities.
General Manager, Property and	Ensure tenants operating at the Airport meet their environmental obligations under lease conditions.
Environment & Safety Manager	Propare the Appual Environment Reports
Limionment & Safety Manager	 Maintain and implement the EMS and the Strategy
	Implement the MAC EMP.
	 Liaise with regulators.
	 Carry out inspections of Airport facilities, tenants and
	contractors.
	Assist in the training and awareness programs.
MAC employees	Ensure that their environmental responsibilities outlined in job descriptions, and work instructions are corriad out.
	Descriptions and work instructions are carried out Participate in training and awareness sessions and emergency
	response drills.
MAC contractors	 Ensure that their environmental responsibilities outlined in work
	instructions and environmental management plans are carried
	out.
Airport tenants	Adhere to the approved 2010 Moorabbin Airport Environment
	Strategy and comply with the Airports (Environment Protection)
	Regulations and other relevant environmental legislation.



4.2.3.2 Training and Awareness

MAC developed an Environmental Training Management Procedure for relevant employees and contractors to be adequately trained in carrying out their work whilst minimising the potential for an environmental impact, as well as being aware of the EMS and the *Strategy*. Environmental training and awareness to date has been based on potential risk to the environment. MAC anticipates that a more formalised training program will be implemented during the life of this Strategy. This formal training program is expected to become part of MAC's ongoing employee and contractor training program.

In addition to training, MAC continues to increase environmental awareness amongst its employees, contractors and tenants. This is carried out through meetings and workplace inspections, and reference to publicly available relevant information (eg information on the internet).

To ensure that environmental management is appropriately administered (and in accordance with *Reg 3.05 of the Regulations*), MAC has created the Environment and Safety Manager position that requires the incumbent to have tertiary training in environmental management and at least 5 years relevant experience. In addition, MAC supports the Environment and Safety Manager's further development through the attendance at conferences, seminars, workshops and specialised training courses.

4.2.3.3 Communications

MAC has an Environmental Communication Management Procedure to facilitate the effective communication of environmental information between all Airport stakeholders. This procedure addresses internal communication within MAC, external communication issues amongst Airport users, and external communication strategies to manage third parties interested in the Airport operations such as regulators and the wider community.

Internal MAC communication is addressed through environmental training and meetings amongst MAC personnel. Matters dealt with include emerging issues such as Ecologically Sustainable Development (ESD) and Water Sensitive Urban Design (WSUD), and ongoing issues such as construction EMPs for new land uses and chemicals management.

Airport tenants are provided with the results of site inspections and environmental review assessments of their facility or operation where any important environmental issues are identified. They are also given opportunities to comment on the findings prior to carrying out any environmental remedial work and further opportunities to communicate are provided when follow up visits are conducted. Communications also occur when there is a new tenant to the Airport by providing general information (including environmental), conducting site visits, and in response to any incidents and emergencies where there is a potential environmental impact.

New proposals prepared for the Airport continue to be forwarded to the AEO for review and assessment, prior to MAC allowing a proposal to be carried out. This ensures that the AEO also has the opportunity to assess a proposal with regard to environmental management and potential environmental impact.

External stakeholders have been able to participate in the general management of the Airport that includes environmental management, primarily through the MAACC which meets on a quarterly basis. This committee includes representatives from DITRDLG, Airservices Australia, CASA, local, state and federal MPs, the state Department of Infrastructure, the City of Kingston, Airport tenants, the Dingley Village Community Association and the Moorabbin Airport Residents Association. In future, this forum will also be used as a means of involving the local community and Airport users in the development of future environment strategies and the dissemination of information contained in environment strategies (therefore addressing the requirements of *Reg 3.06(e) and Reg 3.06(f) in the Regulations*).

Apart from the formalised MAACC, there continues to be the opportunity for the community to contact MAC direct to lodge an enquiry or complaint. In such instances, MAC has, and will continue to, promptly manage such issues through logging the communication, investigating the environmental issue raised immediately (within a day or two depending on the potential environmental and social impact) and responding back the progress or findings of the investigation once completed.

The AEO, with the support of MAC, has continued its formal monthly meeting process to discuss ongoing and emerging environmental issues. MAC has endorsed this form of communication with the regulator in the past and will continue to do so in the future.

In addition to formal and informal communications with the AEO, MAC submits its Annual Environment Report to DITRDLG. With review and input from the AEO, this report details the following:

- an update of the Site Environmental Register that includes the results of any monitoring carried out, MAC's Environmental Review findings and externally provided environmental information;
- how MAC has performed in meeting its approved 2010 Environment Strategy objectives and targets and implementing its EMS and associated EMP; and
- details of any pollution incidents or contraventions of the *Regulations* over the preceding 12 months.

The above information illustrates the continued effort MAC has put into developing and maintaining an effective communications strategy that allows interaction between all parties that have an interest in the operations at Moorabbin Airport. This environmental management procedure will continue to be reviewed and updated to reflect current developments and expectations of Airport stakeholders.

4.2.3.4 EMS Documentation and its Control

MAC has, and will continue to develop its EMS documentation, in particular its Environment Policy, EMS Procedures and Environmental Operating Procedures. The EMS Document Control Procedure will be used to ensure that documents are approved, reviewed, updated, available, circulated, identifiable and destroyed when obsolete. During the approved Environment Strategy period, MAC continued to update additional documentation such as the *Requirements for Construction, Building and Operations at Moorabbin Airport.*

4.2.3.5 Operational Control

Environmental Operating Procedures were previously developed to identify and assess operations at the Airport that may have had a significant environmental impact. The procedures addressed ongoing management issues such as chemicals storage and handling, responding to chemical spills, the disposal of general and hazardous wastes, aircraft washing and the new buildings approvals process.

These procedures are periodically reviewed and updated to address the current and foreseeable future operations and activities at the Airport. This results in an Environmental Aspects Register that addresses current and future operations at the Airport. Therefore, along with other EMS documentation requiring review and updating, operations and activities at the Airport will continue to be assessed and relevant operational control procedures developed to address any potentially significant environmental impacts.

4.2.3.6 Emergency Preparedness and Response

The Airport Emergency Procedures (AEP) Manual has been in place prior to MAC commencing operational control of the Airport. This manual is of critical importance in protecting the Airport environment and its surrounds, as well as local communities.

This AEP Manual is regularly reviewed and updated and addresses the management of issues such as:

- the discharge of hazardous chemicals from the Airport;
- the accidental release of hazardous building materials;
- pollution of soil and/or groundwater as a result of construction/excavation works; and
- fires associated with chemical releases or other incidents.

The Emergency Preparedness and Response Procedure seeks to have Airport users and the responding emergency services familiar with procedures that will minimise the environmental impact should an emergency incident occur. This procedure and the associated AEP Manual shall continue to be reviewed and updated to reflect activities and operations carried out at the Airport and emerging technologies used to minimise and respond to emergency events.

4.2.4 Checking and Corrective Action

4.2.4.1 Monitoring and Measurement

The previously developed Environmental Emission & Performance Monitoring Procedure incorporates monitoring programs including stormwater monitoring, underground storage tank integrity assessments, and MAC Environmental Reviews. This procedure is periodically reviewed and updated to reflect the activities currently carried out at the Airport and segments of the environment that require additional or alternative investigation strategies. The areas identified for monitoring and measurement will be reviewed annually and discussed with the AEO for consideration and comment.

With regard to the monitoring and measurement that is undertaken by MAC, accepted industry protocols will continue to be adopted such as:

- employing suitably qualified and experienced environmental professionals;
- where applicable, using standardised methodologies such as those that follow Standards Australia or NATA requirements; and
- using laboratories that are accredited to carry out analytical work (eg, NATA accreditation).



4.2.4.2 Non-conformance and Corrective and Preventive Action

MAC has a Non-conformance, Corrective, and Preventive Action Procedure to investigate the source and impact of a non-conformance and develop an action plan to prevent or decrease the likelihood of the non-conformance re-occurring. This procedure addresses compliance with the EMS and legislation.

Where a non-conformance is identified, MAC responsibilities continue to be as follows:

- identifying and investigating the cause of a non-conformance;
- developing an appropriate corrective and/or preventative action process;
- ensuring that the corrective and/or preventative actions are implemented; and
- maintaining incident-reporting procedures

Results of a non-conformance investigation may result in one or more of the following:

- an amendment of an existing procedure;
- the development and preparation of a new procedure;
- additional training and work instructions; and
- involvement of the AEO or other relevant government authorities.

4.2.4.3 Records

As outlined in its Environmental Records Procedure, MAC continues to maintain environmental records that are used to demonstrate its level of environmental performance and compliance with the EMS and the broader *Strategy*. This procedure establishes and maintains systems for the identification, maintenance and disposal of environmental records associated with the EMS and the *Strategy*.

4.2.4.4 EMS Audit

MAC has developed an EMS Audit Procedure to establish and maintain a program for periodic EMS audits that includes procedural requirements for planning, scheduling, controlling and recording audit activities and any resulting corrective actions that require implementation. Initially MAC intends to carry out internal EMS audits with the assistance of the AEO and in future, consideration will be given to having external auditors assess conformity with *AS/NZS ISO 14001*.

4.2.4.5 Management Review

A Management Review Procedure was developed from the Site Environmental Review Procedure. In addition to identifying environmental risk and areas of potential environmental improvement, this procedure outlines a method for reviewing the overall EMS and its performance. It includes an assessment of the following:

- the extent to which MAC's Environment Policy, Objectives and Targets are being implemented and achieved;
- areas of potential ongoing improvement;
- outcomes of interactions held with external parties; and
- the overall effectiveness and suitability of the EMS.

5 THE ENVIRONMENTAL MANAGEMENT PLAN

MOOR ABBIN AIRPORT ENVIRONMENT STRATEGY 2010

5.1 Introduction

Environmental reviews of MAC and tenant operations have continued to be carried out since 1998 by both external environmental consultants and MAC. Some environmental issues have changed in status and/ or emerged such as WSUD, greenhouse gas (GHG) emissions and ESD, whilst many others have simply required ongoing management such as chemicals storage and handling. The status and the ongoing and future management of the various environmental aspects are discussed below.

The MAC EMP identifies the Airport's environmental issues, outlines the specific environmental objectives and contains a series of actions to be carried out over the *Strategy* period. It is the main environmental management tool that gives effect to the MAC Environmental Management System. This EMP contains a program of ongoing actions and new initiatives for implementation over the *Strategy* period.

When submitting Annual Environment Reports, MAC shall continue to prepare and submit to DITRDLG, an annual list of EMP actions and management initiatives that it shall seek to complete in the following 12-month period.

The specific environmental objectives included in the EMP reflect MAC's overall environmental management objectives for its operations at the Airport. The series of actions to be implemented are prioritised based on a review of the Airport's significant environmental aspects.

All EMS Procedures are reviewed biannually. This results in identifying current significant environmental issues and prioritising them for action and/or management. The identified environmental issues that will be addressed by the MAC EMP shall comprise the following:

- Air quality (including ozone depleting substances)
- Noise emissions
- Water quality (including stormwater, groundwater and waste water)
- Soil quality
- Waste management
- Hazardous materials management
- Climate Change
- Ecological sustainability
- Flora, fauna and habitat
- Aboriginal and European heritage

Similar to the previous 2004 Environment Strategy, periodic environmental reviews of Airport users (including MAC on an annual basis) will continue to be carried out to assess the Airport's environmental performance in relation to achieving the objectives outlined in this *Strategy*. The outcomes of these environmental reviews shall be included in Annual Environment Reports submitted to the Secretary of DITRDLG. In addition, environmental reviews assist in identifying and prioritising significant environmental issues for ongoing or further action and/or management.

Overall, carrying out the periodic environmental reviews and updating the EMP programs is expected to result in MAC achieving its objective to continually improve its environmental performance, as well as that of the Airport generally.

A summary of the EMP and other environmental management programs included in the EMS that are to be carried out can be found in **Section 7**.

5.2 Air Quality (including Ozone Depleting Substances)

5.2.1 Background

Annual environmental reviews undertaken since 1998 have assessed emissions to air from the various groundbased activities carried out at Moorabbin Airport. These reviews have continued to find that emissions to atmosphere have been limited to aircraft maintenance activities such as spray painting and the ground running of aircraft engines. The majority of these emissions involve the release of solvent vapours.

Since the first environmental review was carried out in 1998, MAC has used water-based marking paints rather than the solvent-based products, therefore reducing its emission of solvent vapours (ie, hydrocarbon vapours) to atmosphere.

Spray painting operations on the Airport have continued to remain of a minor nature and comparable with an average suburban motor repairer. A potential impact on the air environment due to these operations is associated with odours generated from the use of solvents. However, ongoing observations made during environmental reviews and random facility inspections have indicated that there continues to be only minor solvent use. An independent environmental consultant (VCEC, 1998) specialising in air quality issues has considered that the large buffer zone between spray painting and other solvent handling activities within the Airport site boundary (several hundred metres away) meant these activities would have no measurable or noticeable off-site effect. Further evidence of this is that there continues to be no complaints concerning odours from Moorabbin Airport's neighbours.

The initial 1998 Environmental Review included a desk-top air quality analysis of Moorabbin Airport by VCEC. It found no off-site impacts, and emissions monitoring of individual sources was not recommended. Should these activities change and/or a new facility be established where there is the potential to generate unacceptable levels of air pollutants, these emissions would be investigated, assessed and a report provided to the AEO and DITRDLG.

This conclusion was supported by an air emission study carried out at Melbourne Airport in 1985 ('Air Emissions Inventory and Air Quality Management Plan' VCEC, December 1995). The study reviewed emissions from aircraft, vehicles and fixed plant, as well as emissions of solvents during spray painting, solvent cleaning and the use of solvent-based paints. The study found that individual pollutants emitted from Melbourne Airport (i.e. nitrogen dioxide, carbon monoxide and hydrocarbons) were comparable to the emissions from vehicles travelling along the small section of freeway bordering Melbourne Airport.

A comparison of on-site and off-site emissions from Melbourne Airport and Moorabbin Airport was undertaken by VCEC in 1998 with the following conclusions:

- Given the traffic movements and environment surrounding each airport, the impact of off-site emissions onto both airports is comparable and in some instances (depending on wind direction) the impact on Moorabbin Airport (from off-site sources) can be higher.
- The emission of pollutants from Melbourne Airport (mainly carbon monoxide, nitrogen oxides and hydrocarbons) are one to two orders of magnitude higher than from Moorabbin Airport.
- The emission of pollutants (mainly carbon monoxide, nitrogen oxides and hydrocarbons) from Moorabbin Airport is in the order of one to two orders of magnitude lower than from the neighbouring off-site sources (ie, surrounding busy roads - Lower Dandenong, Centre Dandenong and Boundary Roads).
- It can be assumed that if ambient air monitoring were undertaken at the Airport, most of the pollutants measured would be due to off-site sources. The resultant data would not be of benefit in assessing the effect of the Airport, as it would also be extremely difficult to differentiate between the higher level of pollutants from off-site sources and the lower level of pollutants generated from the Airport activities.

Although the above indicates that the management of the main air emissions from the Airport is not required, MAC has a number of initiatives included in its Moorabbin Airport EMP that seek to monitor and reduce emissions to the atmosphere

Ozone Depleting Substances

Ozone depleting halon fire extinguishers have not been used by MAC for many years. Some building air conditioners used within MAC facilities continue to be freon filled. As this equipment is progressively replaced over time, commercially available units containing non-ozone depleting refrigerants will be purchased.

The periodic environmental reviews of Airport facilities will continue to seek to identify any remnant halon fire extinguishers and other halon-filled equipment still present. Where halon fire extinguishers and other halon-filled equipment is found in service, the tenant will be advised to remove the equipment from service and the AEO advised. The progressive phase out and replacement of freon filled air-conditioners amongst tenants should continue as this equipment is replaced over time and appropriate freon-free units are commercially available.

5.2.2 Objectives

MAC's objective in relation to air quality is to:

- minimise its potential impacts to the regional and local airshed;
- seek to improve air quality management at the Airport;
- comply with the Airports (Environment Protection) Regulations 1997, Clause 2.01 and;
- comply with the Victorian State Environment Protection Policies (SEPPs) related to air quality such as the SEPP (Ambient Air Quality) and SEPP (Air Quality Management).

5.2.3 Air Quality Actions and Management

The MAC Environmental Review process under this *Strategy* results in MAC undertaking the following actions:

- Providing advice to tenants on installing, maintaining and using air pollution control equipment when undertaking activities such as spray painting and degreasing.
- Monitoring MAC's maintenance facilities and work practices to ensure fugitive emissions and/or dust is minimised.
- Advising fuel supply companies on the Airport of their National Pollution Inventory (NPI) reporting requirements.
- Providing advice of a general nature to Airport tenants on the storage and handling of chemicals to minimise the potential for fugitive and/or process emissions.
- Encouraging tenants to assess the chemicals used and seek to minimise their use, particularly those that result in greater fugitive and process air emissions.
- Monitoring MAC and tenant facilities for ozone depleting substances identified during site visits, and where required, assist in phasing out its storage and/or use.

Through the review of EMPs prepared by construction companies who undertake works with potentially significant environmental impact at the Airport, MAC will continue to assess whether there are dust minimisation plans outlined. In addition, MAC will continue to assess whether the dust minimisation plans outlined in the EMPs are being effectively implemented.

MAC will continue to review operational EMPs prepared by major Airport tenants to assess whether relevant air quality objectives are outlined and MAC will investigate their effective implementation.

MAC shall continue to ensure that its fleet of company vehicles are regularly maintained. In addition, air emissions shall be considered when purchasing new vehicles.

In preparing the Annual Environment Report for the Secretary of DITRDLG, MAC shall include details of progress made in air quality management and update the Environmental Site Register with regard to those aspects or areas of the Airport from which there are more notable emissions to atmosphere.

5.3 Noise Emissions

5.3.1 Background

The *Regulations* do not cover noise generated by aircraft in flight, landing, taking off or taxiing at the Airport, therefore the *Strategy* focuses on ground-based activities including:

- Aircraft engine testing.
- Ground running of aircraft.
- Construction works.

Annual Environmental Reviews since 1998 have assessed the potential for activities at the Airport to impact upon neighbouring beneficial uses. These reviews have generally found that based on the nature of the commercial and aviation activities carried out (generally maintenance related), and the distance to surrounding residential areas, operations with the potential to generate unacceptable noise levels in residential areas is limited to the ground running of aircraft engines. However, a dedicated engine test cell has been in place for a number of years and there is a procedure outlining the time at which ground running can take place. These initiatives have significantly diminished the potential to generate excessive noise emissions and were positively received by the local community groups who have not registered any noise complaints arising from out-of-frame engine testing.

An area where noise does require management is with construction works around the Airport. Prior to the previous 2004 Environment Strategy, construction companies have been asked to produce EMPs that include managing noise emissions. Managing the potential for excessive noise emissions has normally been addressed in limiting the hours of operations to the weekday, daytime periods. MAC will continue to monitor construction activities and their impact on the environment, including noise.

5.3.2 Objectives

MAC's objective in relation to noise continues to be to:

- Minimise the potential noise nuisance within the Airport and upon the Airport's neighbours from all ground-based aviation and non-aviation activities.
- Promote noise minimisation strategies.
- Comply with the Airports (Environment Protection) Regulations 1997, Clause 2.04.

5.3.3 Noise Emission Action and Management

MAC shall continue to encourage all relevant Airport users to comply with the requirements associated with the ground running of aircraft engines. This continues to be achieved through consultation, and where required with the assistance of the AEO.

Through the review of EMPs prepared by construction companies that undertake works at the Airport, MAC will continue to determine whether noise mitigation strategies are in place (eg limiting the timing and the hours of noisy construction work). Through environmental reviews and site visits, MAC shall continue to assess whether any noise mitigation plans outlined in the EMPs are being effectively implemented.

Operational EMPs prepared by new tenants will be reviewed and MAC will determine whether noise mitigation strategies are also in place such as limiting the hours of operation and/or having noise control equipment installed. Through site visits, MAC shall assess if the outlined noise mitigation strategies are being effectively implemented.

In the Annual Environment Report to the Secretary of DITRDLG, MAC will continue to outline the details of progress made in the management of noise emissions and update the Environmental Site Register with regard to any new initiatives adopted that manage and/or reduce noise emissions.

5.4 Water Quality (Including Stormwater, Groundwater and Waste Water)

5.4.1 Background

Stormwater

The flow of stormwater at the Airport is through 2 Melbourne Water channels that collect surface run-off from major roads, market gardens, residential areas, and commercial and industrial areas to the north and northwest of the Airport. The quality of stormwater entering the Airport will therefore be subject to the activity occurring upstream.

The flow of stormwater out from the Airport discharges into 2 Melbourne Water channels along the Airport's southern boundary which empty into Mordialloc Creek and ultimately into Port Philip Bay, approximately 4 kilometres downstream of the Airport.

The potential for stormwater contamination has continued to be minimised through MAC's Environmental Operating Procedures. These procedures seek to minimise the generation of wastewater, direct wastewater to sewer and ensure that chemical storage facilities have adequate spill control provisions in place.

During the previous and current Environment Strategies, and in consultation with the AEO, MAC has continued to carry out a comprehensive stormwater monitoring program around the Airport. Stormwater sampling investigations have generally indicated that the quality of stormwater leaving the Airport is comparable to the quality entering the Airport and continues to be typical of the quality found in urban environments.

Groundwater

There is potential for an adverse impact upon the quality of groundwater with the storage of chemicals, or as a result of other commercial/industrial activities at the Airport. Effective controls are particularly required when managing underground storage tanks located around the Airport. The underground storage tanks (USTs) at the Airport are owned and/or controlled by either MAC, various fuel companies or other Airport tenants principally aviation maintenance organisations.

Waste Water

Moorabbin Airport is connected to Melbourne's reticulated sewer system that is managed by Southeast Water. MAC has trade waste agreements in place that allows for the discharge of industrial/commercial wastewater to the sewer system. In addition, there are other organisations on the Airport such as aviation maintenance or manufacturing facilities that are required to have trade waste agreements. These agreements ensure that wastewater generated enters the sewer system for treatment. They also ensure that a minimum level of water quality is maintained and on-site wastewater treatment systems such as triple interceptor traps are installed for initial pre-treatment.

5.4.2 Objectives

MAC's objective in relation to water quality is to:

- minimise potential impacts to the stormwater system and groundwater;
- direct waste waters to the sewer through the trade waste agreement process;
- comply with the *Airports* (*Environment Protection*) *Regulations* 1997, *Clause* 2.02; and
- comply with the Victorian SEPPs related to water quality such as the SEPP (Waters of Victoria) and the SEPP (Groundwaters of Victoria).

5.4.3 Water Quality Action and Management

The MAC Environmental Review process results in MAC undertaking the following actions:

- Assessing MAC's and tenants' storage of chemicals to determine whether adequate controls are place (eg, bunding and spill kits) to minimise the potential for stormwater and/or groundwater pollution.
- Monitoring MAC's work practices to ensure that there are appropriate controls to prevent stormwater and/or groundwater pollution.
- Encouraging tenants to use dedicated aircraft washbay facilities around the Airport when washing aircraft (principally for safety as opposed to aesthetic reasons).
- Ensure identified wastewater is directed to the sewer system through trade waste agreements or is disposed of in accordance with Victorian EPA requirements such as the *Environment Protection* (*Prescribed Waste*) *Regulations*.
- Assessing whether integrity testing or other forms of monitoring are required for USTs.

MAC will continue to carry out its stormwater monitoring program, assessing the quality of water entering and leaving the Airport and reviewing results in consultation with the AEO. In assessing the quality of the local surface water entering the Airport, MAC (and the AEO) can determine the impact that the Airport has on the local surface water quality.

Through ongoing reviews of EMPs prepared by construction companies who undertake works at the Airport, MAC (together with the AEO) shall determine whether there are adequate controls in place to minimise the potential for water pollution, particularly stormwater. In addition, MAC shall assess whether the control strategies outlined in the EMPs are being effectively implemented.

MAC shall continue to advise Airport tenants (particularly the fuel storage facilities) with USTs that they continue to monitor them in accordance with the Victorian EPA requirements. These requirements are detailed in EPA Publications 888 "Guidelines on the Design, Installation and Management Requirements for Underground Petroleum Storage Systems" and EPA Publication 892 "Design, Installation and Management Requirements for Underground Petroleum Storage Systems".

With the assistance of the AEO and the ABC, MAC shall continue to have new tenants operating at the Airport that require a trade waste agreement with Southeast Water provide MAC with a copy of this agreement. The MAC register of Airport trade waste agreements shall continue to be maintained.

Water Sensitive Urban Design (WSUD)

As indicated in the Draft Master Plan, to address stormwater quality and flow through the Airport, Master Plan proposals will incorporate a Stormwater Management Plan (SMP) that will include *WSUD* principles for both the construction and the operational phases of the proposal. Additionally, construction works in a particular Airport stormwater catchment will result in improvements to that existing stormwater catchment as part of the proposal's SMP.

WSUD principles address key sustainability values of water consumption, water recycling, waste minimisation and environment protection. The SMP will be developed in consultation with the AEO and other potential stakeholders such as Melbourne Water. This process results in contributions being made in managing the stormwater issues by highlighting and implementing strategies that include the following:

- Sediment control systems;
- Retarding basins; and/or
- Rainwater tanks.

Annual Environment Report

Included in the Annual Environment Report to the Secretary of DITRDLG, MAC shall continue to outline the details of progress made in water quality management and update the Environmental Site Register with regard to the following actions:

- The results of the programmed stormwater monitoring carried out;
- The results of targetted stormwater monitoring carried out as a results of identified anomalies from the programmed assessment results;
- Airport sites that store chemicals where spill containment provisions are in place;
- The location of USTs;
- If undertaken, the results of UST integrity testing;
- The location of groundwater monitoring wells;
- The results of any groundwater monitoring results;
- Sites on the Airport that have a trade waste agreement in place; and
- If there have been any Airport proposals that have included WSUD features, assess their function in relation to existing facilities in the proposal's catchment.

5.5 Soil Quality

5.5.1 Background

Underground fuel and waste storage tanks were previously installed at Moorabbin Airport over a number of years. Apart from the service station and the aircraft refuelling sites, only a few remain in use today. Reviews undertaken of the remaining MAC underground storage tanks (Tanknology, June 2003) indicated that they did not leak. In addition, there is a requirement that Airport tenants remove any leaking USTs, remediate any associated contaminated soil and reinstate the area.

As well as USTs located around the Airport, many facilities (e.g. aircraft and airport maintenance) continue to store and handle chemicals and waste (eg, fuels, solvents and paints) that have the potential to cause soil pollution - similar to other such industrial undertakings. Annual environmental reviews over the years have continued to result in improved storage and handling practices by tenants and MAC maintenance personnel that reduce the potential for soil pollution. Through such reviews, MAC has encouraged tenants to also minimise the storage of chemicals and waste which reduces the potential to cause soil pollution as well as water pollution.

5.5.2 Objectives

MAC's objective in relation to soil quality is to:

- minimise potential impacts on the soil conditions of the Airport;
- comply with the Airports (Environment Protection) Regulations 1997, Clause 2.03; and
- encourage Airport tenants to minimise their impact and comply with the Airports (Environment Protection) Regulations 1997.

5.5.3 Soil Quality Action and Management

MAC will continue to have a program in place to assess, where appropriate, the contamination status of soil on a particular site due to the following circumstances:

- prior to a parcel of vacant land being developed and tenanted, to determine the pre-existing conditions;
- when a tenant is about to vacate a premises, to assess whether there is any contamination present and if remediation works are required; and/or
- due to activities carried out or an accident where the site is visually contaminated, to assess the level of any contamination present and if remediation works are required.

The AEO will continue to be involved in assessing and advising whether a contamination assessment report is required and reviewing the results of that assessment to determine whether it complies with the *Airports* (*Environment Protection*) *Regulations 1997.*

As part of the Environment Review process, MAC shall include:

- Assessing the storage of chemicals and materials by tenants to determine whether appropriate controls are in place to prevent soil pollution (eg, bunding and spill kits).
- Monitoring MAC maintenance facilities and work practices to ensure that the storage and handling of chemicals and materials are adequately controlled and maintained to prevent potential soil pollution.
- Determining whether an integrity test or other form of monitoring is required for MAC's diesel USTs, and advising tenants whether they need to monitor their USTs for potential losses.

MAC will continue to advise Airport tenants (particularly the fuel storage facilities) with USTs that they continue to monitor them in accordance with the Victorian EPA requirements. As stated earlier, these requirements are detailed in *EPA Publications 888 "Guidelines on the Design, Installation and Management Requirements for Underground Petroleum Storage Systems"* and *EPA Publication 892 "Design, Installation and Management Requirements for Underground Petroleum Storage Systems"*.

Through ongoing reviews of EMPs prepared by construction companies who undertake works at the Airport with potentially significant environmental impact, MAC (together with the AEO) will determine whether there are adequate controls to minimise the potential for soil pollution. Through random site visits carried out by MAC (and when required, with the AEO) MAC will continue to also assess whether these control strategies outlined in the EMPs are being effectively implemented.

Included in the Annual Environment Report to the Secretary of DITRDLG, MAC shall continue to outline the details of progress made in soil quality management and update the Environmental Site Register with regard to the following actions:

- the results of any site contamination assessments carried out at the Airport;
- if undertaken, the results of any remedial works carried out;
- Airport sites that store chemicals where spill containment provisions are in place;
- the location of USTs;
- if undertaken, the results of UST integrity testing; and
- Maintenance of a register of areas on the Airport that have had a site contamination assessment carried out, the results of the assessment, {including whether it complies with the Airports (Environment Protection) Regulations 1997, Clause 2.03} the source of any contamination if known, and the current occupier.

5.6 Waste Management

5.6.1 Background

The inappropriate storage and handling of wastes can result in potential soil, groundwater and stormwater contamination and reduce the potential for re-use and recycling. These wastes are principally associated with aircraft and/or airport maintenance, warehousing and office administration.

Generally, the storage of wastes at the Airport has improved following progressive Environmental Reviews and inspections of MAC and tenant facilities. Progressive reviews have also confirmed that wastes generated at the Airport (that continue to be mainly oil, solvents and other contaminated material) have generally been disposed of in accordance with the Victorian EPA requirements.

Waste oil and the majority of waste solvents generated at the Airport continue to be recycled off-site through EPA approved facilities. Other wastes include metal scrap, cardboard and timber packaging, and office paper waste.

As a result of an MAC initiative, all tenants and MAC facilities are continually encouraged to prepare and/ or maintain inventories of chemicals and waste chemicals stored and handled within each premises. This information assists with MAC assessing the total quantities of chemicals and waste chemicals stored and handled at the Airport and can also be used to develop pollution prevention strategies for both MAC and Airport tenants. It can also be used to assess the adequacy of MAC's Emergency Response Procedures.

The review of waste storage and handling has continued to be a significant component of the Environmental Review process and of the inspections of MAC and tenant facilities.

5.6.2 Objectives

MAC's objectives in relation to waste management are to:

- minimise the waste generated by MAC;
- encourage tenants to minimise waste at the Airport;
- promote the re-use and/or recycling of waste by MAC and Airport tenants;
- ensure that waste storage and handling does not pose environmental risks and/or a public health risk;
- Comply, and assist tenants to comply with Victorian EPA off-site disposal requirements (particularly for 'prescribed industrial waste' as defined by the EPA); and
- Comply with the Airports (Environment Protection) Regulations 1997, Clause 3.08(e).

5.6.3 Waste Management Action and Management

The MAC Environmental Review process results in MAC undertaking the following actions:

- Encouraging MAC, contractors and tenants to re-use and/or recycle as much as is practicable. This includes the recycling of waste such as oil, solvents, scrap metal, timber, tyres and cardboard packaging, office paper and excavated soil.
- Monitoring MAC maintenance facilities and work practices, ensuring that the storage and handling of wastes is adequately controlled and maintained to prevent potential pollution.
- Assessing the storage and handling of wastes by tenants to determine whether there are appropriate controls in place to prevent air, water and/or soil pollution.
- Reviewing tenants' documents to assess compliance with the Victorian EPA off-site disposal requirements.

Through the review of EMPs prepared by construction companies that carry out works at the Airport, MAC will assess whether there is effective waste management and waste minimisation in place (eg, dedicated waste disposal and recycling facilities), and strategies that minimise the potential for an environmental impact (eg, soil contamination). MAC shall assess whether the waste management and waste minimisation strategies outlined in the EMPs are being effectively implemented through site visits carried out by MAC and, where appropriate, in conjunction with the AEO.

MAC will continue to promote the adoption of sound waste management, waste minimisation practices and re-use and recycling amongst Airport tenants and MAC staff and contractors. This should be achieved through information provided principally by the Victorian EPA and Sustainability Victoria, as well as other sources (eg, Kingston City Council and industry organisations).

Included in the Annual Environment Report to the Secretary of DITRDLG, MAC will continue to outline the details of progress made in waste management and update the Environmental Site Register with regard to the following:

- identifying waste minimisation strategies adopted at the Airport by tenants and MAC;
- identifying re-use and recycling approaches taken up by tenants and MAC;
- promoting waste minimisation, and re-use and/or recycling of waste amongst Airport tenants, and MAC and its contractors;
- assessing tenant and MAC waste storage and handling practices to ensure that they does not pose an environmental risk and/or a public health risk;
- waste management strategies adopted by construction companies;
- Airport tenants and MAC complying with Victorian EPA off-site disposal requirements.

5.7 Hazardous Materials Management

5.7.1 Background

The management of hazardous materials (primarily dangerous goods and/or hazardous substances) is primarily an occupational health and safety issue, however there may be adverse environmental impacts if they are poorly stored and handled. The appropriate management of hazardous materials can minimise and/ or prevent air, water and soil pollution.

The management of hazardous materials continues to be monitored through the Environmental Review process and ongoing tenant and MAC facility inspections. The hazardous materials at the Airport have been primarily associated with aircraft and airport maintenance facilities and include the following:

- Bulk fuel storages both above ground tanks and USTs.
- Aircraft maintenance facilities' storages of degreasing agents, solvents and paints.
- Airport and grounds maintenance facilities' storage of herbicides and insecticides.
- Other miscellaneous hazardous material storages.
- The presence of asbestos-containing materials located within a limited number of building structures.

MAC has continued to have a program in place to assess hazardous materials management that includes:

- Reviewing storage facilities that minimise the potential for air, water and/or soil pollution (eg, liquid fuels and chemicals stored in secured bunded areas).
- Evaluating tenant and MAC facility chemical registers to determine whether they reflect what is stored.
- Assessing whether there are incident and emergency response procedures in place for facilities that have the bulk storage of fuel and/or other chemicals.
- Reviewing MAC buildings for the presence of potential asbestos-containing materials in accordance with the *Victorian Occupational Health and Safety Regulations 2007*.

5.7.2 Objectives

MAC's objective in relation to the management of hazardous materials is to continue to:

- monitor the presence, storage and handling of hazardous materials;
- promote the appropriate storage and handling of hazardous materials;
- comply and assist tenants to comply with the *Airports* (*Environment Protection*) *Regulations 1997, Clause 3.08;* and
- comply and assist tenants to comply with relevant occupational health and safety legislation.

5.7.3 Hazardous Materials Management Action and Management

The MAC Environmental Review process results in MAC undertaking the following actions:

- Evaluating the presence, storage and handling of hazardous materials by tenants to determine whether there are appropriate controls in place to prevent and/or minimise air, water and soil pollution.
- Monitoring MAC's facilities and work practices to ensure that the presence, storage and handling of hazardous materials are adequately controlled and maintained to prevent and/or minimise potential air, water and soil pollution.
- Assessing if there are emergency response procedures in place for Airport facilities that store bulk fuels and/or other chemicals in significant quantities.

MAC will continue to maintain the register of its facilities that have hazardous materials identified and encourage Airport tenants to carry out assessments on their facilities. In addition, MAC will continue to maintain and implement its Asbestos Management Plan.

Through the review of EMPs prepared by construction companies that undertake works at the Airport, MAC will continue to assess if there are effective hazardous materials storage and handling procedures in place that minimise the potential for an environmental impact (eg, soil and/or water contamination). MAC will also continue to assess whether hazardous materials storage and handling procedures outlined in the EMPs are being effectively implemented through site inspections carried out by MAC and where appropriate, in conjunction with the AEO.

MAC will continue to promote the adoption of effective hazardous materials storage and handling procedures at the Airport amongst tenants and its own facilities. This is carried out by providing information from sources such as WorkSafe Victoria, the Australian Safety and Compensation Council, Standards Australia and industry organisations.

In the Annual Environment Report to the Secretary of DITRDLG, MAC will continue to outline the details of managing of hazardous materials and update the Environmental Site Register with regard to premises that store and handle hazardous materials, in particular noting quantities stored, and procedures to mitigate any potential environmental impact.



5.8 Climate Change

5.8.1 Background

Since the previous 2004 Environment Strategy was approved in August 2004, the environmental aspect that has become important locally and globally is climate change. MAC will seek to develop initiatives to assess and manage its impact associated with its existing operations and when implementing significant construction works with regard to climate change.

MAC anticipates that the details of its climate change initiatives would be included in programmed maintenance and construction works and in response to the requirements of the *National Greenhouse and Energy Reporting (NGER) Act 2007* and the subordinate Regulations.

5.8.2 Objectives

MAC's objective in relation to climate change is to:

- determine its greenhouse gas emissions;
- promote the efficient use of energy within MAC and by Airport tenants; and
- comply with the Airports (Environment Protection) Regulations 1997, Clause 3.08 (f, g).

5.8.3 Climate Change Action and Management

The MAC Environmental Review process that will incorporate climate change issues will result in MAC undertaking the following actions:

- Carry out an assessment of its annual energy usage and its associated calculated greenhouse gas emissions.
- Seek to increase its efficiency with regard to energy-use associated with existing operations and significant construction works.
- Promote strategies to minimise energy use and increase energy efficiency within MAC and Airport tenants through information provided by the Victorian EPA, The Federal Department of Climate Change and other potential sources (eg, industry groups).

Through the review of EMPs prepared by construction companies who undertake works at the Airport, MAC will assess whether there are efficient energy use strategies included and assess if any of these strategies outlined in the EMPs are being effectively implemented.

Operational EMPs prepared by tenants with significant energy use will be reviewed and MAC shall assess if efficient energy strategies are included (eg, timer switches, energy efficient lighting, entry interlocks). MAC shall assess if any of these strategies outlined are being effectively implemented through site visits.

MAC shall ensure that its vehicle fleet is regularly maintained to minimise its use of fuels and therefore reduce the associated emissions of greenhouse gases.

In the Annual Environment Report to the Secretary of DITRDLG, MAC will outline the details of progress made in assessing and managing its greenhouse gas emissions and therefore its impact with regard to climate change.



5.9 Ecological Sustainability

5.9.1 Background

The initial Environmental Review carried out in 1998 did not identify areas where natural resources (ie. water and materials) or energy (ie. electricity and gas) were being used in an inefficient or excessive manner. However, since the previous 2004 Environment Strategy was approved, the management of water resources and the consumption of energy have become a much more significant issue. Energy and resource use at the Airport is principally related to the following:

- Petroleum, as fuel for aircraft and ground-based MAC and tenant vehicles.
- Electricity, to power buildings, street lighting and the airside movement area lighting.
- Water, used for commercial activities such as manufacturing, aircraft washing (related to aviation safety), maintenance of the Airport grounds, landscaped areas and the public golf course.

As a result of these and other activities (similar to other industrial premises and airports), the Airport has had an environmental impact upon the use of resources and energy.

5.9.2 Objectives

MAC's objective in relation to ecological sustainability is to:

- assess its use of energy and resources (including water);
- efficiently use energy and resources at the Airport;
- promote energy and resource saving strategies; and
- comply with the Airports (Environment Protection) Regulations 1997, Clause 3.08 (f, g).

5.9.3 Ecological Sustainability Action and Management

As part of the Environment Review process, MAC shall include:

- An assessment of MAC's annual usage of power, fuel and water.
- Where possible and to the extent practicable, an annual assessment of materials purchased and used by MAC.
- An ongoing review of the potential to install power, fuel and water saving devices such as energy efficient lighting, timer switches and taps at MAC facilities.
- The extent of materials replacement with recycled and/or reused product or with new materials that have a low environmental impact.

Through the review of EMPs prepared by construction companies that undertake works with potentially significant environmental impact, MAC will continue to assess if efficient energy and resources use strategies, such as on-site water recycling and re-use facilities are in place. MAC will continue to determine if any efficient energy and resources use strategies outlined in the EMPs are being effectively implemented through site visits.

Significant new tenants are required to have operational EMPs prepared. MAC will continue to investigate if efficient energy and resources use strategies are in place and whether those efficient energy and resources use procedures outlined in the EMPs are being effectively implemented through site visits.

MAC will promote the efficient use of resources amongst all Airport users through the dissemination of information provided by the Victorian EPA - Sustainability Program, Melbourne Water, and other potential sources such as industry groups.

In addition to promoting the efficient use of energy, MAC will also promote the efficient use of resources amongst Airport tenants through information provided by Sustainability Victoria, Melbourne Water and relevant industry organizations.

In the Annual Environment Report to the Secretary of DITRDLG, MAC shall outline details of progress made in assessing and managing its contribution to ecological sustainability.

5.10 Flora, Fauna and Habitat and Aboriginal and European Heritage

5.10.1 Background

Flora and Fauna

Ecology Australia Pty Ltd (Ecology Australia) carried out an initial fauna and flora study at the Airport in 1998. This study found that most native vegetation communities had been eliminated from the site with 79% of the plants recorded being exotic species. Most of the fauna species found at the Airport were common and characteristic of urban environments and the Airport land was considered to be of low value for vertebrate fauna.

In early 2008, MAC again engaged the services of Ecology Australia to undertake a re-assessment of the flora and fauna values at the Airport. The flora and fauna values, essentially confirmed the previous findings, namely that the flora and fauna values of the site are very low, consistent with the grossly modified landscape and its land-use history

With specific regard to flora, no plant species or vegetation communities listed under the Victorian *Flora and Fauna Guarantee Act 1988 (FFG Act)* or the Commonwealth *Environment Protection and Biodiversity Conservation Act 1999 (EPBC Act)* occurred on the Airport. The only recommendation made in relation to vegetation was the permanent protection of the identified Coast Manna Gum and Red Gum trees.

With regard to fauna, the species previously recorded in 1998 comprised 33 bird species, 5 mammal species and 2 frog species, of which 11 bird and mammal species were exotic. One additional frog species, the regionally common Spotted Marsh Frog was recorded at a pond. The fauna habitats recorded were highly modified, degraded or anthropogenic (with the exception of the few indigenous trees). No fauna species listed under the *EPBC Act or the FFG Act* have previously been recorded, or are considered likely to occur.

A survey for the EPBC-listed Growling Grass Frog was undertaken in March 2008. No Growling Grass Frogs were recorded.

Aboriginal and Heritage

Biosis Research Pty Ltd (Biosis) was first engaged in 1998 to carry out an archaeological survey of the Airport. The aim of the study was to identify any areas that may have had Aboriginal or heritage significance and provide recommendations concerning the potential future management of any areas identified.

This study concluded that:

"As no Aboriginal or non-Aboriginal historic sites were recorded in the study area and the likelihood of finding any sites was extremely low, no management regimes are necessary for either Aboriginal or historic heritage."

Furthermore, this study recommended that:

"No further archaeological work is required and the management plan for Moorabbin Airport does not need to incorporate measures to manage Aboriginal and non-Aboriginal heritage values."

In early 2008, MAC again engaged the services of Biosis to prepare an updated cultural heritage assessment at the Airport. As the 1998 study concluded that there were no cultural heritage places or areas of potential within the Airport, there were no requirements for undertaking cultural heritage assessments.

Relevant State and Commonwealth legislation was repealed and replaced by the new *Victorian Aboriginal Heritage Act 2006* since the preparation of the 1998 report. This *Act* established a different set of requirements for Aboriginal cultural heritage assessment and management.



An assessment of the current legislative requirements concluded that because the Airport is on Commonwealth land, the Victorian heritage legislation does not apply. Furthermore, if the Victorian Aboriginal Heritage Act 2006 were to apply, any future development of the land would not trigger a requirement for Cultural Heritage Permits or a Cultural Heritage Management Plan because there are no recorded Aboriginal sites in the area, no areas of Cultural Heritage Sensitivity under the definitions of the 2007 Aboriginal heritage regulations, and the area has been subject to previous significant ground disturbance.

Biosis' assessment of the present cultural heritage legislation, a review of previous reports, evidence of existing conditions on the Airport and any future development is unlikely to require the preparation of a *Cultural Heritage Management Plan* or other cultural heritage statutory authorisation for the Airport. In addition, any proposed works will not have any impact on significant Aboriginal or historic cultural heritage values.

According to Biosis:

"All of Moorabbin Airport is considered to have been so extensively disturbed by past land use practices that whatever cultural heritage may have once existed has been destroyed".

The report concluded with the following recommendation:

"No further archaeological or cultural heritage assessment is considered necessary in relation to future development within Moorabbin Airport. The Master Plan for the Moorabbin Airport does not need to incorporate measures to manage Aboriginal and non-Aboriginal heritage values".

Based on the conclusions and recommendations of these studies indicating an ongoing lack of environmentally significant areas and an absence of Aboriginal or heritage significance, measures addressing these issues have yet to be required. In other words, there are no areas at Moorabbin Airport that have been identified as environmentally significant. However, should future developments at the Airport uncover any areas of environmental, Aboriginal or heritage significance, management procedures included in the project development works will be implemented.

Therefore, the management of flora, fauna and habitat has been limited to landscaping and general garden maintenance of the Airport grounds and golf course, and maintaining the banks of the open stormwater channels that traverse the Airport.

5.10.2 Objectives

MAC's objective in relation to flora, fauna and habitat is to maintain and enhance the Airport's landscaped areas and where practicable, contribute to improving the ecological value of such landscaped and other open areas.

5.10.3 Flora, Fauna and Habitat and Aboriginal and European Heritage Action and Management

The MAC Environmental Review process results in MAC undertaking the following actions:

- A bi-annual program to review the gardensmanagement procedures that maintain the landscaped areas of the Airport.
- Ongoing consultation with the AEO and ABC when assessing applications for new building works to ensure landscaping information is provided and then implemented.

Through the review of EMPs prepared by construction companies that undertake works at the Airport, MAC shall continue to assess if the construction works include the protection and enhancement of the Airport's landscaped areas. MAC will assess whether any landscape protection and enhancement programs outlined in the EMPs are effectively implemented through site visits.

In the Annual Environment Report to the Secretary of DITRDLG, MAC will outline the details of progress made in flora, fauna and habitat management and update the Environmental Site Register with regard to any new landscaping works at the Airport.

6 TENANT SUPPORT AND PARTICIPATION

MOORABBIN AIRPORT ENVIRONMENT STRATEGY 2010

6.1 New Tenants

To facilitate best practice environmental management, particularly amongst new tenants, MAC developed, and has updated its Requirements for Construction, Building and Operations at Moorabbin Airport for organisations that carry out significant construction works and operations at the Airport. This information includes a requirement to provide an EMP prior to construction that should address potential environmental impacts and control measures that prevent significant environmental impacts. Prior to occupancy, the facility owner and/or tenant of an operation that is environmentally important will need to provide an EMP addressing environmental aspects associated with the occupation of a new facility. In both instances, the EMPs are assessed for compliance with the Strategy and, with the assistance of the AEO, are assessed for compliance with the Regulations. These EMPs continue to be audited by MAC and/or the AEO.

The areas where much of the EMPs' focus is placed continues to be as follows:

- Preventing stormwater pollution from exposed earth or from the poor storage of chemicals.
- Preventing soil pollution from the poor storage of chemicals.
- Preventing dust generation from the movement of earth and from exposed earth.
- Minimising the potential for noise nuisance.
- Having EMPs and equipment in place to deal with potential environmental incidents.
- Adopting an internal audit schedule that addresses all of the above items and others identified in the EMPs.

6.2 Existing Tenants

There has been a change in culture for many organisations that previously operated in a manner where consideration for the environment was minimal. With the ongoing implementation of the *Strategy*, many of the existing Airport tenants have now come to appreciate the importance placed on environmental management as part of the overall management of the Airport. This turnaround was greatly facilitated by MAC continuing to implement its environmental review process and increasing communications in general, with all Airport users. It also demonstrates that through ongoing communications, improvements in environmental management and performance can be achieved through negotiation in a co-operative environment.

In the very few instances where it was more difficult to change environmental management practices, assistance has continued to be provided by the AEO who has played an active role through site visits and providing written advice or correspondence. The need for the AEO to become involved in addressing poor environmental management practices has continued to diminish. This can also be attributed to the proactive work carried out by the AEO in visiting Airport tenants and providing general advice in a co-operative environment.

The environmental review process, issue-specific site visits, providing advice through MAC and implementing EMPs will continue with the new *Strategy* and beyond.

7 MANAGEMENT INITIATIVES AND ACTIONS SUMMARY

MOOR ABBIN AIRPORT ENVIRONMENT STRATEGY 2010

Table 2 below is a summary of the previous sections and has been prepared to concisely demonstrate the MAC management initiatives and actions that will be carried out during the life of this *Strategy*. It clearly demonstrates the considerable effort that MAC undertakes to continually improve environmental management at the Airport.

Table 2 – Summary of MAC Management Initiatives and Actions - EMS

Objectives	Management Initiative or Action
 MAC EMS Maintain the EMS Review and audit the EMS Implement all aspects of the EMS 	Environmental Review Procedure Site Environmental Review - Operational Procedure. Continue to review and augment this procedure's scope biennially (in 2011 and 2013), and continue to implement the updated procedure.
 Maintain, review and update management procedures Maintain, review and update operational procedures 	Environmental Training/Awareness Environmental Management Training - Operational Procedure. Develop a formalised environmental training program in the 1st year (in 2010) to be reviewed biennially (in 2012 and 2014). Implement this procedure from the 1st year onwards.
	Communication and Consultation Continue to maintain, review and implement the Environmental Communication - Management Procedure biennially (in 2011 and 2013).
	Continue quarterly Moorabbin Airport Aviation Consultative Committee meetings. Continue AEO monthly and issue-specific meetings. Submit Annual Environment Reports to DITRDLG that will include an annual EMP for the following <i>Strategy</i> year. See Section 7.1 for the 2010 MAC EMP.
	Report back to tenants, and MAC maintenance areas and contractors following Environmental Reviews and/or site visits.
	Document Control Continue to maintain, review (biennially - in 2011 and 2013) and implement the Document Control - Management Procedure
	Operational Control Continue to maintain, review (biennially - in 2011 and 2013) and implement the Operational Control Procedures
	Airport Emergency Procedures Annually update the Airport Emergency Procedures with regard to potential environmental impacts.
	Monitoring and Measurement Continue to maintain, review (biennially - in 2011 and 2013) and implement the Environmental Emission and Performance Monitoring - Operational Procedure as well as the EMS Monitoring and Measurement Procedure.
	Site Environmental Register Prepare and annually update the Moorabbin Airport Site Environmental Register.
	EMS Auditing Carry out internal auditing of the EMS (biennially - in 2011 and 2013), commencing in the 2nd year of the <i>Strategy</i> .
	Management Reviews

Continue to maintain, review (biennially - in 2011 and 2013) and implement the Management Review Procedure.

Table 3 – Summary of MAC Management Initiatives and Actions - EMP

Objectives	Management Initiative or Action
MAC EMP Environmental Reviews	Annually address MAC's environmental issues, and periodically address Airport users' environmental issues as detailed in Section 5 that comprises the following:
 Carry out Environmental Reviews 	 Air quality (inc. ozone depleting substances);
	 Noise emissions
	 Water quality (inc. stormwater, groundwater & waste water);
	 Soil quality;
	 Waste management;
	 Hazardous materials management;
	Climate change;
	 Ecological sustainability;
	 Flora, fauna and habitat; and
	 Aboriginal heritage
Externally Provided EMPs Review, and monitor the	Review externally provided construction and operational EMPs and monitor implementation in areas including the following:
implementation of externally provided EMPs	 Air, water and soil quality;
	 Waste and hazardous materials management;
	 Energy use, resource use and ecological sustainability;
	 Flora, fauna and habitat; and
	 Noise emissions.

MAC EMP (cont) As part of the Environmental Review process, MAC shall: Air Quality Management Provide advice to tenants on installing, maintaining and using air Minimise potential impacts to pollution control equipment when undertaking activities such as spray regional and local airshed painting and degreasing. Seek to improve air quality Annually monitor MAC's maintenance facilities and work practices to management ensure fugitive emissions and/or dust is minimised. • Comply with the *Regulations* Advise fuel supply companies on the Airport of their National Pollution Clause 2.01 Inventory (NPI) reporting requirements. Comply with SEPPs related to air Provide general advice to Airport tenants on the storage and handling quality such as the SEPP (Ambient of chemicals to minimise potential fugitive and/or process emissions. Air Quality) & SEPP (Air Quality Management). Encourage tenants to assess chemicals used and seek to minimise their use, particularly those that result in greater fugitive and process air emissions. Monitor MAC and tenant facilities for ozone depleting substances identified during site visits, and where required, assist in phasing out its storage and/or use. Through a review of construction companies' EMPs, MAC will continue to assess whether dust minimisation plans are outlined and assess whether the dust minimisation plans outlined in EMPs are effectively implemented. MAC will continue to review major Airport tenants' operational EMPs to assess if relevant air quality objectives are outlined and investigate their effective implementation. MAC shall continue to ensure that its fleet of company vehicles are regularly maintained, and air emissions shall be considered when purchasing new vehicles. The Annual Environment Report prepared for the Secretary of DITRDLG will include details of progress made in air quality management and update the Environmental Site Register with regard to those aspects or areas of the Airport from which there are more notable emissions to atmosphere. Noise Through consultation, MAC shall continue to encourage all relevant Airport users to comply with the requirements associated with the ground running of aircraft Minimise potential noise nuisance engines. within the Airport and upon the Airport's neighbours from ground-Through a review of construction companies' EMPs, MAC will continue to based aviation and non-aviation determine whether noise mitigation strategies are in place (eg limiting the timing and the hours of noisy construction work) and assess whether noise mitigation activities. plans outlined in the EMPs are effectively implemented. Promote noise minimisation Operational EMPs prepared by new tenants will be reviewed and MAC will strategies. determine whether noise mitigation strategies are in place (eg, limiting operational • Comply with *Regulations* Clause hours of and/or having noise control equipment installed) and assess if outlined 2.04 noise mitigation strategies are effectively implemented. The Annual Environment Report prepared for the Secretary of DITRDLG, will continue to outline the details of progress made in the management of noise emissions and update the Environmental Site Register with regard to any new initiatives adopted that manage and/or reduce noise emissions.

Management Initiative or Action

Objectives

Objectives

MAC EMP (cont) Water Quality Management

- Minimise potential impacts to
- the stormwater system and groundwater
- Direct waste waters to the sewer through the trade waste agreement process
- Comply with the *Regulations Clause 2.02*
- Comply with the Victorian SEPPs related to water quality – the SEPP (Waters of Victoria) and the SEPP (Groundwaters of Victoria)

Management Initiative or Action

As part of the Environmental Review process, MAC shall:

- Assess MAC's and tenants' storage of chemicals to determine whether adequate controls are in place (eg, bunding and spill kits) to minimise the potential for stormwater and/or groundwater pollution.
- Monitor MAC's work practices to ensure that there are appropriate controls to prevent stormwater and/or groundwater pollution.
- Encourage tenants to use dedicated aircraft washbay facilities around the Airport when washing aircraft (principally for safety as opposed to aesthetic reasons).
- Ensure identified wastewater is directed to the sewer system through trade waste agreements or is disposed of in accordance with Victorian EPA requirements such as the *Environment Protection (Prescribed Waste) Regulations*.
- Assess whether integrity testing or other forms of monitoring are required for USTs.

MAC will continue to carry out its annual stormwater monitoring program, assessing the quality of water entering and leaving the Airport, and in consultation with the AEO reviewing the results and determining the impact the Airport has on the local surface water quality.

Through ongoing reviews of construction companies' EMPs, MAC (together with the AEO) shall determine whether there are adequate controls in place to minimise the potential for water pollution (particularly stormwater) and shall assess whether the control strategies outlined in the EMPs are being effectively implemented.

MAC shall continue to advise Airport tenants with USTs that they continue to monitor them in accordance with the Victorian EPA requirements, as detailed in *EPA Publication 888* and *892*.

MAC shall continue to have new tenants operating at the Airport that require a trade waste agreement with Southeast Water provide MAC with a copy of this agreement and maintain a register of agreements.

Management Initiative or Action

 The SMP will be developed in consultation with the AEO and other potential stakeholders such as Melbourne Water. This process results in contributions being made in managing the stormwater issues by highlighting and implement strategies that include sediment control systems, retarding basins; and/or rainwater tanks. The Annual Environment Report prepared for the Secretary of DITRDLG will continue to outline the progress made in water quality management and upd the Environmental Site Register with regard to the following actions: The results of programmed stormwater monitoring carried out; Results of targetted stormwater monitoring carried out as a result or identified anomalies from programmed assessment results; Sites that store chemicals where spill containment provisions are inplace; The location of USTs; If undertaken, the results of UST integrity testing; The results of any groundwater monitoring results; Sites that have a trade waste agreement in place; and If there have been any Airport proposals that have included WSUE features, assess their function in relation to existing facilities in the 	MAC EMP (cont) Water Quality Management (continued from previous page)	As indicated in the Draft Master Plan, to address stormwater quality and flow, Master Plan proposals will incorporate an SMP that will include WSUD principles for both the construction and the operational phases of the proposal. Additionally, construction works in a particular Airport stormwater catchment will result in improvements to that existing stormwater catchment as part of the proposal's SMP.
 The Annual Environment Report prepared for the Secretary of DITRDLG will continue to outline the progress made in water quality management and upd the Environmental Site Register with regard to the following actions: The results of programmed stormwater monitoring carried out; Results of targetted stormwater monitoring carried out as a result or identified anomalies from programmed assessment results; Sites that store chemicals where spill containment provisions are in place; The location of USTs; If undertaken, the results of UST integrity testing; The location of groundwater monitoring results; Sites that have a trade waste agreement in place; and If there have been any Airport proposals that have included WSUD features, assess their function in relation to existing facilities in the 		The SMP will be developed in consultation with the AEO and other potential stakeholders such as Melbourne Water. This process results in contributions being made in managing the stormwater issues by highlighting and implementing strategies that include sediment control systems, retarding basins; and/or rainwater tanks.
 The results of programmed stormwater monitoring carried out; Results of targetted stormwater monitoring carried out as a result identified anomalies from programmed assessment results; Sites that store chemicals where spill containment provisions are i place; The location of USTs; If undertaken, the results of UST integrity testing; The location of groundwater monitoring wells; The results of any groundwater monitoring results; Sites that have a trade waste agreement in place; and If there have been any Airport proposals that have included WSUE features, assess their function in relation to existing facilities in the 		The Annual Environment Report prepared for the Secretary of DITRDLG will continue to outline the progress made in water quality management and update the Environmental Site Register with regard to the following actions:
 Results of targetted stormwater monitoring carried out as a result identified anomalies from programmed assessment results; Sites that store chemicals where spill containment provisions are i place; The location of USTs; If undertaken, the results of UST integrity testing; The location of groundwater monitoring wells; The results of any groundwater monitoring results; Sites that have a trade waste agreement in place; and If there have been any Airport proposals that have included WSUD features, assess their function in relation to existing facilities in the 		 The results of programmed stormwater monitoring carried out;
 Sites that store chemicals where spill containment provisions are i place; The location of USTs; If undertaken, the results of UST integrity testing; The location of groundwater monitoring wells; The results of any groundwater monitoring results; Sites that have a trade waste agreement in place; and If there have been any Airport proposals that have included WSUD features, assess their function in relation to existing facilities in the 		 Results of targetted stormwater monitoring carried out as a result of identified anomalies from programmed assessment results;
 The location of USTs; If undertaken, the results of UST integrity testing; The location of groundwater monitoring wells; The results of any groundwater monitoring results; Sites that have a trade waste agreement in place; and If there have been any Airport proposals that have included WSUD features, assess their function in relation to existing facilities in the 		 Sites that store chemicals where spill containment provisions are in place;
 If undertaken, the results of UST integrity testing; The location of groundwater monitoring wells; The results of any groundwater monitoring results; Sites that have a trade waste agreement in place; and If there have been any Airport proposals that have included WSUD features, assess their function in relation to existing facilities in the 		 The location of USTs;
 The location of groundwater monitoring wells; The results of any groundwater monitoring results; Sites that have a trade waste agreement in place; and If there have been any Airport proposals that have included WSUD features, assess their function in relation to existing facilities in the 		 If undertaken, the results of UST integrity testing;
 The results of any groundwater monitoring results; Sites that have a trade waste agreement in place; and If there have been any Airport proposals that have included WSUD features, assess their function in relation to existing facilities in the 		 The location of groundwater monitoring wells;
 Sites that have a trade waste agreement in place; and If there have been any Airport proposals that have included WSUD features, assess their function in relation to existing facilities in the 		 The results of any groundwater monitoring results;
proposal's catchment.		 Sites that have a trade waste agreement in place; and If there have been any Airport proposals that have included WSUD features, assess their function in relation to existing facilities in the proposal's catchment.

Objectives

MAC EMP (cont)

Clause 2.03

Soil Quality Management

 Minimise potential impacts on the soil conditions of the Airport

minimise their impact and comply

Comply with the Regulations

Encourage Airport tenants to

with the Regulations

Management Initiative or Action

MAC will continue to assess, where appropriate, the contamination status of soil on a particular site due to the following circumstances:

- prior to a parcel of vacant land being developed and tenanted, to determine the pre-existing conditions;
- when a tenant is to vacate a premises, to assess if there is any contamination present and if remediation is required; and/or
- due to activities carried out or an accident where the site is visually contaminated, to assess the level of any contamination present and if remediation is required.

The AEO will continue to be involved in assessing and advising whether a contamination assessment report is required and reviewing the results to determine whether it complies with the Regulations.

As part of the Environment Review process, MAC shall:

- Assess tenants' storage of chemicals and materials to determine whether appropriate controls are in place to prevent soil pollution.
- Annually monitor MAC maintenance facilities and work practices to ensure that the storage and handling of chemicals and materials are adequately controlled and maintained to prevent soil pollution.
- Determine whether an integrity test or other form of monitoring is required for MAC's diesel USTs, and advise tenants whether they need to monitor their USTs for potential losses.

MAC will continue to advise Airport tenants with USTs that they continue to monitor them in accordance with the Victorian EPA requirements, as detailed in *EPA Publications 888* and *EPA Publication 892*.

Through ongoing reviews of construction companies' EMPs, MAC (together with the AEO) will determine whether there are adequate controls to minimise the potential for soil pollution and will continue to also assess whether these control strategies outlined in the EMPs are being effectively implemented.

The Annual Environment Report prepared for the Secretary of DITRDLG will continue to outline the progress made in soil quality management and update the Environmental Site Register with regard to the following:

- The results of any site contamination assessments carried out;
- If undertaken, the results of any remedial works carried out;
- Sites that store chemicals with spill containment provisions;
- The location of USTs;
- If undertaken, the results of UST integrity testing; and
- Maintenance of a register of areas on the Airport that have had a site contamination assessment carried out, the results of the assessment including whether it complies with the *Regulations*, the source of any contamination if known, and the current occupier.

Management Initiative or Action

MAC EMP (cont)

Waste Management

- Minimise the waste generated by MAC
- Encourage tenants to minimise waste at the Airport, and promote the re-use and/or recycling of waste by MAC and Airport tenants
- Ensure that waste storage and handling does not create risks
- Comply, and assist tenants to comply with Victorian EPA off-site disposal requirements
- Comply with the *Regulations Clause 3.08(e).*

As part of the Environmental Review process, MAC shall:

- Encourage MAC, contractors and tenants to re-use and/or recycle as much as is practicable (including recycling of waste oil, solvents, scrap metal, timber, tyres, cardboard, paper and excavated soil).
- Annually monitor MAC maintenance facilities and work practices, ensuring that the storage and handling of wastes is adequately controlled and maintained to prevent pollution.
- Assess the storage and handling of wastes by tenants to determine whether there are appropriate controls in place to prevent pollution.
- Reviewing tenants' documents to assess compliance with the Victorian EPA off-site disposal requirements.

Through the review of construction companies' EMPs, MAC will assess whether there is effective waste management and waste minimisation in place (eg, dedicated waste disposal/recycling facilities), and strategies that minimise the potential for an environmental impact (eg, soil contamination). MAC (in conjunction with the AEO where appropriate) will assess whether waste management and waste minimisation strategies outlined in the EMPs are being effectively implemented.

MAC will continue to promote the adoption of sound waste management, waste minimisation practices and re-use and recycling amongst Airport tenants and MAC staff and contractors. This should be achieved through information provided principally by the Victorian EPA and Sustainability Victoria, as well as other sources.

The Annual Environment Report prepared for the Secretary of DITRDLG will continue to outline the progress made in waste management and update the Environmental Site Register with regard to the following:

- Identifying tenants' and MAC waste minimisation strategies;
- Identifying tenants' and MAC re-use and recycling approaches;
- Promoting waste minimisation, and re-use and/or recycling of waste amongst Airport tenants, and MAC and its contractors;
- Assessing tenants' and MAC waste storage and handling practices so they do not pose an environmental and/or a public health risk;
- Waste management strategies adopted by construction companies;
- Tenants and MAC complying with Victorian EPA off-site disposal requirements.

Objectives

Management Initiative or Action

MAC EMP (cont)

Hazardous Materials Management

- Monitor the presence, storage and handling of hazardous materials
- Promote the appropriate storage and handling of hazardous materials
- Comply and assist tenants to comply with the *Regulations Clause 3.08*
- Comply and assist tenants to comply with relevant occupational health and safety legislation

As part of the Environmental Review process, MAC shall:

- Evaluate the presence, storage and handling of hazardous materials by tenants to determine if there are appropriate controls in place to prevent and/or minimise air, water and soil pollution.
- Annually monitor MAC's facilities and work practices to ensure that the presence, storage and handling of hazardous materials are adequately controlled and maintained to prevent and/or minimise potential air, water and soil pollution.
- Assess if there are emergency response procedures in place for Airport facilities that store bulk fuels and/or other chemicals in significant quantities.

MAC will continue to maintain the register of its facilities that have hazardous materials identified and encourage Airport tenants to carry out assessments on their facilities. In addition, MAC will continue to maintain and implement its Asbestos Management Plan.

Through the review of construction companies EMPs, MAC will continue to assess if there are effective hazardous materials storage and handling procedures in place that minimise the potential for an environmental impact (eg, soil and/or water contamination). MAC (in conjunction with the AEO where appropriate) will also continue to assess if hazardous materials storage and handling procedures outlined in the EMPs are being effectively implemented.

MAC will continue to promote effective hazardous materials storage and handling procedures amongst tenants and at its own facilities. This is carried out by providing information from sources such as WorkSafe Victoria, the Australian Safety and Compensation Council, Standards Australia and industry organisations.

The Annual Environment Report prepared for the Secretary of DITRDLG will continue to outline the details of managing of hazardous materials and update the Environmental Site Register with regard to premises that store and handle hazardous materials, in particular noting quantities stored, and procedures that mitigate any potential environmental impact.

Climate Change

- Determine MAC's greenhouse gas emissions
- Promote the efficient use of energy within MAC and by Airport tenants
- Comply with the *Regulations*, *Clause 3.08 (f, g)*

As part of the Environmental Review process that will incorporate climate change issues, MAC shall:

- Carry out an assessment of its annual energy usage and its associated calculated greenhouse gas emissions.
- Seek to increase its efficiency with regard to energy-use associated with existing operations and significant construction works.
- Promote strategies to minimise energy use and increase energy efficiency within MAC and Airport tenants through information provided by the Victorian EPA, The Federal Department of Climate Change and other potential sources (eg, industry groups).

Through the review of construction companies' EMPs, MAC will assess if there are efficient energy use strategies included and assess if any of these strategies outlined in the EMPs are being effectively implemented.

Operational EMPs prepared by tenants with significant energy use will be reviewed and MAC shall assess if efficient energy strategies are included (eg, timer switches, energy efficient lighting, entry interlocks). MAC shall assess if any of these strategies outlined are being effectively implemented.

MAC shall ensure that its vehicle fleet is regularly maintained to minimise its use of fuels and therefore reduce the associated emissions of greenhouse gases.

In the Annual Environment Report to the Secretary of DITRDLG, MAC will outline the details of progress made in assessing and managing its greenhouse gas emissions and therefore its impact with regard to climate change.

Objectives

MAC EMP (cont)

Ecological Sustainability

- Assess MAC's use of energy and resources
- Efficiently use energy and resources
- Promote energy and resource saving strategies
- Comply with the *Regulations*, *Clause 3.08 (f, g).*

Management Initiative or Action

As part of the Environment Review process, MAC will include: An assessment of MAC's annual usage of power, fuel and water.

- Where possible and to the extent practicable, an annual assessment of materials purchased and used by MAC.
- An ongoing review of the potential to install power, fuel and water saving devices such as energy efficient lighting, timer switches and taps at MAC facilities.
- Assess the extent of materials replacement with recycled and/or reused product or with new materials that have a low environmental impact.

Through the review of construction companies' EMPs, MAC will assess if efficient energy and resources use strategies, such as on-site water recycling and re-use facilities are in place. MAC will determine if any efficient energy and resources use strategies outlined in the EMPs are being effectively implemented.

Significant new tenants are required to have operational EMPs prepared. MAC will investigate if efficient energy and resources use strategies are in place and whether those efficient energy and resources use procedures outlined in the EMPs are being effectively implemented.

MAC will promote the efficient use of resources amongst all Airport users through the dissemination of information provided by the Victorian EPA - Sustainability Program, Melbourne Water, and other potential sources such as industry groups.

In addition to promoting the efficient use of energy, MAC will also promote the efficient use of resources amongst Airport tenants through information provided by Sustainability Victoria, Melbourne Water and relevant industry organizations.

In the Annual Environment Report to the Secretary of DITRDLG, MAC will outline details of progress made in assessing and managing its contribution to ecological sustainability.

Flora, Fauna and Habitat, and Aboriginal and European Heritage

 Maintain & enhance landscaped areas & where practicable, contribute to improving the ecological value of such landscaped & other open areas. As part of the Environment Review process, MAC will include:

- A bi-annual program to review the gardens-management procedures that maintain landscaped areas of the Airport.
- Ongoing consultation with the AEO and ABC when assessing applications for new building works to ensure landscaping information is provided and then implemented.

Through the review of construction companies' EMPs, MAC shall continue to assess if the construction works include the protection and enhancement of the Airport's landscaped areas. MAC will assess whether any landscape protection and enhancement programs outlined in the EMPs are effectively implemented. In the Annual Environment Report to the Secretary of DITRDLG, MAC will outline the details of progress made in flora, fauna and habitat management and update

Airport tenants

• Adhere to the approved 2010 Moorabbin Airport Environment Strategy and comply with the *Regulations* and other relevant environmental legislation Airport.

MAC will continue to provide new tenants with the updated *Requirements for Construction, Building and Operations at Moorabbin Airport* guidelines and the generic MAC EMP template for those organisations who will carry out significant construction works and operations at the Airport.

the Environmental Site Register with regard to any new landscaping works at the

MAC will continue communications, consultation and an advisory role in assisting tenants to comply with the Strategy and the *Regulations* (and where required, with the assistance of the AEO).

7.1 Environment Strategy First Year Action and Management Plan

The approved 2010 Draft Moorabbin Airport Environment Strategy requires MAC to prepare and submit an annual list of EMS and EMP actions and management initiatives. MAC has prepared the following environmental management actions and initiatives for the 2009/2010 reporting period, being the 1st reporting period of the approved 2010 Moorabbin Airport Environment Strategy.

Table 4 – Summary 2009/10 Reporting Period Environmental Management System (EMS) Activities

Environmental Training/Awareness:	Environmental Management Training - Operational Procedure. Develop a formalised environmental training program that is to be reviewed biennially (in 2012 and 2014). Implement this procedure from the 1st reporting year onwards.
Communication and Consultation:	Continue quarterly Moorabbin Airport Aviation Consultative Committee meetings. Continue AEO monthly and issue-specific meetings. Submit Annual Environment Reports to DITRDLG that will include an annual EMP for the following reporting year. As required, report back to tenants, and MAC maintenance areas and contractors following Environmental Reviews and/or site visits.
Airport Emergency Procedures:	Annually update the Airport Emergency Procedures with regard to potential environmental impacts.
Site Environmental Register:	Prepare the Moorabbin Airport Site Environmental Register to be annually updated.



Table 5 – Summary 2009/10 Reporting Period Environmental Management Plan (EMP) Activities

Environmental Reviews:	Carry out the 2010 Annual Environmental Review (as detailed in Section 5.1 and Table 3).
Externally Provided EMPs:	Review externally provided construction and operational EMPs and monitor their implementation (as detailed in Section 6.1 and Table 3), depending on construction and/or operational activities in the reporting year.
Air Quality Management:	As detailed in Section 5.2.3 and Table 3, and as part of the 2010 Environmental Review process:
	 Provide advice on installing, maintaining and using air pollution control equipment.
	 Monitor MAC's maintenance facilities and work practices to ensure fugitive emissions and/or dust is minimised.
	 Advise fuel supply companies of their NPI reporting requirements.
	 Provide general advice on the storage and handling of chemicals to minimise potential fugitive and/or process emissions.
	 Encourage tenants to assess chemicals used and seek to minimise their use, particularly those that result in greater fugitive and process air emissions.
	 Monitor MAC and tenant facilities for ozone depleting substances, and where required, assist in phasing out its storage and/or use.
	Review construction companies' EMPs to assess whether dust minimisation plans are outlined and whether they are effectively implemented (depending on construction activities in the reporting year).
	Review major Airport tenants' operational EMPs to assess if relevant air quality objectives are outlined and investigate their effective implementation (depending on operational activities in the reporting year).
	Ensure that the MAC fleet of company vehicles are maintained, and air emissions shall be considered if purchasing new vehicles.
	The Annual Environment Report prepared for the Secretary of DITRDLG will include details of progress made in air quality management and update the Environmental Site Register with regard to those aspects or areas of the Airport from which there are more notable emissions to atmosphere.
Noise:	As detailed in Section 5.3.3 and Table 3:
	Encourage relevant Airport users to comply with the requirements associated with the ground running of aircraft engines.
	Review construction companies' EMPs to determine if noise mitigation strategies are in place and assess if they are effectively implemented (depending on construction activities in the reporting year).
	Operational EMPs prepared by new tenants will be reviewed and MAC will determine if noise mitigation strategies are in place and assess if they are effectively implemented (depending on operational activities in the reporting year).
	The Annual Environment Report prepared for the Secretary of DITRDLG, will outline the details of progress made in the management of noise emissions and update the Environmental Site Register with regard to any new initiatives adopted that manage and/or reduce noise emissions.

Water Quality Management:	As detailed in Section 5.4.3 and Table 3, and as part of the 2010 Environmental Review process:
	 Assess MAC's and relevant tenants' storage of chemicals to determine if adequate controls are in place.
	 Monitor MAC's work practices to ensure that there are appropriate controls.
	 Encourage tenants to use dedicated aircraft washbay facilities.
	 Ensure identified wastewater is directed to the sewer system through trade waste agreements or is disposed of in accordance with Victorian EPA requirements.
	 Assess if integrity testing or other forms of UST monitoring are required.
	Carry out the annual stormwater monitoring program.
	Review construction companies' EMPs and determine if there are adequate controls in place to minimise the potential for water pollution and if they are being effectively implemented (depending on construction activities in the reporting year).
	Advise tenants with USTs that they continue to monitor them in accordance with the Victorian EPA requirements, as detailed in <i>EPA Publication 888</i> and <i>892</i> .
	Have new tenants operating at the Airport that require a trade waste agreement provide a copy of this agreement and maintain a register of agreements.
	If a relevant Master Plan proposal is approved in 2010, it will incorporate an SMP (developed in consultation with the AEO and other potential stakeholders) that will include WSUD principles for both the construction and the operational phases. Additionally, the construction works in a particular Airport stormwater catchment will result in improvements to that existing stormwater catchment.
	The Annual Environment Report prepared for the Secretary of DITRDLG will outline the progress made in water quality management and update the Environmental Site Register as detailed in Section 5.4.3 and Table 3.

Soil Quality Management:	Assess, where appropriate, the contamination status of soil on a particular site if one of the following circumstances occur:
	 prior to a parcel of vacant land being developed and tenanted;
	 if a tenant vacates a premises; and/or
	 due to activities carried out or an accident where the site is visually contaminated.
	The AEO will be involved in assessing and advising if a contamination assessment report is required and reviewing the results to determine whether it complies with the Regulations.
	As detailed in Section 5.5.3 and Table 3, and as part of the 2010 Environmental Review process:
	 Assess relevant tenants' storage of chemicals and materials.
	 Monitor MAC maintenance facilities and work practices to ensure that the storage and handling of chemicals and materials are adequately controlled.
	 Determine whether an integrity test or other form of UST monitoring is required and advise tenants whether they need to monitor their USTs for potential losses.
	Advise tenants with USTs that they continue to monitor them in accordance with Victorian EPA requirements, as detailed in <i>EPA Publications</i> 888 and 892.
	Review construction companies' EMPs and determine if there are adequate controls to minimise the potential for soil pollution and assess if these control strategies are being effectively implemented (depending on construction activities in the reporting year).
	The Annual Environment Report prepared for the Secretary of DITRDLG will outline the progress made in soil quality management and update the Environmental Site Register as detailed in Section 5.5.3 and Table 3.
Waste Management:	As detailed in Section 5.6.3 and Table 3, and as part of the 2010 Environmental Review process:
	 Encourage MAC, contractors and tenants to re-use and/or recycle as much as is practicable.
	 Monitor MAC maintenance facilities and work practices, ensuring that the storage and handling of wastes is adequately controlled and maintained.
	 Assess the storage and handling of wastes by relevant tenants.
	 Reviewing relevant tenants' documents to assess compliance with the Victorian EPA off-site disposal requirements.
	Depending on construction activities in the reporting year, review construction companies' EMPs and assess if there is effective waste management and waste minimisation in place and strategies that minimise the potential for an environmental impact. Assess if waste management and waste minimisation strategies are being effectively implemented.
	Promote the adoption of sound waste management, waste minimisation practices and re-use and recycling amongst relevant Airport tenants and MAC staff and contractors.

Hazardous Materials Management:	As detailed in Section 5.7.3 and Table 3, and as part of the 2010 Environmental Review process:
	 Evaluate the presence, storage and handling of hazardous materials by relevant tenants to determine if there are appropriate controls in place.
	 Monitor MAC's facilities and work practices to ensure that the presence, storage and handling of hazardous materials are adequately controlled.
	 Assess if there are emergency response procedures in place for Airport facilities that store bulk fuels and/or other chemicals in significant quantities.
	Maintain the register of facilities that have hazardous materials identified and encourage relevant Airport tenants to carry out assessments on their facilities.
	Maintain and implement the MAC Asbestos Management Plan.
	Depending on construction activities in the reporting year, review the construction companies EMPs and assess if there are effective hazardous materials storage and handling procedures and assess if hazardous materials storage and handling procedures are being effectively implemented.
	Promote the effective hazardous materials storage and handling procedures amongst relevant tenants and MAC facilities as detailed in Section 5.7.3 and Table 3.
	The Annual Environment Report prepared for the Secretary of DITRDLG will outline the details of managing of hazardous materials and update the Environmental Site Register as detailed in Section 5.7.3 and Table 3.
Climate Change:	As detailed in Section 5.8.3 and Table 3, and as part of the 2010 Environmental Review process that will incorporate climate change issues:
	 Carry out an assessment of MAC's energy usage and its associated calculated greenhouse gas emissions.
	 Seek to increase its efficiency with regard to energy-use associated with existing operations and (if any) significant construction works.
	 Promote strategies to minimise energy use and increase energy efficiency within MAC and Airport tenants.
	Depending on construction activities in the reporting year, review construction companies' EMPs and assess if there are efficient energy use strategies included and assess if any they are being effectively implemented.
	Depending on operational activities in the reporting year, operational EMPs prepared by tenants with significant energy use will be reviewed and assessed if efficient energy strategies are included and assessed if they are being effectively implemented.
	Ensure MAC vehicles are maintained to minimise fuel use and therefore minimise associated emissions of greenhouse gases.
	The Annual Environment Report to the Secretary of DITRDLG will outline the details of progress made in assessing and managing its greenhouse gas emissions and therefore its impact with regard to climate change.

Ecological Sustainability:	As detailed in Section 5.9.3 and Table 3, and as part of the 2010 Environmental Review process:
	 Assess MAC's usage of power, fuel and water.
	 Where possible and to the extent practicable, assess materials purchased and used by MAC.
	 Review of the potential to install power, fuel and water saving devices at MAC facilities.
	 Assess the extent of materials replacement.
	Depending on construction activities in the reporting year, review construction companies' EMPs, assess if efficient energy and resources use strategies are in place and determine these strategies outlined are being effectively implemented.
	Any significant new tenant will be required to have an operational EMP prepared and MAC will investigate if efficient energy and resources use strategies are in place and if those efficient energy and resources use procedures outlined are being effectively implemented.
	Promote the efficient use of resources amongst relevant Airport users and tenants.
	The Annual Environment Report to the Secretary of DITRDLG will outline details of progress made in assessing and managing MAC's contribution to ecological sustainability.
Flora, Fauna and Habitat, and Aboriginal and European	
Flora, Fauna and Habitat, and Aboriginal and European	As detailed in Section 5.10.3 and Table 3, and as part of the 2010 Environmental Review process:
Flora, Fauna and Habitat, and Aboriginal and European Heritage:	As detailed in Section 5.10.3 and Table 3, and as part of the 2010 Environmental Review process: Review 6-monthly the gardens-management procedures.
Flora, Fauna and Habitat, and Aboriginal and European Heritage:	 As detailed in Section 5.10.3 and Table 3, and as part of the 2010 Environmental Review process: Review 6-monthly the gardens-management procedures. Consult with the AEO and ABC if assessing applications for new building works to ensure landscaping information is provided and then implemented.
Flora, Fauna and Habitat, and Aboriginal and European Heritage:	 As detailed in Section 5.10.3 and Table 3, and as part of the 2010 Environmental Review process: Review 6-monthly the gardens-management procedures. Consult with the AEO and ABC if assessing applications for new building works to ensure landscaping information is provided and then implemented. Depending on construction activities in the reporting year, review construction companies' EMPs, assess if the construction works include the protection and enhancement programs are effectively implemented.
Flora, Fauna and Habitat, and Aboriginal and European Heritage:	 As detailed in Section 5.10.3 and Table 3, and as part of the 2010 Environmental Review process: Review 6-monthly the gardens-management procedures. Consult with the AEO and ABC if assessing applications for new building works to ensure landscaping information is provided and then implemented. Depending on construction activities in the reporting year, review construction companies' EMPs, assess if the construction works include the protection and enhancement of landscaped areas and assess if any landscape protection and enhancement programs are effectively implemented. The Annual Environment Report to the Secretary of DITRDLG will outline the details of progress made in flora, fauna and habitat management and update the Environmental Site Register with regard to any new landscaping works.
Flora, Fauna and Habitat, and Aboriginal and European Heritage: Airport tenants:	 As detailed in Section 5.10.3 and Table 3, and as part of the 2010 Environmental Review process: Review 6-monthly the gardens-management procedures. Consult with the AEO and ABC if assessing applications for new building works to ensure landscaping information is provided and then implemented. Depending on construction activities in the reporting year, review construction companies' EMPs, assess if the construction works include the protection and enhancement of landscaped areas and assess if any landscape protection and enhancement programs are effectively implemented. The Annual Environment Report to the Secretary of DITRDLG will outline the details of progress made in flora, fauna and habitat management and update the Environmental Site Register with regard to any new landscaping works. Depending on construction and/or development activities in the reporting year, provide new tenants with the updated <i>Requirements for Construction, Building and Operations at Moorabbin Airport</i> guidelines and the generic MAC EMP template for those organisations that will carry out significant construction works and/or operations at the Airport.

Moorabbin Airport Corporation

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