Moira Municipal Fire Management Plan

Municipal Fire Management Planning Committee, 2012

Preface

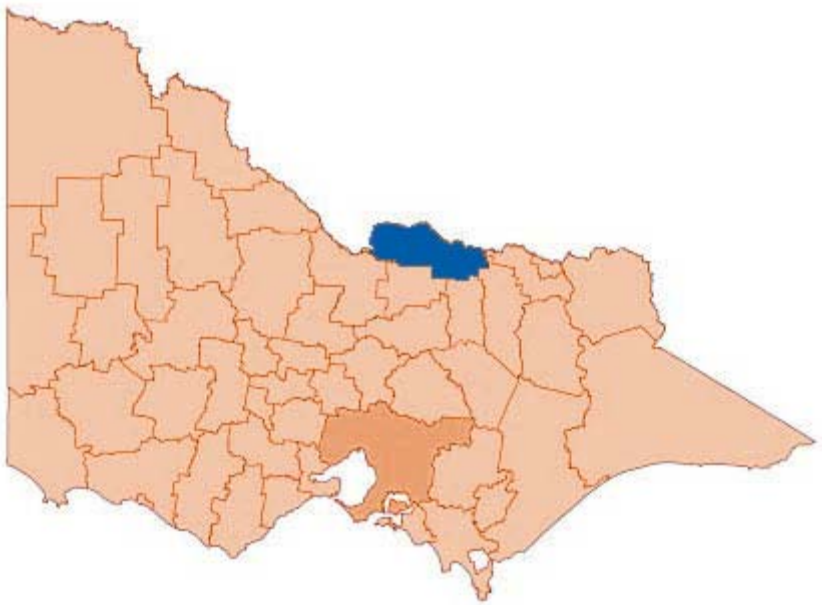
The Moira Municipal Fire Management Planning Committee (MFMPC) is responsible for providing a strategic and integrated approach to fire management within the Moira municipality. This task forms part of a broader state and regional framework established under the Emergency Management Act (1986) and is supported by the State Fire Management Planning Committee and the Hume Regional Strategic Fire Management Planning Committee (HRSFMPC).

A key responsibility of the Moira MFMPC is the development of a draft Municipal Fire Management Plan (MFMP) on behalf of the Moira Municipal Emergency Management Planning Committee for considered endorsement by the Moira Shire Council. This plan, which aligns with the Hume Regional Strategic Fire Management Plan 2011-2021, describes how regional authorities, local government, fire agencies and other relevant organizations can work together to effectively anticipate, respond to and recover from bushfire events affecting Moira Shire.

While the management of all types of fires is important, this plan has focused on bushfire in the first instance. The life of this plan is for three years and it is envisaged that future updates of this plan will include planning for other types for fire. Furthermore it is important to note that this plan recognizes, but does not duplicate, the extensive work already being undertaken in fire management across the municipality. This document is essentially a plan for improving integration of this existing work and developing improved methods for working together.

I join with the members of the Moira MFMPC in commending this document to you. We see the development and implementation of this plan as important step in the ongoing journey to securing a safer, more resilient community, healthier environment and a prosperous economy for our municipality.

Rob Van Dorsser
Chairperson
Moira Municipal Fire Management
Planning Committee



Version Control Table

Version number	Date of issue	Author(s)	Brief description of change
Version 1.0	4/5/12	C. Hajek and C. Price	Draft MFMP for Comment
Version 2.0	24/5/12	C. Price	Edits from Moira MFMPC Meeting 4.2 17/5/12
Version 3.0	3/7/12	C. Price	New Edits
Version 4.0	27/9/12	MFMPC	Edits in response to public comments
Version 4.1	11/10/12	MFMPC	Insert updated Hazard Tree ID attachment

Authorisation

This integrated MFMP was adopted as the first iteration of the Moira MFMP. This Plan was endorsed through a formal motion by the Moira MFMPC at their meeting on 12 October 2012, for which the Chair of the committee will sign for and on behalf of all members of the Moira MFMPC.

Signed: _____ Date: _____ **Plan endorsed by:**

Rob Van Dorsser
District 22 Operations Officer
Country Fire Authority
Chairperson
Moira Municipal Fire Management Planning Committee

This MFMP was endorsed as a sub plan to the Moira Shire Municipal Emergency Management Plan through a formal motion by the Moira Shire Municipal Emergency Management Planning Committee (MEMPC) at their meeting on 26 October 2012, for which the Chairperson of the committee will sign for and on behalf of the Members of the Moira shire MEMPC.

Signed: _____ Date: _____ **Plan endorsed by:**

John Shaw
Municipal Emergency Resource Officer
Moira Shire Council

This MFMP was adopted through a formal motion by the Moira Shire Council as the MFMP for the Moira Shire, at their meeting on 10 December 2012, for which the Chief Executive Officer /Mayor will sign for and on behalf of the Moira Shire Council.

Signed: _____ Date: _____ **Plan adopted by Council**

Gary Arnold
Chief Executive Officer
Moira Shire Council

The responsibilities and accountabilities attributed to the organisations represented at the Moira Shire MFMPC are endorsed by:

Signed: _____ Date: _____ **Plan endorsed by:**

Craig Stubbings
District Chief Ranger
River Red Gum District
Parks Victoria

Signed: _____ Date: _____ **Plan endorsed by:**

Alan Dobson
Regional Manager
Department of Sustainability and Environment

Signed: _____ Date: _____ **Plan endorsed by:**

Steve Allen
District 22 Operations Manager
Country Fire Authority

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1 Introduction

1.1 Context and Background

Victoria has a long history of community, government and organisations working cooperatively to combat the threat of bushfire. However recent challenges such as the decade of dry conditions, an increase in people living in high risk areas and the occurrence of a number of major fires, prompted the need for increased coordination and cooperation to secure fire safety across the state.

In response to these challenges the Victorian Government established an Integrated Fire Management Project (IFMP) Framework for Victoria in 2008.

> *IFMP aims to achieve a consistent and effective means for fire management planning within Victoria through a commitment to cooperation, including information sharing and the building of collective knowledge.*
>
> – The Integrated Fire Management Planning Framework, State Fire Management Planning Committee

IFMP provides a framework for consistent and effective fire management planning (see figure 1) across the fire management continuum, by providing a multi-agency approach, bringing together fire management planners and other stakeholders, including emergency service agencies, government departments, private organisations and the community. Working together they build relationships and share information to plan across public and private land tenures for all types of fire. IFMP is based on analysis and management of risk, uses best practices and builds on existing information.

Figure 1: Fire Management Planning

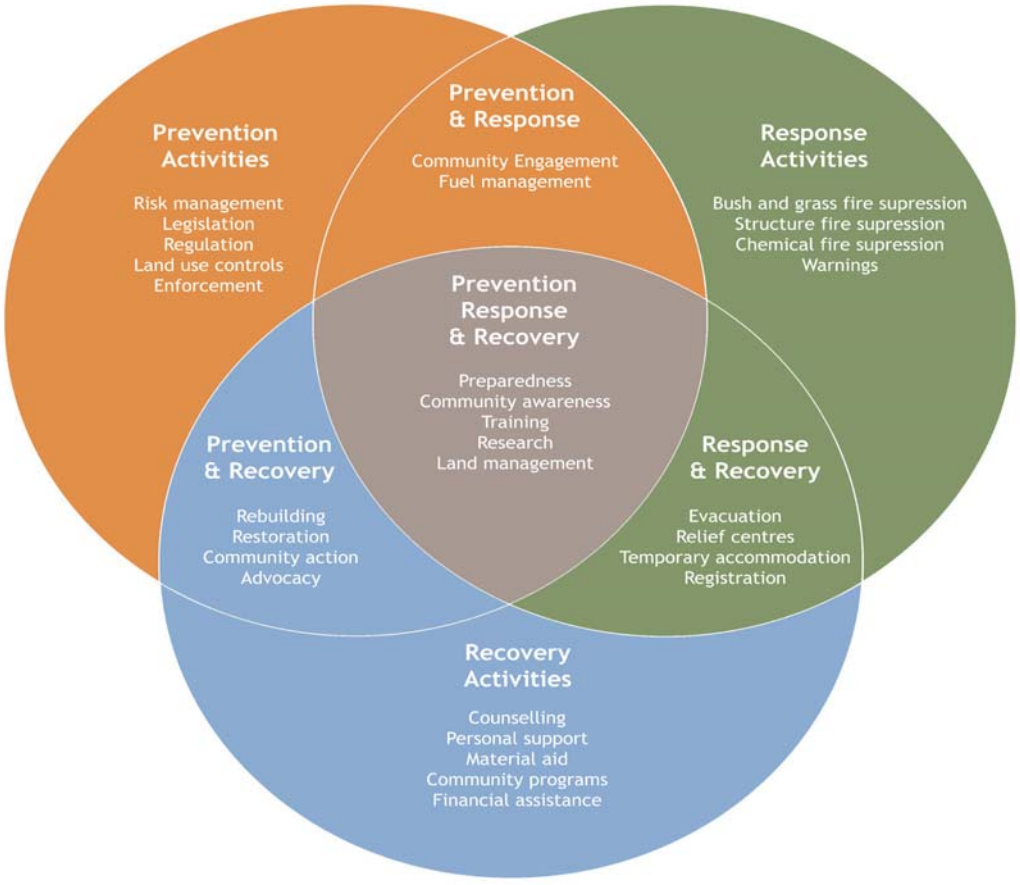
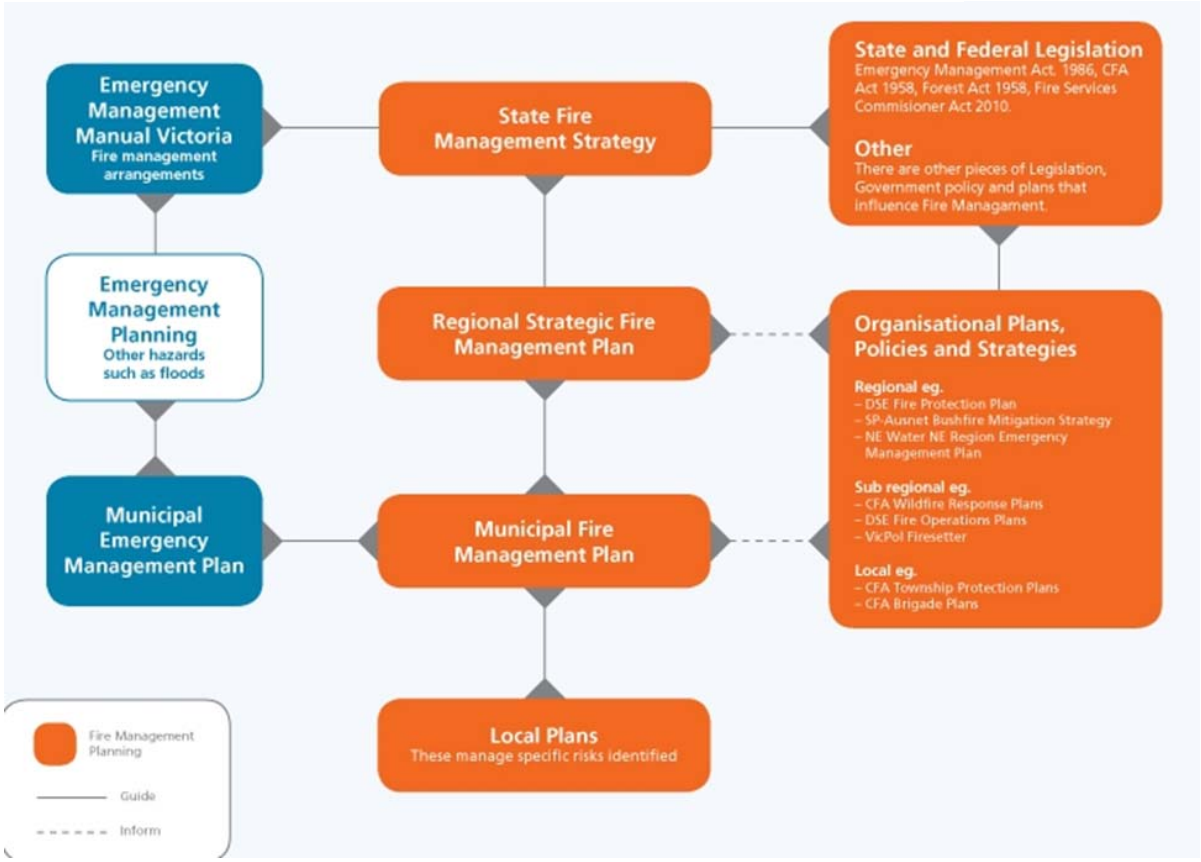


Figure 2: Victorian Management Plans and Policies



The framework provides structures, policies and procedures to help build on the existing spirit of cooperation and networks that already exist in fire management. It establishes a tiered system of state, regional and municipal plans that provide strategic direction to fire management in Victoria, as illustrated in figure 2.

The purpose of Municipal Fire Management Committees (MFMPC) is to provide a municipal level forum for building and sustaining organisational partnerships with regards to fire management; and to ensure that plans of individual agencies are linked effectively so as to complement each other. This is facilitated by MFMPCs having a membership consisting of representatives from key stakeholder organisations with respect to fire management within the municipality.

Moira MFMPC membership consists of:

- Moira Shire Council
- Country Fire Authority
- Department of Sustainability and Environment
- Parks Victoria

MFMPCs also act as a sub-committee of their respective Municipal Emergency Management Planning Committee. *Part 6A: Guidelines for Municipal Fire Management Planning*, of the *Emergency Management Manual of Victoria,* outlines the terms of reference for these committees, identifies their minimum core membership and requires the development of a Municipal Fire Management Plan.

The formation of an MFMPC and the development of a MFMP signify an important first step in the transition from Municipal Fire Prevention Plans developed under the guidance and direction of Municipal Fire Prevention Committees, to a MFMP developed under the guidance and leadership of a MFMPC.

1.2 Period and Purpose

Organisation and agencies involved in fire management already have a range of activities, plans, policies and procedures that are directly involved with, or that impact on fire management. This MFMP builds on this existing work, so as to chart and coordinate the implementation of measures in use across the municipality designed to minimise the occurrence and mitigate the effects of bushfires. It also seeks to identify the need for adopting or developing new activities, processes and policies, and communicating this need to the relevant responsible authority.

In doing so it takes into consideration all aspects of fire management;

- Prevention – Regulatory and physical measures to ensure that emergencies are prevented, or their effects mitigated
- Preparedness – Arrangements to ensure that in the event of an emergency occurring all those resources and services that area needed to cope with the effects can be efficiently mobilised and deployed
- Response – Actions taken in anticipation of, during and immediately after an emergency, to ensure its effects are minimised and that people affected are given immediate relief and support
- Recovery – The coordinated process of supporting emergency affected communities in the reconstruction of the physical infrastructure and restoration of emotional, social, economic and physical wellbeing.

MFMPs have a three year planning cycle and this plan has a three year duration commencing from the date of council endorsement. However it will be subject to annual review and modification as appropriate. The current MFMP concentrates on bushfires, however it is expected that future iterations of the plan will further incorporate management of structural and chemical fires as well as the use of fire for a variety of purposes.

1.3 Preparation Process

This MFMP has been developed in accordance with Part 6A of the Emergency Management Manual of Victoria and using the IFMP planning process as described in the IFMP Guide. This process follows a seven stage planning cycle as illustrated in figure 3.

Stage 1: Environmental Scanning – establish a municipal base line from which fire management planning and decision making can be made and measured, including development of fire management objectives.

Stage 2: Risk Assessment – identification, analysis and evaluation of the fire risks that potentially impact on the municipality.

Stage 3: Analysis – analysis of treatment options for achieving the fire management objectives.

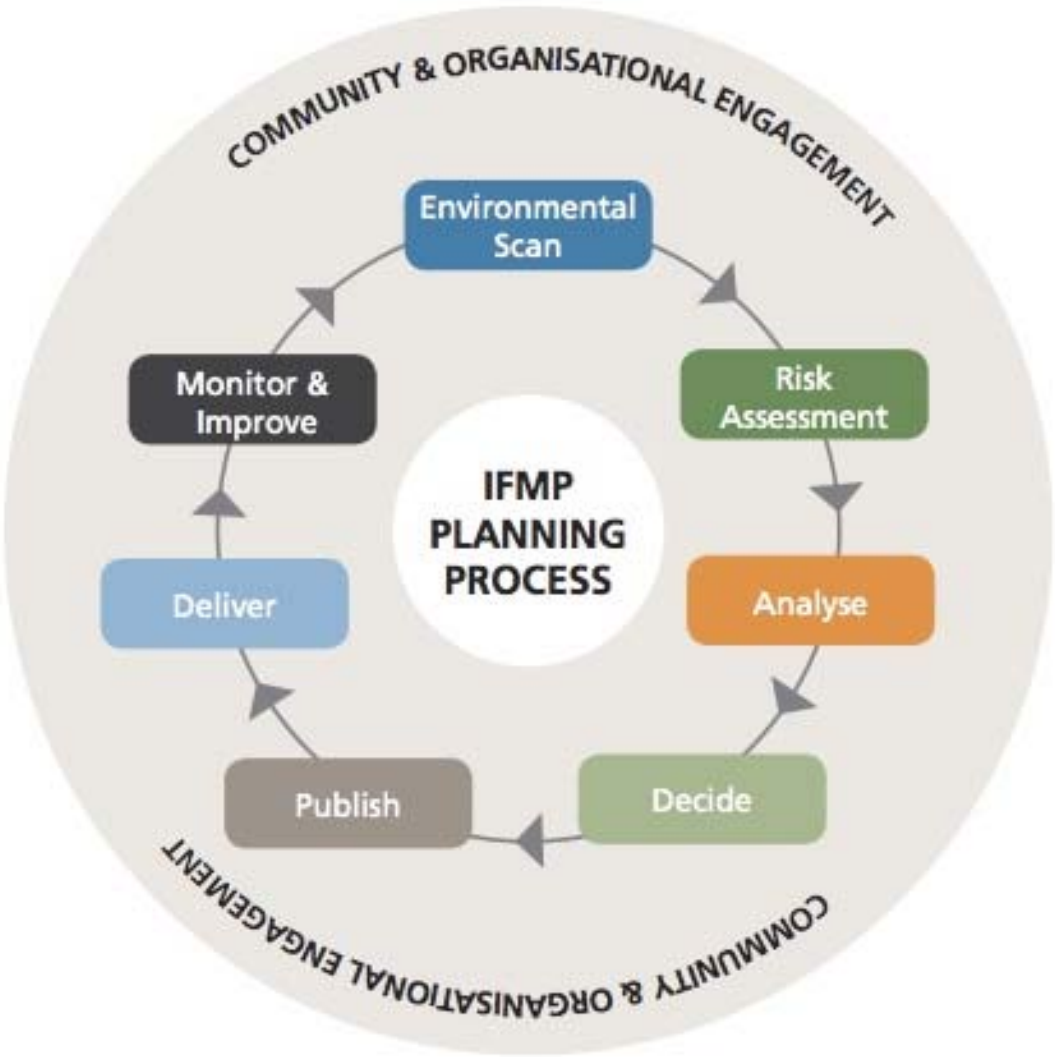
Stage 4: Decide – select the most appropriate risk treatment options to achieve the fire management objectives.

Stage 5: Publish –once the community and stakeholders have validated the draft MFMP, the relevant authorities endorse, publish and distribute it.

Stage 6: Deliver - relevant organisations implement the agreed risk treatments in the MFMP.

Stage 7: Monitor and Improve – track delivery and effectiveness of risk treatments so as to continually improve the MFMP's contribution to realising the fire management objectives.

Figure 3: Integrated Fire Management Planning Process



Over a period of 12 months members of the committee met on a regular basis to work through the steps outlined above for the purpose of developing this plan. This commenced with formally establishing the Moira MFMPC as a subcommittee of the Moira MEMPC and endorsing the terms of references based on those in Part 6A of the Emergency Management Manual of Victoria.

Subsequent activities include undertaking a stakeholder analysis, developing a communications strategy, identifying and assessing fire risks of concern with the municipality and assigning appropriate treatments to address them.

This planning process is risk based and aligns with the Australian Standard AS/NZS ISO 31000:2009 Risk Management – Principles and Guidelines, figure 4 (page 11) describes how this is achieved.

All concerns identified were considered and defined as risk statements with the cause and impact clearly described. Each of these risk statements were then assessed using the State Bushfire Consequence Table, Likelihood table and Risk Assessment matrix (See Attachment 1) as endorsed by the State Fire Management Planning Committee.

Figure 4: IFMP Alignment with AS/NZS ISO 31000:2009

Stage of the IFMP planning cycle	Relevant aspect of the AS/NZS ISO 31000:2009 Risk Management – Principles and Guidelines
Engagement Plan	Communicate and consult
Environmental Scan	Establish the context
Risk Assessment > Analyse	Identify the risk > Analyse the risk > Evaluate the risk
Decide > Publish	Determine and document treatment options
Deliver	Treat the risk
Monitor and Improve	Monitor and review

2 Engagement and Communications

Stakeholder engagement and participation is an essential element of fire management planning. Stakeholders are required to participate for a range of reason, including (but not limited to);

- Legislative responsibilities in relation to fire management.
- Leadership
- Provision of hazard expertise and technical advice
- Subject to hazard impact – directly and/or indirectly
- Land tenure and management arrangements
- Expressed expectation
- Influenced and/or support mitigation.

Stakeholder engagement is required during all seven stages in the IFMP planning cycle, the aim being for them to participate together in the collaborative development, delivery and monitoring of the MFMP.

Engaging with stakeholders in the development and implementation of the MFMP is an essential tool for drawing on existing knowledge and experience and to build support for and involvement in this plan.

These communication and engagement tasks have been built around the model of public engagement developed by the International Association of Public Participation (IAP2). This model is called the Public Participation Spectrum and is detailed in figure 5 below. This spectrum provides a framework for planning effective stakeholder engagement about any issue or plan. It is used as the basis for communication and engagement planning during the development and subsequent implementation phases

Figure 5: IAP2 Public Participation Spectrum

Inform	Consult	Involve	Collaborate	Empower
Provide balanced information to stakeholders	Obtain feedback on analysis and decisions	Work directly together to ensure issues are understood	Partner in each aspect of decision making	Place final decision making in the hands primary stakeholders

Community and Organisational Engagement Plan

In accordance with the IFMP planning guide the Moira MFMPC undertook a stakeholder analysis and used this as a basis for the development of a Communication and Engagement Plan concerning the MFMP.

The stakeholder analysis consisted of a two part process; first identifying the key stakeholders who needed to be engaged in the MFMP's development and secondly determining the nature and level of their interest in fire management planning. This second step involved considering each stakeholder in relation to eight different fire management roles which are described in figure 6 and four different stakeholder types as outlined in figure 7.

Figure 6: Fire Management Roles

Role	Description
Fire Coordination	Bringing together of fire management agencies and elements to ensure effective response to an incident or emergency. CFA has legislated responsibility under the *CFA Act 1958* for the prevention and suppression of fires and for the protection of life and property in the Country Area of Victoria. In accordance with provisions in the *CFA Act 1958* and the *Forest Act 1958*, DSE has fire management and fire suppression responsibilities for state forests and national, state and regional parks.
Land Owner/Manager Responsibilities	Landholder/managers are heavily involved in fire prevention and fire suppression on land under their control. They have legislated responsibilities to extinguish a fire burning on their land and to prevent fires from starting from the use of equipment and vehicles (*CFA Act 1958, Crimes Act 1958*). They are also required to comply with relevant local government laws, relevant planning or building permit conditions and conditions associated with permits to burn.
Response	Actions taken in anticipation of, during and immediately after a fire incident to minimise the impact of the fire.
Recovery	A coordinated process of supporting emergency affected communities in the reconstruction of physical infrastructure and restoration of emotional, social, economic and physical wellbeing.
Community Education	Community education is learning and social development, working with individuals and groups in their communities using a range of formal and informal methods
Community Care	Community care is about identifying and catering for groups or individuals with specific needs, before during and after fire.
Asset Protection	Asset protection involves protecting key community infrastructure such as power, water supplies, roads, gas pipes and protecting community assets such as parks and the environment. Asset protection can also involve the protection of private assets such as housing, plantations, crops and fences.
Regulatory	The issuing of permits for lighting fires. The development of and compliance with planning controls and permits for developments and building that take into account fire risk/management. The regulation and issuing of permits involving vegetation removal or fuel reduction activities for fire management purposes.

Figure 7: Stakeholder Type and Engagement Level

Stakeholder Type	Description	Participation Level
Internal	Formal responsibilities for IFMP process and outcomes	Collaborate and empower
Primary	MFMPC membership, responsibility for development of the plan, communication and engagement across and within organisations rest with these organisations	Collaborate and empower
Secondary	RSFMPC membership or fire management role within municipality, may be requested to provide specific inputs, dependant upon outputs, or requested to be involved in specific tasks,	Involve and consult
Tertiary	Strong interest in outcomes and may have valuable information/viewpoints to share	Inform and consult

Once a stakeholder had been categorised, the appropriate level of participation in the process and the different types of engagement activities required determined. The results of this stakeholder analyses and the resulting Communication and Engagement Plan can be found in Attachment 2.

2.1 Community Engagement

During the development phase of the MFMP the Moira MFMPC's communication and engagement efforts were focused primarily upon the key stakeholders. However a number of community groups were identified as Tertiary stakeholders and engaging with them and the broader community is seen as a critical component to the long term success of MFMP.

This community engagement process is very much seen as an ongoing responsibility of the Moira MFMPC and it is expected to gain prominence going forward once the plan is endorsed and especially during review periods. Consequently the Communication and Engagement Plan should be viewed as a live and evolving document that will be shaped according to the MFMPC's needs over time. In this manner it will be able to guide the process of broader community engagement with additional activities and details being incorporated as required.

It is also anticipated that in addition to the activities attributed to the MFMPC, individual key stakeholders will be utilising their existing processes and undertaking their own community engagement activities in support of IFMP and the MFMP.

3 Environmental Scan

Environmental scanning involves identifying key themes, issues, trends and gaps that may affect or influence fire management. It establishes the base level of knowledge and understanding required for supporting risk identification, risk assessment and risk treatment within a fire management context.

It involves gathering and interpreting data and information relevant to fire management, so as to make predictions, assumptions and conclusions concerning fire risk for the municipality over the period of the plan. It also provides the basis for identifying fire management objectives and decision making with regard to selecting strategies to achieve these objectives.

3.1 Municipal Profile

3.1.1 Location and Tenure

Moira Shire, a rural municipality, is characterised by small country towns and rural landscapes. The shire, located approximately 250kms or 2.5 hours' drive from Melbourne, is the largest shire in the north-east of

Victoria covering 4058 square kilometres. The Shire is situated in the Goulburn Murray region and is adjacent to the municipalities of the Rural City of Benalla, Shire of Campaspe, Indigo Shire, Rural City of Wangaratta and the City of Greater Shepparton. It is bordered to the north and northwest by the Murray River and the NSW shires of Murray, Berrigan and Corowa. To the southwest it is bordered by the Goulburn River and the Ovens River to the east.

Moira encompasses four major centres which consist of Cobram, Nathalia, Numurkah and Yarrawonga and includes 26 distinct smaller towns and communities.

Major features of the Shire include Barmah National Park, the Murray River and Lake Mulwala foreshores and Broken Boosey State Park. The shire is traversed by the Goulburn Valley Highway and Murray Valley Highway.

Predominant landholders in Moira Shire include Moira Shire Council, the Department of Sustainability and Environment and Parks Victoria who manage approximately 10% of land in the municipality. The remaining 90% of land in the Shire is privately owned and managed.

3.1.2 Population and Demographics

In the 2006 census, Moira Shire had a population of 28,049 which has estimated to have increased to 29,385 by 2010. The shire is growing and since 1996 the population of the municipality has increased by 16% (or 4,703 people). The majority of this growth was in Yarrawonga, with smaller growth recorded in Cobram and Numurkah.

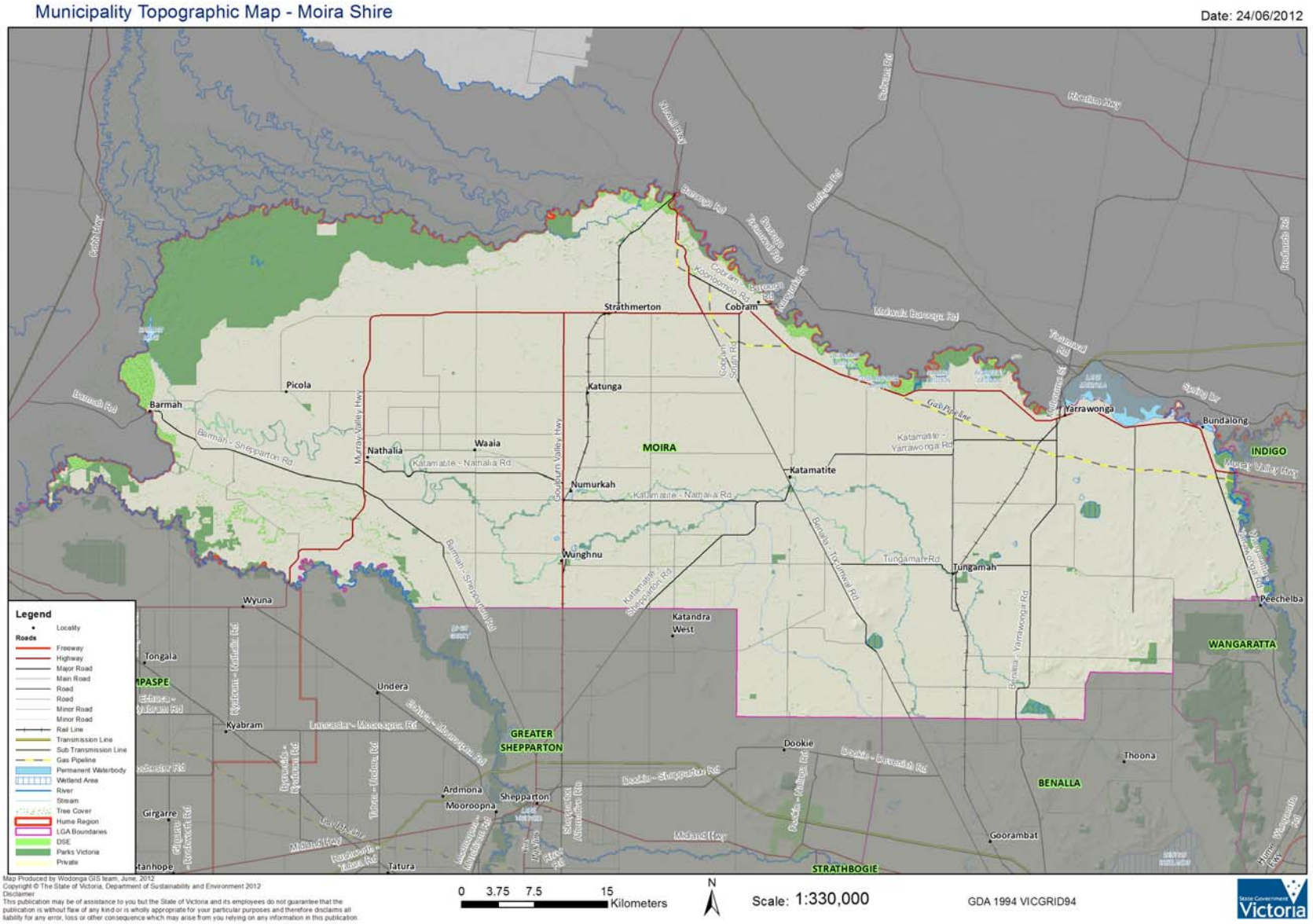
58.7% of residents live in towns in the Moira Shire, with the remaining population living either bordering towns or in rural area. Nearly 9% of the population was born overseas and 4.4% of the population speak a language other than English at home. Approximately 50% of households have access to the internet.

Moira has a higher percentage of persons in need of assistance, than compared to other areas in the Hume region. People who 'need assistance' are defined as those people whom in their normal lives due to a disability, long term health condition or old age have problems with self care, body movements or communication and need assistance of some type. Overall, 5.4% of people living in Moira Shire need assistance in core activities compared with 4.5% on average, for the rest of the Hume region.

According to the *Moira Social Plan 2007*-2010, Social issues in the Moira Shire can be divided into six key issues which are:

- Infrastructure for older people
- Supporting young people in Moira
- Infrastructure provision in growing areas
- Access to health and community services
- Responding to disadvantage (social, economic, racial and geographic)
- Drought and the environment

Figure 8: Moira Shire Map



3.1.3 Natural Environment

The Moira Shire is situated on the alluvial floodplains of the Murray, Ovens and Goulburn Rivers. The natural environment, composed of wetlands, waterways, plains woodlands and grassland are highly valued by both the local Moira community and tourists to the area. Moira's abundant waterways and associated natural vegetation provide habitat for many migratory birds, and breeding habitat for threatened species such as the Trout Cod (*Maccullochella macquariensis*). Key biodiversity assets of the shire include:

- The Murray River
- The Barmah Wetlands (a RAMSAR listed wetland)
- Plains Grassy Woodlands and Grasslands
- Broken Boosey State Park
- State and Nationally listed species
- The Muckatah Catchment

Private land in Moira Shire includes approximately 90% of the Shire's area and much of this land has been cleared for agricultural purposes. Some small areas of native vegetation occur on private land, but remnants area generally highly fragmented and isolated. Vegetation on public land is confined to roadsides, parks and river sides. The municipality has some large areas of public lands including the Barmah Wetlands and Broken Boosey State Park.

The Barmah Wetland is situated in the north west of the Shire and contains the largest stand of River Red Gums (*Eucalyptus camaldulensis*) in the world. The wetlands are listed as a RAMSAR site (number EA2001) and contain high value ecological, recreational, scientific and aesthetic areas.

The Murray River runs along the northern border of the Shire. Large numbers of native fish have been recorded in the Murray River in the Moira Shire including the critically endangered Trout Cod (*Maccullochella macquariensis*) and other less threatened species such as the Murray Cod (*Maccullochella peelii peelii*) and Golden Perch (*Maquaria ambigua*) and also supports a number of amphibians and water birds.

The woodlands, grasslands and other vegetation communities throughout the Moira shire support a number of other threatened and protected species including:

- Grey-Crowned Babbler
- Superb Parrot (only population in Victoria)
- Great Egret
- White Bellied Sea Eagle
- Bush Stone Curlew

Much of the remaining vegetation communities are isolated and depleted with their ranges restricted to public land, roadside reserves, rivers and waterways and small patches on private land. Many of these are sensitive to modifications in land use including flood and drainage and require active management to ensure their survival.

Large areas of the shire are subject to flooding due to the proximity of major rivers and other waterways and the general topography of the region.

3.1.4 Land Use, Economy and Employment

Moira shire is predominantly a rural area, but has significant residential areas in the main townships of Yarrawonga, Cobram, Numurkah and Nathalia. Over two-thirds (71%) of Moira's area of 4058 square

kilometres is used for agricultural production which is equally divided between dry-land and irrigated agriculture. The shire has a strong primary production sector which consists of approximately:

- 258,000 sheep and lambs
- 145,000 dairy cattle
- 39,500 beef cattle
- 14,500 pigs
- 72,000 ha of grain
- 210 ha of vegetable production
- 4,307 ha of orchard trees and
- 14,000 ha of broad acre non-cereal crops

Dairying is one of Moira's main agricultural industries and utilises 490,000 ha of the Shire's land. The total gross value of agricultural production annually in the Shire is $439.1 Million. Moira Shire also has a large viticulture industry, value-added manufacturing food processing and tourism industry based upon its strengths of climate, water, riverine topography and landscape.

Retail trading is mostly centred in the regional towns of Cobram and Yarrawonga. Tourism and recreation are also significant industries in the Moira Shire. They are generally focused on the natural environment and centred on or around the major rivers in the Shire, predominantly associated with the Murray River.

3.1.5 Climate

Moira Shire is characterised by a temperate climate with cool winters. Average rainfall is approximately 450mm through most of the shire although the east of the shire (e.g. Yarrawonga) records more significant rainfall during February than the west of the shire (e.g. Numurkah). Summer temperatures average approximately 30-31 C° during the day throughout most of the shire and nigh time summer temperatures are between 13-14.5 C°. Winter maximums average around14 C° and minimums around 3.5 C°.

The future climate in the greater Goulburn-Broken region is expected to become hotter and drier than it is today. It is also expected that there will be a larger proportion of hotter days, fewer frosts and a greater incidence of drought. Higher intensity, but lower predictability, of rain events is also likely to occur with less rain available for irrigation. These climactic changes will influence and possibly increase the likelihood of fire in the municipality.

By 2030 it is predicted that the average temperatures in the region will increase by 0.8°C and by 2070, depending on emissions, temperatures will increase on average by 1.4°C to 2.7°C. The climate is likely to become increasingly erratic with higher occurrences of heat waves, storms and frosts. These climactic changes will also make fire behaviour harder to predict.

3.1.6 Fire History

The following major wildfires have occurred in Moira Shire in the last 10 years:

- 2004 December - Wildfire Open Country Almonds 789 hectares Crop/Dryland Pastures, Fencing & 1 Disused Church.
- 2005 December - McCoy's Bridge Kotupna Bushfire DSE/PV area Burnt Unknown.
- 2006 October - Pig Hole Track Bushfire DSE/PV Fire 1,012 hectares (Barmah State Forest) now Barmah National Park.

In this time there have also been a number of significant structural fires including:

- 2004 November – St Marys School Fire, Nathalia

- 2008 January – ANZ Bank Fire, Cobram
- 2010 April – Melba Theatre Fire, Cobram

All these fires have had a major impact to the communities within the Moira Shire of some sort either economically or environmentally.

There are 27 Fire Brigades that have all or part of their area within the Moira Shire, they are as follows:

- Almonds, Barmah, Cobram East/Boosey, Bundalong, Burramine, Cobram, Drumanure, Kaarimba, Katamatite, Katandra, Katunga, Kotupna, Naring, Muckatah, Nathalia, Numurkah, Peechelba, Picola, St James and District, Strathmerton, Tungamah, Waaia, Wilby, Wunghnu, Yabba North, Yalca/Yielima, Yarroweyah and Yarrawonga.

All CFA Brigades are well equipped with modern equipment. DSE also maintain an active fire fighting role, particularly in relation to bush fire, and have two well-resourced work centres in Yarrawonga and Nathalia.

To describe the effect of fire in the municipality it is necessary to understand the fire history of the Shire. This can be done by examining the number and type of Fire Danger Indexes (FDI) and Total Fire Bans (TFBs) for the municipality. FDIs are determined based on a range of meteorological factors including historical data (days since last rain, drought index) and current data (temperature, humidity, wind speed). Fire Danger Ratings (FDR) describe ranges of FDIs, and can be based on either historical data (actual FDR) or a combination of historical or forecasted weather parameters when predicting future FDRs. FDR is therefore a function of climate, however due to the significant difference between forest fire and grass fire conditions, two different FDI meters have been developed. FDI is also a factor used in the decision making process concerning the declaration of Total Fire Ban (TFB) days.

The following figures provide a historical picture of the fire situation in the Municipality. Figure 9 gives us the average breakdown of the Municipalities fire season across the Moderate to Code Red categories of the FDR range, where 1 = forest and 2 = grassland. Whereas figure 10 describes the annual variation between each FDR category over different fire seasons for the last seven years. Finally figure 11 is a record of the number of TFBs declared within the Municipality (State-wide & Regional) over the last 10 years. What these statistics indicate is that the Municipality has a highly variable fire season, but it can expect to experience some “Moderate” to “High” FDR level days every year, with more severe conditions occurring on a regular if not annual basis.

Figure 9: Moira Shire Fire Danger Rating History

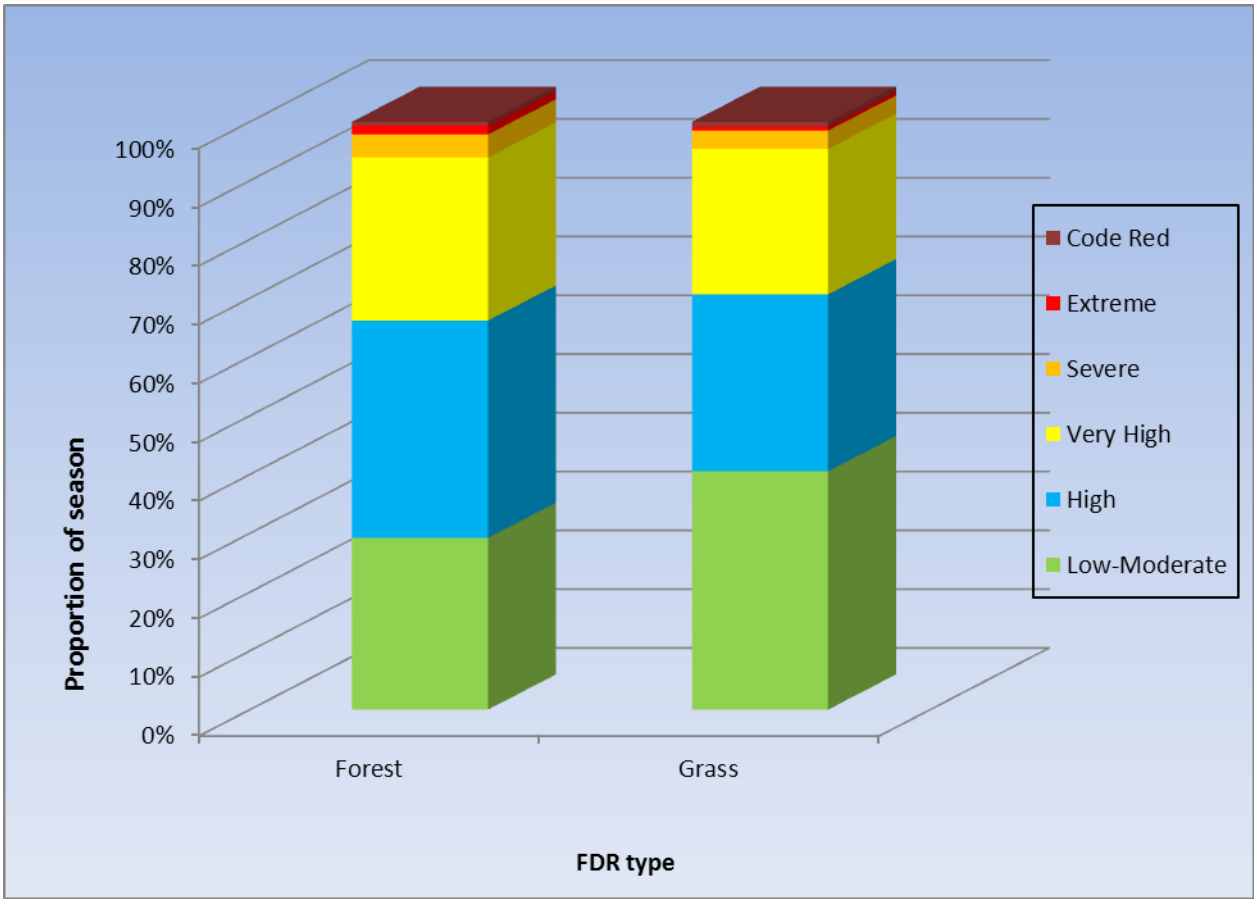


Figure 10: Historical Total Fire Day declarations for Moira Shire

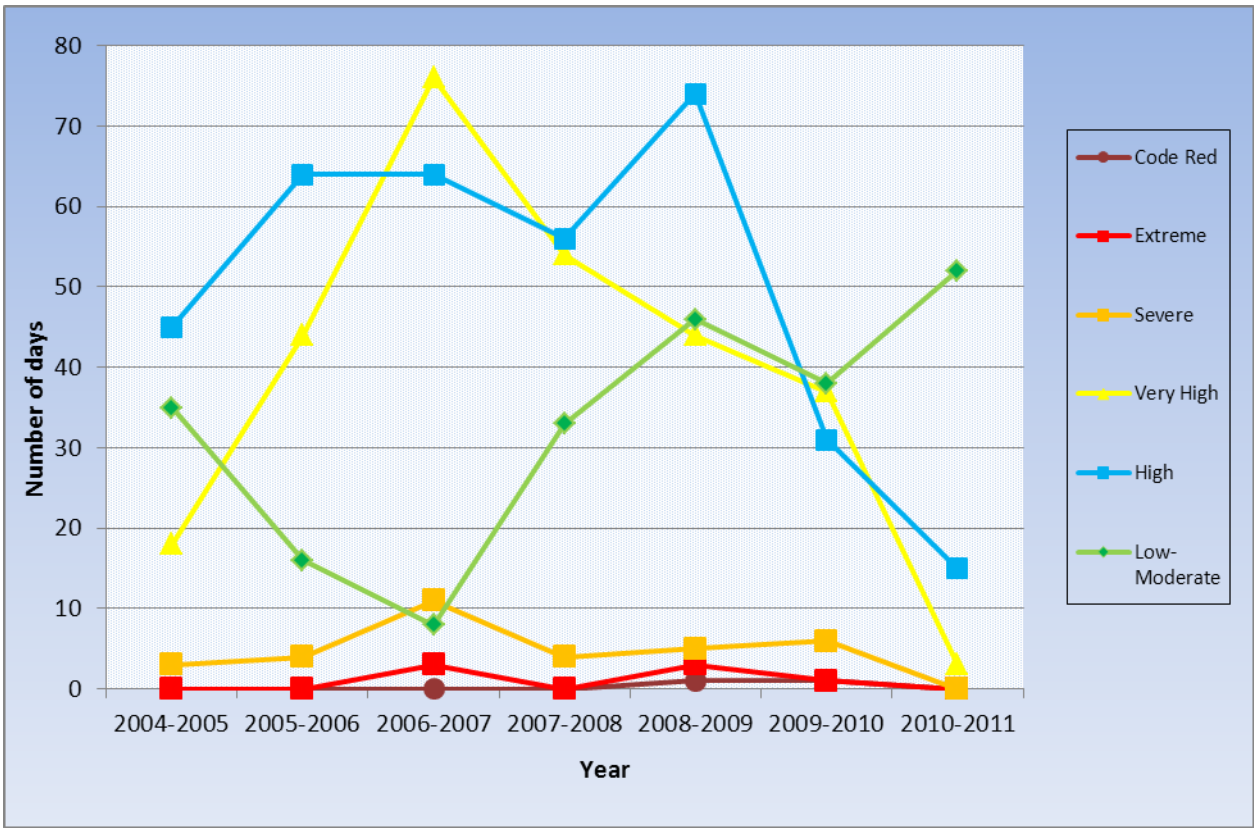
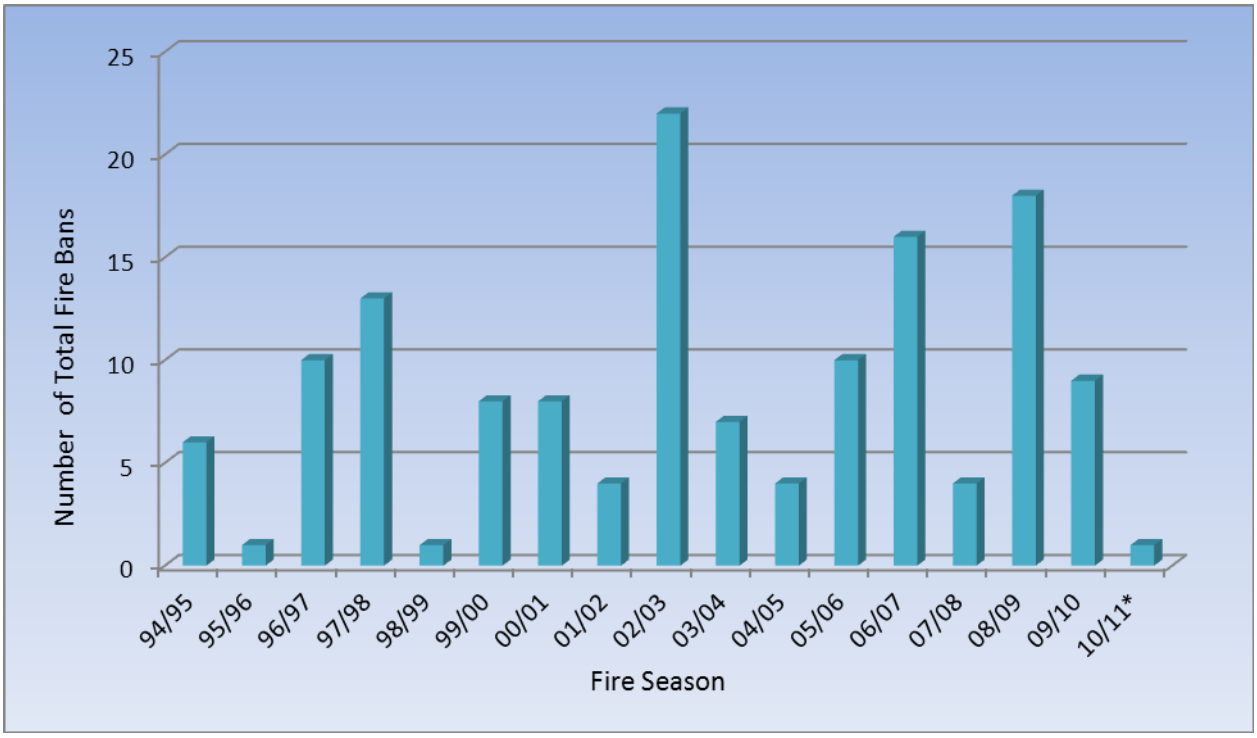


Figure 11: Historical 'Total Fire Ban Day' declarations for Moira Shire



3.2 Strategic Implications

Bushfire can occur in any type of vegetation, such as grassland, trees, crops or shrubs. This section describes the Moira municipality and factors that increase the likelihood of a fire starting and spreading across this area. Ensuring the municipality is a safe and healthy place to live and work, involves protecting the social, environmental and economic fabric of the municipality.

Moira Shire has a range of assets and features which make it a vibrant place to work, live or visit. These include large townships, small communities, and rural areas, industries such as agriculture, agribusinesses and tourism and important infrastructure for essential services such as transport, power, and communications. In addition to the built environment the municipal boasts a range of natural assets such as good quality water resources and extensive native forests which are valued for their environmental, commercial and visual appeal.

The vegetation and topography of the Municipality create a number of challenges for fire management. In the north, and along the watercourses in the shire, there are a number of large public parks and reserves, particularly in the north-west, containing remnant vegetation and associated fuel loads. These areas have a number of watercourses, prior watercourses, billabongs and drainage lines running through them that can delay response times as locating and accessing fires with emergency equipment can be difficult.

The Murray, Ovens and Goulburn Rivers essentially form physical barriers in the north, east and west of the shire. These rivers are positive for the mitigation of fire in that they form these barriers and also allow access to water. However they also limit access and egress in an emergency response.

There are also a number of creeks and drainage channels that contain large amounts of water. Generally, these drainage lines run from east to west. The major creeks in the municipality include the Broken, Major and Boosey Creeks. These creeks are also often difficult to cross as the creek gullies are embedded in the surrounding land.

3.2.1 Vegetation

The woodlands and grasslands of Moira Shire present a number of fire safety challenges as do the major wetlands including Barmah Wetland as they often dry out over summer. Much of the vegetation in the shire is confined to river corridors and parks associated with the major rivers. Although fuel loads in these areas may be relatively low, they have the potential to easily burn most summers. Consequently fire management in and about these areas is an annual task.

Bushfire threat is not confined to forested environments and the threat of grass fires is a significant one throughout the shire. While grassfires may have lower intensities and flame heights than forest fires, the combination of open ground and fine fuels can produce very fast moving destructive fires.

3.2.2 Weather and Climate

Weather conditions and climate also impact on fire management in Moira Shire. For instance the bushfire season and associated restrictions is generally longer that of other areas. Typically the municipality experiences spring rains and mild conditions that promote growth followed by hot summers which lead to high fuel loads.

The usual pattern during summer months of north westerly winds accompanied by high day time temperatures and low relative humidity building up over several days to a storm event with a change to south westerly winds. This creates a situation whereby fire ignition from lighting becomes a likely possibility, with a propensity for the fire to run quickly in one direction before changing direction quickly, thus transforming the fires extensive flank into the new fire front.

With current trends and thinking in climate change, research modelling suggests the future climate will be warmer, drier and less predictable. We can therefore expect an increase in the number of extreme fire danger days as well as longer fire seasons.

3.2.3 People

Moira has experienced a number of fires in recent years. Its' combination of topography, climate and vegetation coupled with the increasing number of people living in and visiting high fire risk localities during the fire danger period poses a significant issue for the municipality. Moira Shire's population of just over 28,000 people rapidly expands during the summer months with holiday makers drawn to the area by the combination of large watercourses and camping in remnant bushlands.

Moira Shire has people with different perspectives, diverse cultural backgrounds and different needs in regard to fire and fire safety. Understanding these needs is central to delivering effective community safety initiatives. This is particularly important for people new to the area or those that recently experienced a severe fire event.

The impact of a bushfire increases if the fire occurs in areas where people live, work and visit, so consequently, settlement patterns are important when understanding bushfire risk. There is significant population expansion around the urban areas of Yarrawonga, Cobram and Numurkah, both intensively at the town's edges and less intensively through rural residential development in the surrounding areas, such as 'Silverwoods' near Yarrawonga on the banks of Lake Mulwala, for lifestyle reasons. These patterns of human settlement have increased the amount of urban rural interface that requires intensive fire management.

Tourism also has considerable impact on human movement during the fire danger period, interacting with fire management at a several points, particularly along the major water courses in the region (The Goulburn, Ovens and Murray Rivers). The same landscape features that may lead to increased fire danger, can also be underpinning elements of what makes the site attractive for tourism. Furthermore visitor numbers tend to increase as the fire season advances creating a situation of increasing potential impact as the fire risk rises.

4 Municipal Fire Management Objective

The Municipal Fire Management Objective provides a framework for considering, selecting and evaluating fire management activities. This objective was developed using the information examined during the environmental scanning process, as well as being informed by the Hume Regional Fire Management Plan and relevant issues and priorities from regional stakeholders and adjoining municipalities.

4.1 Municipal Objective

The fire management objective of Moira MFMPC is;

> ***The Moira Shire working together to effectively anticipate, respond to and recover from major fire – to secure a safer municipality, more resilient community, healthier environment and a prosperous economy***

4.2 Strategic Direction

In developing strategic directions for the MFMP the MFMPC was mindful of the planning context within which they were undertaking this task. As illustrated in figure 2 the MFMP forms a critical third tier in the State of Victoria's Fire Management Planning hierarchy and therefore must not be developed in isolation from State and Regional level fire management plans. The MFMPC are keen to ensure any actions within the MFMP's support and compliment any relevant State objectives and strategies with regard to fire management. Consequently they have adopted the following broad strategic directions from the State Fire Management strategy 2009

- Active participation of the community, the sector and government, working together in fire management planning to reduce the destructive impact of fire on communities and the environment.
- Communities that are resilient to fire.
- Greater understanding of the fire sector within the community.
- Healthy natural, social and built economic environments.

4.3 Alignment of Regional & Municipal Objective

The Moira municipal fire management objective aligns closely with the Hume RSFMP objectives and vision for fire management. The development and implementation of this plan will therefore contribute significantly to the realisation of the Hume RSFMP's vision.

Hume Regional Fire Management Vision
The Hume Region working together to effectively anticipate, respond to and recover from major bushfire – to secure a safer region, more resilient community, healthier environment and a prosperous economy.

Furthermore the formation of the Moira MFMPC and the development of a MFMP using the designated IFMP Planning Guide have strongly supported several of the RSFMP's key objectives. Evidence of this is described in the following table.

Figure 12: Alignment of MFMP & RSFMP Objectives

RSFMP Element	RSFMP Objective	MFMP Contribution
Planning Together	Develop state, regional, municipal and local fire management plans and planning with a clear purpose and a consistent assessment of risk.	The MFMP provides the third tier in the IFMP process and utilises the same risk base approach as used with State and Regional plans
Collaborative Implementation	Develop and implement fire management programs and activities in a collaborative manner.	The MFMPC consists of multiagency representation and has incorporated community engagement strongly into the development of the MFMP. It therefore exemplifies collaborative implementation.
Building Knowledge & Capacity	Build and share knowledge in the fire management sector and across the community. Improve the capability of communities, the fire management sector and the government to deal with fires.	The aspirations of the MFMPC converge with the regions in seeking to build both its members and the communities' knowledge and understanding of fire management.
Implementation Support	Support the implementation of the IFMP framework in the Hume region	The development of this MFMP clearly demonstrates support for IFMP at a municipal level.

5 Fire Management Risk Strategies

Integrated fire management planning is the risk management process to establish priority setting for fire management activities and is consistent with the international standard for risk Management ISO 31000. Risk is described within the standard as;

Risk Analysis = Consequence x Likelihood

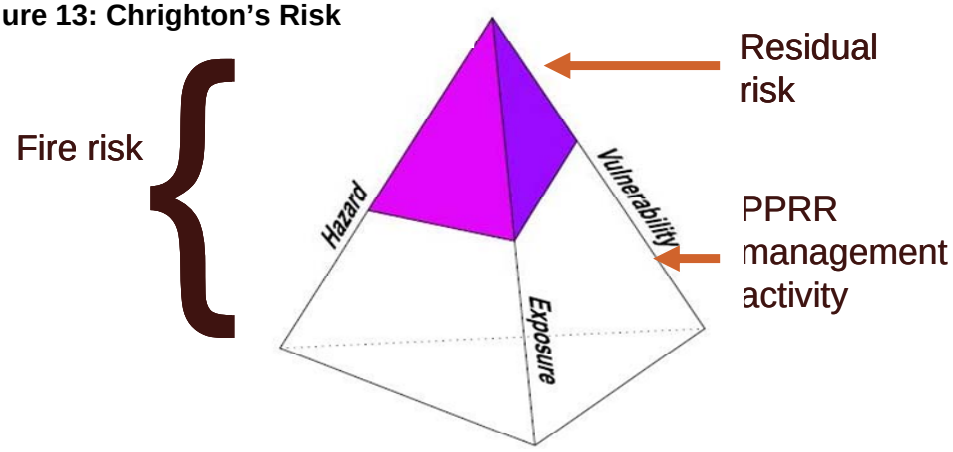
And the standard emphasises the need to establish and manage the risk to the objectives that you have set during the plan development process.

5.1 Risk Identification Process

These objectives and risks were identified through the environmental scanning process and primary to this process is Chrighton's Risk Pyramid. Chrighton's Risk Pyramid provides a framework for sorting, analysing and assessing information with respect to fire risk. It helps identify the amount of risk generated by the hazard x exposure x vulnerability relationship within the context (people, property, infrastructure, social and economic, biodiversity, the economy and heritage values) of a location or situation. Where;

- Hazard - is a specific event characterised by a certain magnitude and likelihood of occurrence
- Exposure - refers to the factors, such as people, buildings, networks the environment and economy that are subject to the impact of a specific hazard
- Vulnerability - refers to the characteristics of an element exposed to a hazard - road, building, person, and economy – that contributes to the capacity of that element to resist, cope with and recover from the impact of a natural hazard.

Figure 13: Chrighton's Risk



By this means the MFMPC was able to generate a list of bushfire risks for the municipality. As IFMP encompasses planning across all fire hazard environments, hazards need to be considered within a range of categories, so as to better understand the likely consequences and recovery risks involved. A copy of these categories can be found in Attachment 1.

5.2 Risk Assessment Process

Risk is assessed by determining consequences and the likelihood of the consequence occurring, and the elements at risk. An event or set of circumstances may have multiple consequences and may affect multiple objectives. Existing risk treatments and their effectiveness should be taken into account when rating the level of risk.

As a first step in the assessment process each of the identified risks were refined into succinct risk statement and entered into the Risk Register. Risk statements are a description of the risk and simply describe the risk in terms of the source through to the impact. Each risk statement should outline:

- the hazard (source of risk)
- the element at risk
- the consequence of the interaction as a result of an event

Each of these statements was then qualitatively assessed for their impact using the State Fire Management Planning Committee's State Bushfire Consequence Table (Attachment 1). Each consequence was considered in terms of both damage and disruption (loss of service or function) and in some cases, the consequence of an event was not realised at the local, level but was of a significant impact at regional and/or state level. In addition the committee took into account existing treatments and their impact on the risk level. Consequence ratings were then entered into the risk register.

The likelihood of each an event being realised was assessed using the data derived from the environmental scan and the *Likelihood Table* (Attachment 1). Where the committee did not believe it held the necessary technical expertise to make an assessment, advice was sought from relevant authorities outside the committee. Once agreement as to *Consequence* and *Likelihood* was reached the *Likelihood x Consequence matrix* (Attachment 1) was used to assign a risk level to each risk statement.

The following figure (14) is a summary of the risk assessment process, detailing the highest priority bushfire risks in the Moira Region. The priority risks were determined by the combined fire experts on the MFMPC which utilised the fire experience of committee members, the VFRR risk register and the former Moira Shire Fire Prevention Plan.

Figure 14: Moira Risk Register

ID #	RISK DESCRIPTION (Defined)	CAUSE	IMPACT	COMMENT
1	Risk of people with vulnerabilities and residences in the northern and western side of Numurkah being impacted upon by fire on high and above FDR days	Western side of Numurkah is open to grasslands and fire direction has historically been driven by hot northerly and northwesterly winds	Loss of life, residences, assets, cost and time or recovery, community health and disability services	Aged people and people with disabilities live in the housing commission area on north and western side of Numurkah. A southwesterly wind change will change fire behaviour and conditions and potentially have alternative consequences than those listed
2	Risk of people with vulnerabilities and residences in the northern and western side of Nathalia being impacted upon by fire on high and above FDR days	Western side of Nathalia is open to grasslands and fire direction has historically been driven by hot northerly and northwesterly winds	Loss of life, residences, assets, cost and time or recovery, community health and disability services	Aged people and people with disabilities live in the housing commission area on north and western side of Nathalia A southwesterly wind change will change fire behaviour and conditions and potentially have alternative consequences than those listed
3	Risk of areas in Lower Moira being impacted upon by fire due to high grass and bush fuel loads on high and above FDR days	Lightning, natural causes, farm machinery/maintenance, camp fires etc	Potential loss of life, residences, assets, cost and time or recovery	Only 3 or 4 permanent residences but a higher transitory population (seasonal), includes Cape Horn Winery
4	Risk to infrastructure, residences and people living on the forest	Lightning, natural causes, farm machinery/maintenance,	Potential loss of life, residences, assets, cost and	Primarily residential area, sewage treatment plant, water treatment plant

Figure 14: Moira Risk Register

ID #	RISK DESCRIPTION (Defined)	CAUSE	IMPACT	COMMENT
	interface on the northern and eastern side of Cobram from fire on high and above FDR days	camp fires etc	time or recovery	
5	Risk to infrastructure, residences and people living on the forest interface on the northern and western sides of Yarrawonga from fire on high and above FDR days	Lightning, natural causes, farm machinery/maintenance, camp fires etc	Potential loss of life, residences, assets, cost and time or recovery	Lifestyle size blocks of land
6	Risk to infrastructure, residences and people from forest fires to the north and grass fires from all directions in Bearii on high and above FDR days	Lightning, natural causes, farm machinery/maintenance, camp fires etc	Potential loss of life, residences, assets, cost and time or recovery	
7	Risk to infrastructure, residences and people from forest and grass fires from all directions in Koonoomoo on high and above FDR days	Lightning, natural causes, farm machinery/maintenance, camp fires etc	Potential loss of life, residences, assets, cost and time or recovery	Effectively managed private properties (manicured gardens etc)
8	Risk of fire impacting people at unmaintained campgrounds along the Ovens, Murray and Goulburn Rivers on high and above FDR days	Lightning, natural causes, machinery/maintenance, camp fires etc	Potential loss of life, infrastructure, cost and time or recovery, economic impact due to reduced tourist numbers	High fuel loads, Limited access and egress (usually one road in and out)
9	Risk to people and infrastructure in maintained camping grounds and caravan parks along the Ovens, Murray and Goulburn Rivers on high and above FDR days	Lightning, natural causes, machinery/maintenance, camp fires etc	Potential loss of life, infrastructure, cost and time or recovery, economic impact due to reduced tourist numbers	High fuel loads, Limited access and egress (usually one road in and out) Includes all VFRR category 1 risks
10	Risk to people, infrastructure and staff at Oasis Retirement Village from fire on high and above FDR days	Lightning, natural causes, machinery/maintenance, camp fires etc	Potential loss of life, infrastructure, cost and time or recovery	To be discussed further at VFRR review
11	Risk of hay stack fires escaping and impacting people, infrastructure and employment throughout Moira Shire on severe and above FDR days	Spontaneous combustion and high winds, arson	Loss of assets or infrastructure	Potential for fire to escape and affect surrounding areas is low with hay stack fires

Figure 14: Moira Risk Register

ID #	RISK DESCRIPTION (Defined)	CAUSE	IMPACT	COMMENT
12	Risk of machinery in paddocks igniting crops during harvest time and damaging production and plant with the potential to spread on days of high FDR and above.	Farm machinery/plant	Loss of assets or infrastructure	Potential for fire to escape and affect surrounding areas
13	Risk to power infrastructure in Moira Shire, including transmission lines, Cobram and Numurkah substations from fire on days of high FDR and above leading to a loss of service	On high temperature days demand is higher which increases potential of power substation fires, arcing wires, lightning, animals, Direct fire impact on poles/wires/structures, falling debris or vehicles accidents, risk of lines starting fires	Loss of assets or infrastructure, Loss of power to local community (location of effect dependent on location of impact	Includes risk from and to power infrastructure, May take up to a week to restore power to towns
14	Risk of fire crossing border from NSW into high hazard and vulnerability areas potentially impacting people, infrastructure, industry, employment and environmental values on extreme and code red FDR days	Lightning, natural causes, farm machinery/maintenance, camp fires etc	Environmental impact, loss of assets, potential loss of life	Happens rarely but has been known to occur
15	Risk of fire to and from railway corridors where they pass through bush and grass on high and above FDR days	Railway infrastructure, bushfire	Loss of life, assets and infrastructure	Rail corridors pass through a number of built up areas including residential and industrial areas and towns
16	Risk to and from travelers and transport on major highways (Goulburn Valley Highway, Murray Valley Highway) from fire on extreme and code red FDR days	bushfire or ignition from travellers (machinery etc)	Loss of life, assets and infrastructure	A number of major transport corridors pass through the shire
17	Risk of fire impacting upon Indigenous cultural heritage sites including scar trees and burial mounds (during control) on high and above FDR days.	bushfire and other fire sources	Loss of cultural heritage	Restricted information regarding locations of cultural heritage
18	Risk of fire impacting State and Federally listed flora and fauna sites/habitat on high above FDR days	bushfire and other fire sources	Loss of species/habitat	A number of state and federally listed threatened species are found in Moira Shire

Figure 14: Moira Risk Register

ID #	RISK DESCRIPTION (Defined)	CAUSE	IMPACT	COMMENT
19	Risk of mobile service being interrupted due to towers being impacted by bushfire on very high and above FDR days	Indirect impacts eg Loss of power to tower (most likely cause), direct impact to structure (unlikely)	Temporary loss of mobile tel service for a small area	Towers themselves fairly fire resistant, other communications devices still operating
20	Risk of fire influenced vegetation being impacted or changed by fire on an extreme or code red FDR days	lightning, bushfire	the loss of vegetation species diversity and structure leading to a long term change in the vegetation class/structure	EVC include Damp Forest, Montane Dry Woodland and Montane Herb-rich Woodland the majority would be found on public land.
21	Risk of fire sensitive vegetation being impacted or changed by fire on an extreme or code red FDR days	lightning, bushfire	the loss of vegetation species diversity and structure leading to a long term change in the vegetation class/structure	EVC include Montane Riparian Thicket, Montane Riparian Woodland, Montane Wet Forest, Sub-alpine Shrubland, Sub-alpine Woodland and Wet Forest, the majority would be found on public land

5.3 Risk Management Strategy

Having developed a register of risks for Moira Shire, the committee was able to allocate the current treatments of responsible agencies against relevant risk areas and thus develop a Risk Management Strategy. This strategy is a matrix of;

Priority risks x treatment x agency x time frames

And thus creates a snapshot of who is doing what where and why, to reduce the risks posed by fire within the municipality. *It should be noted that these are proposed treatments only for the next 3 years, and that actual implementation in any given year may be influenced by a variety of factors such as availability of resources and seasonal conditions*

The treatments itemised in figure 15 are primarily at program level and in many cases apply equally across the municipality, however some have the ability to have resources and effort *targeted* at specific locations or points of interest to the MFMPC. In addition a number of specific activities were identified, both current and proposed, in response to the identified risks and these are described in figure 16

Figure 15: Moira Risk Management Strategy

Treatment		Treatment description	Spectrum					Responsible agency	Application		Risk
ID #	Name		Prevention	Preparedness	Response	Recovery	Use		Targeted*	Period (Year 1, 2, 3)	ID #
1	Vegetation Management	Advice to landholders & linkages to CFA Brigades to manage vegetation & lower bushfire risk	✓	✓	·	·	·	CFA	Y	All	1-11, 13-18, 20, 21
2	Statutory & Legislative activities	Bushfire Prone Areas & Bushfire Management Overlay, declaration of TFBs, declared danger periods, regulation of burning permits.	✓	✓	·	·	·	CFA	N	All	ALL
3	Brigade Burn Program	Removal of vegetation through burning to protect life & property, includes Township Protection Burning, Planned Burn Program & Fuel Reduction Burns by CFA Brigades.	✓	✓	·	·	·	CFA	Y	All	1-13, 15-21
4	Vulnerable Communities Fire Awareness	Community education & information for vulnerable groups about fire.	✓	✓	·	·	·	CFA	N	All	1-7, 10
5	Awareness	Fire awareness programs targeted at communities via shows/events/displays	·	✓	·	·	·	CFA	N	All	ALL
6	Agricultural Management	Fire management & safety issues for land owners/managers to assist in the preparation of property fire management plans. Includes publication "On the land", "Farm Fire Safety" module (delivered via DPI & TAFE Whole Farm Planning courses on request).	·	✓	·	·	·	CFA	N	All	1-7, 11, 12
7	Fire Ready Victoria	Assists in perception & understanding of bushfire risk so as to modify behaviours and make individuals act more safely. Includes bushfire awareness sessions for communities, community groups, businesses & service providers.	·	✓	·	·	·	CFA	Y	All	1-7, 11, 12
8	Public Information	Fire information through Fire Danger Rating signs, media etc to raise awareness of fire risk. Includes Fire Action Week.	✓	✓	·	·	·	CFA	N	All	ALL
9	Emergency Management Plan (Site)	CFA input into site specific Emergency Management Plans including bushfire component	·	✓	·	·	·	CFA	N	All	10
10	Fire Access Roads, Tracks & Water Points	Coordination of Fire Access Roads Subsidy Scheme (FARSS) to enable Moira Shire to construct and maintain roads, access, bridges & water points.	·	✓	·	·	·	CFA	Y	All	1-9, 11-12
11	Schools Program	Fire Safe Kids, Mobile Education Bushfire Unit.	·	✓	·	·	·	CFA	N	All	See CFA

Figure 15: Moira Risk Management Strategy

Treatment		Treatment description	Spectrum					Responsible agency	Application		Risk
ID #	Name		Prevention	Preparedness	Response	Recovery	Use		Targeted*	Period (Year 1, 2, 3)	ID #
											annual Bushfire Project Plan
12	Standard Operating Procedures	Dictate level of readiness according to the conditions so as to ensure appropriate resourcing & preparedness for optimum response	·	✓	·	·	·	CFA	N	All	ALL
13	Township Protection Plans	Planned response (for both emergency services & the community) to a bushfire within a close proximity to a township, which has the potential to impact on the local community.	·	✓	·	·	·	CFA	Y	All	See CFA annual Bushfire Project Plan
14	Community Fire Guard	A community development program designed to help reduce the loss of lives & homes in bushfires. It assists neighbouring residents to develop bushfire survival strategies that suit their level of risk, lifestyle, environment & values.	·	✓	·	·	·	CFA	Y	All	See CFA annual Bushfire Project Plan
15	Home Bushfire Advice Service	Individual 1:1 fire awareness & education for residents with the highest level of bushfire risk. Advice on property management, planning, personal capacity & potential fire hazards.	·	✓	✓	·	·	CFA	Y	All	1-7, 11, 12
16	Bushfire Planning Workshops	Interactive workshop for residents living in high bushfire risk areas. Participants are guided through the Fire Ready Kit by a trained facilitator to identify their own bushfire risks and the considerations they'll need to make when putting together their bushfire survival plan.	·	✓	✓	·	·	CFA	Y	All	See CFA annual Bushfire Project Plan
17	Resourcing	Strategic network of qualified & equipped staff, volunteers & appliances for mounting timely response to fires on private land.	·	·	✓	·	·	CFA	N	All	ALL
18	Community Debriefs	Post fire debriefings for CFA members, community & stakeholders	·	·	·	✓	·	CFA	N	All	1-7, 12

Figure 15: Moira Risk Management Strategy

Treatment		Treatment description	Spectrum					Responsible agency	Application		Risk
ID #	Name		Prevention	Preparedness	Response	Recovery	Use		Targeted*	Period (Year 1, 2, 3)	ID #
19	Ecological burning	Using fire as a tool for ecosystem management	·	·	·	·	✓	PV	Y	All	1-9, 18, 20, 21
20	Fire research	Targeted research into impacts of different fire/fire regimes on ecological communities/species	·	·	·	·	✓	PV	Y	All	20, 21
21	Patrol/Inspection	Inspections of assets to ensure compliance with regulations and safety requirements and to assess for fire hazards. Includes Campfire Patrols and Parks Victoria Ranger Patrol Program.	✓	✓	·	·	·	PV	Y	All	8, 9
22	Access Roads and Tracks	Establishment of constructed and maintained roads bridges and tracks to allow safe passage for fire fighting vehicles. Includes Walking Track Maintenance.	·	✓	·	·	·	PV	Y	All	1-9, 18, 20, 21
23	Park closures	Closure of parks and facilities at times of very high fire danger	·	✓	·	·	·	PV	N	All	20, 21
24	Routine Site Maintenance	Ongoing mowing/slashing/spraying of sites to reduce fuel loads for protection of assets or adjoining properties. Includes Asset Protection Zone work around high value assets and maintenance of places of last resort within parks	·	✓	·	·	·	PV	Y	All	8, 9
25	Emergency Management Response Plans	Ensure that proper and sufficient works for wildfire prevention and suppression activities on public land in Victoria are conducted in an operationally safe, environmentally sensitive and cost- effective manner. Ensure efficient and appropriate response	·	✓	✓	·	·	PV	Y	All	8,9, 18, 20, 21
26	Rehabilitation activities	Post fire monitoring of ecosystem recovery and implementation of rehabilitation/restoration works to protect waterways, repair/replace damaged assets. Includes post fire archaeological surveys to improve knowledge of historic land use and occupation.	·	·	·	✓	·	PV	N	All	8, 9, 18, 20, 21
27	Technical advice	Provision of specialist technical advice and support to other agencies involved in fire management activities	·	·	✓	·	·	PV	N	All	All

Figure 15: Moira Risk Management Strategy

Treatment		Treatment description	Spectrum					Responsible agency	Application		Risk
ID #	Name		Prevention	Preparedness	Response	Recovery	Use		Targeted*	Period (Year 1, 2, 3)	ID #
28	Fire Management Planning	DSE Fire Management Zones. Strategic landscape scale zoning of public land across the state to achieve fuel Management outcomes	·	✓	·	·	·	DSE	N	All	All
29	Fire Operations Plan	Planning of proposed fire prevention activities to be carried out on public land (includes all land managed by DSE and PV) with the objective of reducing impacts of bushfire on life, community, critical infrastructure, industry and the environment. Includes planned burns, slashing and track works, grazing, and additions to the permanent network of strategic fuel breaks.	·	✓	·	·	·	DSE	Y	All	All
30	Planned burning	Implementation of planned burning and other works as identified in FOP on public land	·	✓	·	·	·	DSE	Y	All	All
31	Crown Land fuel Management	Managing fuel loads on crown land. Includes slashing, mulching and burning.	·	✓	·	·	·	DSE	Y	All	All
32	Water point Maintenance	Maintenance of a strategic network of water points	·	✓	·	·	·	DSE	Y	All	All
33	Fire Access Roads and Tracks	Maintenance of roads, bridges and tracks to specified standards.	·	✓	·	·	·	DSE	Y	All	All
34	Communications	Maintenance of a communications network	·	✓	·	·	·	DSE	N	All	All
35	Detection	Maintenance of a detection network. Includes fire lookout towers and detection flights	·	✓	·	·	·	DSE	N	All	All
36	Incident Control Centres	Maintenance of a strategic network of incident control facilities to support response in emergency management incidents. Includes agreed level 3 ICCs to predetermined standards	·	✓	·	·	·	CFA/DSE	N	All	All
37	Air support facilities	Maintenance of a strategic network of air support facilities. Includes airbases & helipads.	·	✓	·	·	·	DSE	Y	All	All
38	Bushfire readiness	Provision of specified levels of skills and resources to respond to emergencies. Includes people (PFFs), equipment, heavy plant, aircraft, facilities and consumables	·	✓	·	·	·	DSE	N	All	All

Figure 15: Moira Risk Management Strategy

Treatment		Treatment description	Spectrum					Responsible agency	Application		Risk
ID #	Name		Prevention	Preparedness	Response	Recovery	Use		Targeted*	Period (Year 1, 2, 3)	ID #
39	Education	Programs which maintain public awareness of the bushfire threat, promote the importance of self-protection & encourage the responsible use of fire by the community. Includes multimedia messaging, in field patrols and publications.	✓	·	·	·	·	DSE/PV	N	All	All
40	Enforcement	Programs which support legislative compliance. Includes patrols to enforce campfire regulations, forest closures, fire cause investigations and prosecutions.	✓	·	·	·	·	DSE/PV	N	All	All
41	Bushfire response	Respond to bushfires on public land to protect life and minimise impacts on property, communities and the environment. Includes timely provision of public information.	·	·	✓	·	·	DSE	N	All	All
42	Emergency mgmt. support	Provide support to other organisations for emergency management, including expertise and specialist resources.	·	·	✓	·	·	DSE	N	All	All
43	Animal welfare	Management of native animal welfare associated with an emergency incident on public land.	·	·	·	✓	·	DSE	N	All	All
44	Rehabilitation plan	Implement a works program to repair or replace fire affected infrastructure and minimise impacts upon natural values.	·	·	·	✓	·	DSE	N	All	All
45	Information kits	"After the fires: Practical Advice" & "Recovery from emergencies"; information kits containing brochures & fact sheets for people affected by fire/emergency	·	·	·	✓	·	DHS	N	All	1-7
46	Fire risk management system	GIS program identifying location & details of community facilities managed by DHS and allied agencies.	·	✓	·	·	·	DHS	N	All	1-7
47	Vulnerable persons toolkit	Identifies location, contact details & describes needs of vulnerable persons within a municipality	·	✓		·	·	DHS	N	All	1-7, 10
48	Regional Resourcing & activation guidelines	Identifies DHS resource requirements for different emergencies and describes triggers for activation of different levels	·	✓	·	·	·	DHS	N	All	1-7, 10

Figure 15: Moira Risk Management Strategy

Treatment		Treatment description	Spectrum					Responsible agency	Application		Risk
ID #	Name		Prevention	Preparedness	Response	Recovery	Use		Targeted*	Period (Year 1, 2, 3)	ID #
49	Emergency grants	$1064 grant to families whose home is impacted by fire, allocated by municipality.	·	·	·	✓	·	DHS	N	All	1-7, 10
50	Bushfire plan	Individual Bushfire plans for DHS run facilities (as necessary)	·	·	·	✓	·	DHS	N	All	1-7, 10
51	Emergency Relief Handbook	Information & direction for emergency relief arrangements in Vic	·	·	·	✓	·	DHS	N	All	1-7, 10
52	Bushfire hazard identification framework	Identifies the different level of bushfire hazard at a state wide scale and the different responses that planning and building systems will implement	✓	·	·	·	·	DPCD	N	All	1-7, 13
53	Bushfire Management Overlay	Development of a new overlay to replace Wildfire Mgt Overlays, includes opportunity to modify to local conditions through schedules.	✓	·	·	·	·	DPCD	N	All	1-7, 13
54	Bushfire Prone Areas	Interactive online map service that identifies areas likely to be subject to fires and consequent construction standards requirements	✓	·	·	·	·	DPCD	N	All	1-7, 13
55	Relief & recovery services to primary producers	Assess damage to and loss of agricultural crops, livestock and infrastructure of commercial primary producers and rural land managers (including aquaculture), identify & refer personal and technical needs to appropriate businesses (within DPI) or agencies		·	·	✓		DPI	N	All	1-7, 11, 12
56	Animal Welfare Needs	Liaise with animal welfare support agencies and organisations to deliver animal welfare services including assessing injured and affected animals (livestock & companion animals) in emergencies with an emphasis on the needs of commercial primary producers and rural land managers	·	·	✓	·	·	DPI	N	All	1-7, 11, 12
57	Public Awareness	Fire information through notice boards, brochures, signage etc to raise awareness of fire risk.	·	✓	·	·	·	Powercor	N	All	All

Figure 15: Moira Risk Management Strategy

Treatment		Treatment description	Spectrum					Responsible agency	Application		Risk
ID #	Name		Prevention	Preparedness	Response	Recovery	Use		Targeted*	Period (Year 1, 2, 3)	ID #
58	Routine Maintenance of facilities	Ongoing mowing/slashing/spraying of sites to reduce fuel loads to ensure protection of assets, minimise ignition potential and ensure adequate access and egress. Includes routine maintenance of structures (eg gutter cleaning)..	✓	✓	·	·	·	Powercor	N	All	All
59	Routine maintenance of transmission & powerlines	Vegetation management around powerlines and along easement, regular inspections, maintenance of access tracks.	✓	✓	·	·	·	Powercor	N	All	All
60	Technical advice	Provision of specialist technical advice, information & assistance to other agencies involved in emergency response eg temporary power cessation, line inspection in conjunction with field operations.	·	·	✓	·	·	Powercor	N	All	All
61	Supply continuity	Maintain a response capability (scaled to level of risk) so a to minimise length of power disruptions from incidents e.g. fire/storms	·	·	✓	·	·	Powercor	N	All	1-7, 11, 12
62	Restoration	Repair & replace damaged assets post fire so as to restore full services and minimise community impact	·	·	·	✓	·	Powercor	N	All	All
63	Powerlines Hazard Identification	Preparedness around powerlines including risk ratings, inspections, maintenance and response arrangements. Includes Powerlines Bushfire Mitigation Strategy, Powerlines Faults and Emergency Events.	·	·	·	·	·	Powercor	Y	All	All
64	Specialist Support	Provide specialist support to other agencies(e.g. Victoria Police, CFA, DHS, DSE) involved in response to an emergency, eg door knocks, transport, staging area mgt.	·	·	✓	·	·	SES	N	All	1-7, 13
65	Emergency Management Plan (Site)	Established framework for the effective handling of emergencies, includes an Emergency Management Plan for each Schools, childcare centre, preschool (public & private), mandatory training for staff, nominated bus routes, code red closures.	·	✓	·	·	·	DEECD	N	All	1-7, 16

Figure 15: Moira Risk Management Strategy

Treatment		Treatment description	Spectrum					Responsible agency	Application		Risk
ID #	Name		Prevention	Preparedness	Response	Recovery	Use		Targeted*	Period (Year 1, 2, 3)	ID #
66	Routine Maintenance of facilities	Ongoing mowing/slashing/spraying of sites to reduce fuel loads to ensure protection of assets, minimise ignition potential, includes routine maintenance of structures (e.g. gutter cleaning)..	✓	✓	·	·	·	DEECD	N	All	1-7
67	Traffic Diversion Plans	Establishment of an appropriate traffic flow, through traffic management in the community and appropriate access and egress for property and business owners. Includes Traffic Management Strategies Assistance to other agencies.	·	·	✓	·	·	Vic Roads	N	All	16
68	Roadside Vegetation Management	Removal of fuel and vegetation management along roadsides. Includes Strategic Fire Fuse Breaks and routine Roadside Maintenance.	·	✓	·	·	·	Vic Roads	N	All	16
69	Response program	Maintain service continuity and minimise disruptions by responding to faults or damage to facilities, includes deployment of mobile communication units and use of generators during power outages	·	·	✓	✓	·	Telstra	N	All	1-7, 19
70	Routine Maintenance of facilities	Ongoing mowing/slashing/spraying of sites to reduce fuel loads to ensure protection of assets, minimise ignition potential and ensure adequate access and egress. Includes routine maintenance of structures (eg gutter cleaning).	·	✓	·	·	·	Telstra	N	All	1-7, 19
71	Bushfire Mitigation	Removal of identified fire risks to lines & facilities, eg tree lopping	·	✓	·	·	·	Telstra	N	All	1-7, 19
72	Alternative drinking water supply plan	Provision of alternative drinking water supplies to specific towns in the event of loss of normal supply	·	✓	✓	·	·	NEW, GVW	N	All	1-7, 10
73	Emergency response plan	Respond appropriately to the impacts of fire on water supply and waste management	·	·	✓	✓	·	NEW, GVW	N	All	1-7, 10
74	Risk management procedures	Operating procedures varied to reduce risk during high fire danger periods/events (e.g. reduce methane gas levels at waste treatment sites) and strategic spread of facilities and generators to spread risk and ensure continuity of supply	·	✓	·	·	·	NEW, GVW	N	All	1-7, 10

Figure 15: Moira Risk Management Strategy

Treatment		Treatment description	Spectrum					Responsible agency	Application		Risk
ID #	Name		Prevention	Preparedness	Response	Recovery	Use		Targeted*	Period (Year 1, 2, 3)	ID #
75	Routine Maintenance of facilities	Ongoing mowing/slashing/spraying of sites to reduce fuel loads to ensure protection of assets, minimise ignition potential and ensure adequate access and egress. Includes routine maintenance of structures (eg gutter cleaning)..	·	✓	·	·	·	NEW, GVW	N	All	1-7, 10
76	Community Responsiveness	Fire education and training programs targeted at numerous community groups including school children, elderly, employees and businesses. Includes Council Fire Safety Meetings, Fire Walk and Talk and Nursing Home Community Education.	✓	✓	·	·	·	LGA	N	All	1-12
77	Public Awareness	Fire information through notices boards, signage etc to raise awareness of risk	✓	✓	·	·	·	LGA	N	All	ALL
78	Tourism Fire Awareness Program	Community education and information for tourists about wildfire. Includes Tourism and Fire Awareness Program, Campfire Information and Caravan Park Education.	✓	✓	·	·	·	LGA	Y	All	8, 9
79	Powerline Clearance	Vegetation management around powerlines	✓	✓	·	·	·	LGA	N	All	1-7, 13
80	Patrol/ Inspection	Inspections of assets to ensure compliance with regulations and safety requirements and to asses for fire hazards. Includes Private Property Inspections, and Fire Hazard Inspection Program.	✓	✓	·	·	·	LGA	N	All	1-7, 11, 12
81	Fire Plug and Hydrant Installation and Maintenance	Works carried out to ensure that the system will operate correctly when required to do so (This excludes the private water schemes of Hamilton Park, Milewa and Peechelba).	·	✓	·	·	·	LGA	N	All	1-7
82	Roadside vegetation Management	Removal of vegetation along roadsides. Includes Strategic Fire Fuse Breaks.	✓	✓	·	·	·	LGA	Y	All	16
83	Emergency Management Plan (Site)	Established framework for the effective handling of emergencies/disaster.	·	✓	·	·	·	LGA	N	All	1-7, 13
84	Event Management Plan	Emergency management planning of events that occur in the FDP, such as the Cool Summer Music Festival and the Beyond Hotham 4WD Experience.	✓	✓	·	·	·	LGA	N	All	1-9

Figure 15: Moira Risk Management Strategy

Treatment		Treatment description	Spectrum					Responsible agency	Application		Risk
ID #	Name		Prevention	Preparedness	Response	Recovery	Use		Targeted*	Period (Year 1, 2, 3)	ID #
85	Bushfire Management Overlay	Planning referral for new subdivisions, buildings and works that increase population. Applies conditions for access, Water Supply, Buildings/ Works and Vegetation Management.	✓	✓	·	·	·	LGA	Y	All	1-7
86	Operation Firesetter	Increased resources in high risk areas on Severe+ FDI days, increased patrols, increased visibility and covert surveillance so as to reduce the risk of arson and increase capacity in the event of a bushfire occurring.	✓	✓	·	·	·	Vic Pol	Y	All	All
87	MERC	Coordinate municipal emergency response effort in the event of a major bushfire	·	✓	✓	·	·	Vic Pl	N	All	All
88	Evacuations	Coordinate evacuation measures undertaken in response to a bushfire threat	·	·	✓	·	·	Vic Pol	N	All	All
89	Investigations	Investigate suspicious fires to ascertain cause and identify perpetrators	·	·	·	✓	·	Vic Pol	N	All	All
90	Specialist Support	Provide specialist support to other agencies involved in response to a bushfire e.g. vehicle escorts	·	·	✓	·	·	Vic Pol	N	All	All
91	Routine track maintenance	access track maintenance to ensure adequate access and egress to rail reserve	✓	✓	·	·	·	V/line	Y	All	15
92	Routine maintenance of rail reserve	Removal of vegetation through slashing and spraying on and around rail lines to ensure protection of assets and minimise ignition potential within rail reserve.	✓	✓	·	·	·	V/line	Y	All	15

*Resources/activities can be directed towards priority risk areas

5.4 Specific Treatments

In addition to the above Risk Assessment and Risk Management Strategy, the MFMPC came up with a list of specific treatments. This list of treatments (Figure 16 below) highlights the specific activities either currently undertaken or proposed to be undertaken to mitigate fire risk further and give further detail than listed in the Risk Management Strategy. The treatment id number refers to the Risk Management Strategy above and the Risk Id number to the Risk assessment. The specific activity treatment is listed as is the type and status of the activity. Activity custodians refer to all agencies involved in the treatment regime. In terms of a timeline, the year column refers to the three year life cycle of the plan and which year the treatment is applicable.

Figure 16: Moira Specific Treatment Table

New Treatment ID #	Risk Description	Specific Treatment Activity	Activity Type	Treatment Status	P.P.R.R or Use	Activity Custodian	Year 1	Year 2	Year 3	Comment
1	Fires spreading from roadsides and rail reserves	Develop a project to investigate roadside and rail corridor Management Issues - linkages in DSE strategic fire access roads, current fire prevention plan, strategic access/egress roads, CFA critical access roads, Rail corridor management plans	Research	New	Preparedness	MFMPC, DSE, CFA, LGA, Vic Roads, ARTC, Vic Track, V/line	Yes	Yes	Yes	Create project to determine fuel load levels on and adjacent to roadsides. Come up with a slashing and or spraying standard to apply to roads (where appropriate), act within appropriate legislative boundaries

5.5 Fire Management Responsibility

Fire management responsibility within the municipality may be described in three categories.

5.5.1 Response Agencies

Country Fire Authority (CFA): is charged under the CFA Act with the responsibility for Fire Safety Planning and Fire Suppression in all areas of Victoria excepting the area covered by the Metropolitan Fire Brigade and Fire Protected Areas. The CFA is a community based fire and emergency service whose mission is to protect lives and property. CFA responds directly to a range of emergency incidents, as well as conducting broader activities with the community such as education, awareness raising, industry brigades and fire investigation.

- Link to CFA Website: www.cfa.vic.gov.au/

Department of Sustainability and Environment (DSE): is responsible for fire suppression and management on public land (with support from Parks Victoria), including planned burning for ecological and risk management objectives. Their objective is to protect communities and critical infrastructure from fire and to promote healthy and resilient ecosystems.

- Link to DSE FOPs Planning: www.dse.vic.gov.au/fire-and-other-emergencies/fire-plans-and-guidelines

5.5.2 Regulatory and Land Managers

Moira Shire Council: are responsible for the management of all council owned property, as well as ensuring that private land holders appropriately manage their land. Council officers inspect properties within the municipality to assess the potential risk of a bushfire and where necessary may issue a fire prevention notice. They also undertake annual fire prevention works on roadsides and reserves leading up to and during the fire season

- Link to Moira Shire Council Website: www.moira.vic.gov.au

Department of Primary Industry (DPI): The Department of Primary Industries (DPI) is responsible for agriculture recovery programs and animal welfare.

- Link to DPI Website: www.dpi.vic.gov.au/

Parks Victoria: Parks Victoria is responsible for managing the parks and reserves in Victoria and supporting DSE response efforts.

- Link to Parks Victoria Website: http://parkweb.vic.gov.au/

Department of Planning and Community Development (DPCD): The Department of Planning and Community Development (DPCD) is responsible for managing the state's planning system and building stronger communities.

- Link to DPCD Website: www.dpcd.vic.gov.au

Victoria Police (VICPOL): Victoria Police are responsible for ensuring a safe and secure society.

- Link to Victoria Police Website: www.police.vic.gov.au/

Local Reserves Committees of Management: There are a considerable number of reserves throughout the Municipality, which are under the management of local Committees of Management. These Committees are responsible for fire prevention on those reserves. The extent of fire prevention work undertaken on those reserves should be determined after consultation with the local Fire Brigade.

- Information on Committees of Management in Moira Shire can be obtained at the following link: www.moira.vic.gov.au/Community_Health/Committees/Section_86_Committees_of_Management

5.5.3 Support Agencies

Department of Human Services (DHS): is the appointed agency to co-ordinate recovery planning and operations at the State and regional levels. At a municipal level, the responsibility for recovery is with the Local Government Authority with recovery arrangements and plans outlined in the Municipal Emergency Management Plan (MEMP).

- Link to DHS Website: www.dhs.vic.gov.au

State Emergency Services (SES): VICSES is a volunteer based organisation responding to emergencies and working to ensure the safety of communities around Victoria. VICSES is the lead agency when responding to floods, storms and earthquakes and support agency in fire situations.

- Link to SES Website: www.ses.vic.gov.au/

5.5.4 Road and Rail

Vic Roads: manage the Victorian arterial road network and its use as an integral part of the overall transport system.

- Link to Vic Roads Web site: www.vicroads.vic.gov.au/

Vic Track is responsible for the maintenance of the two rail lines and the rail reserve that traverse the Municipality.

- Link to Vic Track Website: www.victrack.com.au/

5.5.5 Water Agencies

Goulburn Valley Water (GVW): Goulburn Valley Water is responsible for all reticulated urban water supply and sewage disposal within the Municipality. Goulburn Valley Water has a critical role to play to ensure that water supplies are maintained in the event of a major fire incident within the area of the reticulated water supply system.

- Link to GVW Website: www.gvwater.vic.gov.au/

Goulburn Murray Water (GMW): is responsible for the operation of irrigation distribution channels, dams, lakes, and stock and domestic water diversion from streams. Goulburn Murray Water is responsible for the management of its assets, and the undertaking of fire prevention and fuel reduction works as part of their asset management.

- Link to GMW Website: www.g-mwater.com.au/

Goulburn –Broken Catchment Management Authority (GBCMA): The Goulburn Broken Catchment Management Authority is responsible for service delivery for waterways (rivers and streams) and floodplain management.

Although the Goulburn – Broken Catchment Authority is not the manager of the land, the spreading of fires is a consideration when undertaking new vegetation plantations.

- Link to GBCMA Website: www.gbcma.vic.gov.au/

5.5.6 Power, Gas and Communication Agencies

Powercor: is generally responsible for the distribution of electricity within the Municipality (66 kV lines and less). The majority of the distribution network is via overhead power lines. As evidenced in the Ash Wednesday fires it is critical that appropriate measures are taken to prevent fires originating from powerlines. This requires all vegetation to be kept clear of exposed power lines. Both the Municipality and Powercor (and Eastern Energy where appropriate) undertake this clearance work.

- Link to Powercor website: www.powercor.com.au/

SP AusNet: is responsible for the distribution of high voltage electricity within the Municipality (220 kV and above). No trees are permitted on AusNet Easements. AusNet or its Contractors undertakes all clearance work.

- Link to SP AusNet Web Site: www.sp-ausnet.com.au/

Origin Energy : is responsible for the distribution of reticulated gas (515 kPa and less) throughout the Municipality. Ruptured gas mains can provide a severe fire risk although such occurrences are rare. The other major risk being that of escaping gas, where a service or main has been damaged or ruptured during the course of a fire.

- Link to Origin Energy Website: www.originenergy.com.au/

GPU GasNet: *is responsible for the high-pressure transmission gas mains that traverse the Municipality. GPU GasNet ensures that a strip of land 20 m wide is mown around all valve enclosures*.

Telstra: Telstra provide communication services and are responsible for telephone exchanges, mobile telephone towers, cabling and radio communication towers

- Link to Telstra Website: www.telstra.com.au/

5.5.7 Community

Land managers, the community and individuals all have a responsibility to maintain their properties and to conduct their activities in a responsible manner with respect to fire management. The effectiveness of the Risk Management Strategy relies heavily upon the community understanding and accepting their responsibilities and acting accordingly.

While specific treatments cannot be attributed to private individuals and organisations within the Risk Management Strategy the MFMPC does have an expectation that members of the community will where appropriate;

- Prepare and plan for fires, both bushfire and structural
- Prepare their properties for fire events
- Ensure adequate access and water for fire fighting appliances
- Maintain an awareness of fire danger levels and listen for alerts and warnings.

Advice, training and support to groups, businesses and individuals concerning all of these expectations can be obtained from the CFA (see link below).

- Link to CFA Fire Safety: www.cfa.vic.gov.au/firesafety

5.5.8 Community

Land managers, the community and individuals all have a responsibility to maintain their properties and to conduct their activities in a responsible manner with respect to fire management. The effectiveness of the

Risk Management Strategy relies heavily upon the community understanding and accepting their responsibilities and acting accordingly.

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- Maintain an awareness of fire danger levels and listen for alerts and warnings.

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- Link to CFA Fire Safety: www.cfa.vic.gov.au/firesafety

5.6 Balancing Fire Risk Against Other Values

In the course of developing the Risk Register it became apparent to the MFMPC that some of the concerns being raised lay less with the impact of the actual fire and more with that of the treatments being applied. A number of the fire risk treatments adopted in Risk Management Plan pose a potential threat to some of the very values the MFMPC is seeking to safeguard. It is important that these threats are noted and that a balance be struck between protecting the community from fire and maintaining the economic, social, and environmental wellbeing of the municipality.

A number of processes and treatments are already in place to ensure that all values are taken into consideration and protected during the planning and implementation of fire risk treatments. Where conflict does occur the MFMP offers a dispute resolution process for member agencies by establishing a pathway for issues to be escalated and resolved at either a regional or state level by the responsible authorities.

5.7 Cross-Boundary Management and Links to Other Programs/Processes

In developing this plan, the Moira MFMPC has endeavoured to ensure that concerns which cross municipal, regional or state boundaries are treated in a seamless manner with regard to risk assessment and treatments. This has been achieved through;

- Consistent use of processes and tools across the region.
- Deliberate alignment of municipal and regional objectives.
- Frequent cross membership of MFMPC's by agencies.
- Making draft and final MFMP's available to other MFMPC's.

6 Improvement and Plan Reporting and Review Process

Monitoring and improvement forms the final stage in the IFMP process during the development of the initial MFMP. However from this point on monitoring and improvement should be viewed as an ongoing activity as it actually entails continuous action, undertaken throughout the plans three year life..

It is important to track the performance of the plan and the degree to which it contributes to achieving the desired outcomes once implementation of the Fire Management Plan has commenced. Monitoring, evaluation and reporting occur throughout the life of the plan, the aim being to identify those treatments working effectively and those that may need to be modified. It also seeks to provide a transparent and accurate means of assessing the MFMP's progress in achieving its objective. The table below summarises

the proposed implementation, reporting and review activities, as well who is responsible for undertaking them.

Figure 17: Moira MFMP Reporting and Evaluation Program (sourced Swan Hill MFMP**)**

Frequency	Task / Action	Responsible Party
Ongoing	Implement treatments, as per agreed Work Plan	All treatment owners
	Further explore identified opportunities for new or enhanced treatments with relevant stakeholders, and agree course of action	MFMPC
Biannually (every 6 months)	Report to MFMPC on the progress of treatment implementation, including an evaluation of treatment appropriateness, impact, effectiveness, efficiency, and legacy	All treatment owners
	Update Risk Register & Work Plan to reflect treatment status, as reported by treatment owner	MFMPC
Annually (every 12 months)	Conduct strategic review of risks and associated treatment program, asking: • Are the identified risks still valid? • Do their pre-treatment and residual risk ratings still hold true? • Are there new risks that need to be added to the register and managed? • Do the treatments currently in place adequately address the identified risks? • Are there any new or enhanced treatments required?	MFMPC
	Review and update Plan content and mapping to ensure validity	MFMPC
	Provide overarching progress report to Municipal Emergency Management Planning Committee, focusing on the collective effectiveness of treatments in the management of risks and progress towards the achievement of objectives	MFMPC
Triennially (every 3 years)	Conduct end-to-end review of Plan, with particular focus on the environmental scan and objectives	MFMPC

The integrated fire management planning process operates within a complex and challenging environment, with often limited and competing resources to achieve the desired outcome of acceptable levels of residual risk to the community. Therefore, fundamental to its success is the establishment and preservation of healthy stakeholder partnerships that allow for continued transparent and robust dialogue in the interest of achieving the Plan's objectives in the long-term. It is the role of the MFMPC to spearhead relationship management for this purpose.

7 Attachments

Attachment 1: Risk Assessment Tables

Risk categories table

Risk Group	Risk Category	Risk Element
SOCIAL	People & Social Setting	*Life & injury:* Public Safety *Social services*: Functional continuity *Health & wellbeing:* Social networks *Displacement of people:* Employment/income
	Infrastructure	*Residential:* House, flat, caravan, apartments *Public accommodation* Boarding house, hotel, hostel, correctional facilities *Public assembly:* Education, hall, theatre, stadium, cafe, restaurant *Health care:* Special accommodation homes, nursing homes and hospitals
	Cultural, Heritage	*Heritage sites and buildings* *Indigenous sites* *Iconic sites and features*: e.g. Puffing Billy
ECONOMIC	Infrastructure	*Commercial:* Shopping complex, office *Industrial:* Factory (heavy, light, special), warehouse, silo, chemical, petrol *Essential Infrastructure:* Pipelines, Power, public transport systems, Water Catchments, Power Water & Sewerage, Gas, Communications *Transport:* Road, rail, bridge, tunnel, port, marine, airport
	Production	*Agriculture and Farming:* Plantation, crop, pasture, poultry, feedlot, sawmill *Business/Industrial* *Capacity* *Tourism*
ENVIRONMENT	Biodiversity	*Assets that provide biological based ecosystem functions and/or services considered of value.*
	Water	*Assets that provide of atmospheric/climatic ecosystem functions and/or services considered of value*
	Air	*Assets that provide water-based ecosystems functions and/or services considered of value.*
PLANNING	Governance & Regulation	*Corporate Governance Issues, including organisation structures; Boundary issues, Inter-Agency Agreements; Environmental scans; Population projections; urban development projections/planning; Volume projections; Long term/short term solutions; Infrastructure requirements to meet projected community needs*
	Planning & Communication	*Internal, external, multi-municipal, communications strategies*
	Stakeholder Management	*Community Expectations; Government expectations;* *Business and Industry Issues, including risks associated with developing and implementing programs to minimise the impact of fire on business and industry;*
	Operational	*Encompasses the planning, daily operational activities, resources (including people) and support required within the 'area of interest', that results in the successful development and delivery of products/ services.*
	Financial	*Ability to allocate limited financial resources to maximum effect; Ability to fund adequate resources to meet community needs; Skills & technical expertise; Management skills; Equipment maintenance, upgrades, and replacement funding; Geographical remoteness location needs; Government's ability to fund requirements to meet population growth needs*

State Bushfire Consequence Table

STATE DESCRIPTOR BUSHFIRE	People - Bushfire	Infrastructure - Bushfire	Public Admin - Bushfire	Environment - Bushfire	Economy - Bushfire	Social Setting
Catastrophic	50+ lives lost. Hundreds injured 1000+ houses destroyed. 2000+ people displaced. 30,000 + livestock lost.	Loss of critical infrastructure and/or services for 24-48 hours to the Melbourne metropolitan area. Loss of services to a major regional city/several suburbs for more than a week.	Significant statewide outrage. Royal Commission or other similar inquiry leading to changes in policy and practice.	Permanent total loss of one or more ecosystems or critical habitat elements. Loss of nationally significant cultural assets.	$1B or 30% of State revenue	Severe disruption to community wellbeing over the whole area or a large part of it for a period of many years
Major	10 -50 fatalities as a direct result of the bushfire event. 300 - 1000 houses destroyed. 500 -2000 people displaced. 10,000 - 30,000 livestock lost. Significant loss of breeding stock.	Loss of critical infrastructure and/or services for up to 8-24 hours to the Melbourne metropolitan area. Loss of services to a major regional city/several suburbs for 4 days and up to a week.	Significant regional and local outrage, with some occurring at state level. Parliamentary or other inquiry leading to change in practice.	Permanent partial loss of one or more ecosystems or critical habitat elements. Extinction of a species or significantly increase the likelihood of extinction to almost certain that intervention such as captive breeding programs are required. Loss of state significant cultural assets.	Damage costs including legal actions and/or industry impacts (tourism, forestry, wine and grape etc) to the value of more than $300M.	Severe disruption to community wellbeing over a wide area or for more than 24 months.
Serious	2 - 10 fatalities as a direct result of the bushfire event. Large number of people affected by smoke. 30 - 300 houses lost. 200- 500 people displaced 4000 - 10000 livestock lost.	Loss of critical infrastructure and/or services for up to 2-8 hours to the Melbourne metropolitan area. Loss of services to a major regional city/several suburbs for 2-4 days.	Some outrage at local and regional level.	Long term disturbance to one or more ecosystems or critical habitat elements. National response and/or support for animal welfare. Loss of a regionally significant cultural asset such as Phillip Island penguins, Healesville Sanctuary, Puffing Billy.	Damage costs including legal actions and/or industry impacts (tourism, business etc) to the value of more than $100M.	Major disruption to community wellbeing over a moderate to large area* or for a period of months.
Significant	Single fatality and/or multiple serious injuries requiring hospitalisation as a direct result of the bushfire event. Up to 30 houses lost. 50 - 200 people displaced. 2000 - 4000 livestock lost.	Loss of critical infrastructure and/or services for up to 1 hour to the Melbourne metropolitan area. Loss of services to a major regional city for 1 day. Loss of services to local community for a week.	Local outrage and concern.	Temporary disturbance to one or more ecosystems or critical habitat elements. Local response and/or support for animal welfare.	Damage costs including legal actions and/or industry impacts (tourism, business etc) to the value of more than $30M.	Localised disruption to community wellbeing over a small area or for a period of weeks.
Important	Serious injury and disability, up to 50 people displaced, up to 2000 livestock lost	Loss of services to regional town for a day. Loss of services to local community of up to a week	Local concern	Temporary disturbance to local habitat . Local response and/or support for animal welfare.	Damage costs including legal actions and/or industry impacts (tourism, business etc) to the value of less than $30M.	Localised disruption to community wellbeing over a small area or for a period of up to one week.

Likelihood Table

Level	Descriptor	Description In any one year, the likelihood of the event occurring is:
A	Almost Certain (Annually)	Close to 100% - Annually.
B	Likely	33% (i.e., once in every three years)
C	Possible	10% (i.e., once every 10 years)
D	Unlikely	3% (once every 30 years)
E	Rare	1% (once every 100 years)

Risk Assessment Matrix

Consequence Level					
Likelihood Level	Important	Significant	Serious	Major	Catastrophic
Almost Certain	Moderate	Moderate	High	Extreme	Extreme
Likely	Low	Moderate	High	High	Extreme
Possible	Low	Low	Moderate	High	High
Unlikely	Low	Low	Moderate	Moderate	High
Rare	Low	Low	Low	Moderate	Moderate

Attachment 2: Stakeholder Analysis & Community Engagement Plan

Stakeholder Type and Engagement Level		
Stakeholder Type	**Description**	**Participation Level***
Internal	Formal responsibilities for IFMP process and outcomes	Collaborate and empower
Primary	MFMPC membership, responsibility for development of the plan, communication and engagement across and within organisations rest with these organisations	Collaborate and empower
Secondary	RSFMPC membership or fire management role within municipality, may be requested to provide specific inputs, dependant upon outputs, or requested to be involved in specific tasks,	Involve and consult
Tertiary	Strong interest in outcomes	Inform and consult

*IAP2 Public Participation Spectrum: *empower → collaborate → involve → consult → inform*

Fire Management Roles	
Role	**Description**
Fire Coordination	Bringing together of fire management agencies and elements to ensure effective response to an incident or emergency. CFA has legislated responsibility under the CFA act 1958 for the prevention and suppression of fires and for the protection of life and property in the Country Area of Victoria. In accordance with provisions in the CFA Act and the Forest Act 1958, DSE has fire management and fire suppression responsibilities for state forests and national, state and regional parks.
Land Owner/Manager Responsibilities	Landholder/managers are heavily involved in fire prevention and fire suppression on land under their control. They have legislated responsibilities to extinguish a fire burning on their land and to prevent fires from starting from the use of equipment and vehicles (CFA Act 1958, Crimes Act 1958). They are also required to comply with relevant State government laws, local government laws, relevant planning and building permit conditions and conditions associated with permits to burn.
Response	Actions taken in anticipation of, during and immediately after a fire incident to minimise the impact of the fire.
Recovery	A coordinated process of supporting emergency affected communities in the reconstruction of physical infrastructure and restoration of emotional, social, economic and physical well being.
Community Education	Community education is learning and social development, working with individuals and groups in their communities using a range of formal and informal methods
Community Care	Community care is about identifying and catering for groups or individuals with specific needs, before during and after fire.
Asset Protection	Asset protection involves protecting key community infrastructure such as power, water supplies, roads, gas pipes and protecting community assets such as parks and the environment. Asset protection can also involve the protection of private assets such as housing, plantations, crops and fences.
Regulatory	The issuing of permits for lighting fires. The development of and compliance with planning controls and permits for developments

	and building that take into account fire risk/management. The regulation and issuing of permits involving vegetation removal or fuel reduction activities for fire management purposes.

Moira MFMPC Stakeholder Analysis														
Stakeholder	Type				Fire management role within Hume region									
	Internal	Primary	Secondary	Tertiary	Fire coord	Land mgr	Response	Recovery	Comm info	Comm care	Asset protect	Regulate	RSFMPC member	Other
Hume RSFMPC	✓						✓	✓	✓				✓	Regional IFMP oversight & strategic fire planning
MEMPC	✓						✓	✓	✓					Municipal integrated & strategic emergency planning
MFMPC	✓						✓	✓	✓					Municipal integrated & strategic fire planning
Moira Shire Council		✓				✓	✓	✓	✓	✓	✓	✓		
CFA		✓			✓		✓	✓	✓		✓	✓	✓	Fire safety expertise
DSE		✓			✓	✓	✓	✓	✓		✓	✓	✓	Forest fire expertise
Parks Victoria		✓				✓	✓	✓	✓		✓		✓	Forest fire expertise
Landcare Groups			✓			✓								
DHS			✓				✓	✓		✓			✓	
DPCD			✓					✓				✓	✓	Oversight of rural adjustment & development programs, development of planning controls
DPI				✓				✓					✓	Animal health, agricultural loss & recovery responsibilities

Moira MFMPC Stakeholder Analysis														
Stakeholder	Type				Fire management role within Hume region									
	Internal	Primary	Secondary	Tertiary	Fire coord	Land mgr	Response	Recovery	Comm info	Comm care	Asset protect	Regulate	RSFMPC member	Other
Vic Pol			✓				✓						✓	
SES			✓				✓						✓	
Vic Roads			✓			✓	✓				✓	✓	✓	
SP Ausnet			✓							✓			✓	
AGL Hydro			✓							✓				
Rail Industry			✓			✓					✓		✓	
GPU Gasnet			✓			✓					✓			
North East Water			✓							✓	✓			
Goulburn Valley Water, North East Water			✓							✓	✓		✓	
Goulburn Murray Water			✓			✓					✓			
Tele-comms industry			✓							✓	✓		✓	
VFF				✓		✓								
AGL Hydro				✓		✓								
GBCMA				✓		✓		✓			✓	✓		
DEECD				✓						✓				
Private Schools				✓						✓				

Moira MFMPC Stakeholder Analysis															
Stakeholder	**Type**				**Fire management role within Hume region**										
	Internal	Primary	Secondary	Tertiary	Fire coord	Land mgr	Response	Recovery	Comm info	Comm care	Asset protect	Regulate	RSFMPC member	Other	
School Camps				✓						✓					
Ambulance Vic				✓						✓					
Media				✓			✓		✓						
Local community/ industry groups				✓											
General public				✓		✓	✓	✓			✓			Responsibility for private property, social networks & personal well being.	

Moira MFMPC Communication & Engagement Plan											
Stakeholder	**Engagement Level**	**Engagement activity**									
		Meeting minutes, reports & agendas	1:1 consultation	IFMP & Moira Shire web site	Email updates	Media articles	Special meetings	Draft consultation	3 year review	Individual org networks	
Internal Stakeholders											
Hume RSFMPC	Collaborate & empower	✓		✓	✓	✓	✓	✓	✓		
MEMPC											
MFMPC											
Primary – answerable for activity/decision											
Municipal Council/Alpine Resort	Collaborate &	✓	✓	✓	✓	✓	✓	✓	✓	✓	

Moira MFMPC Communication & Engagement Plan										
Stakeholder	**Engagement Level**	**Engagement activity**								
		Meeting minutes, reports & agendas	1:1 consultation	IFMP & Moira Shire web site	Email updates	Media articles	Special meetings	Draft consultation	3 year review	Individual org networks
Board	empower									
CFA										
DSE										
Parks Victoria										
Secondary – Contributory responsibility										
DHS	Involve & consult		✓	✓		✓	✓	✓	✓	✓
DPCD										
Vic Pol										
SES										
Vic Roads										
SP Ausnet , Power Corp and Origin Energy										
AGL Hydro										
GPU Gasnet										
Rail Industry (Victrack, V/Line, ARTC)										
Goulburn Valley Water/North East Water										
Goulbourn Murray Water										
Tele-Communications Industry										
Landcare Groups										
Tertiary - Interested										
VFF	Inform & consult			✓		✓		✓	✓	
GBCMA										

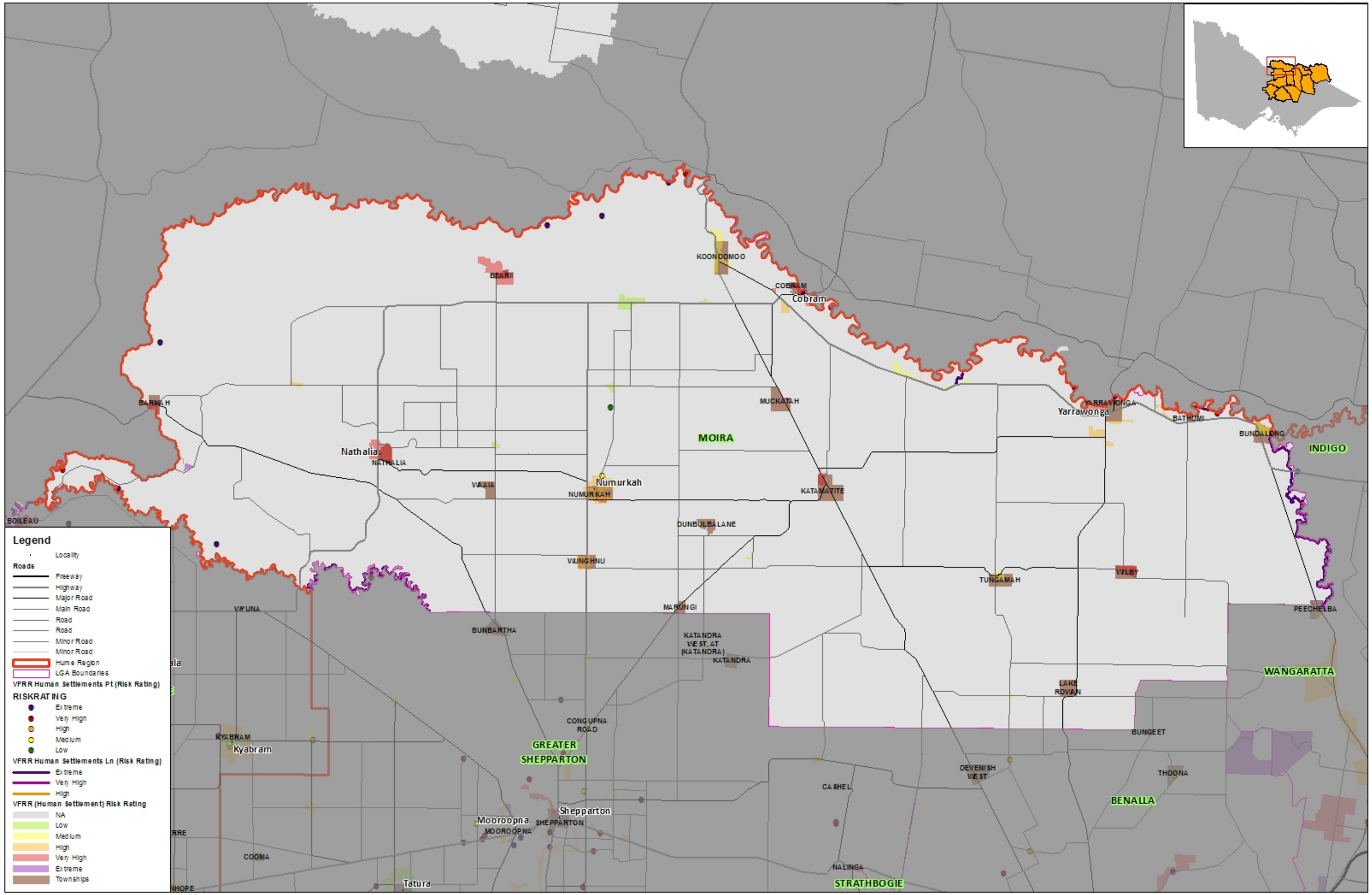
Moira MFMPC Communication & Engagement Plan										
Stakeholder	**Engagement Level**	**Engagement activity**								
		Meeting minutes, reports & agendas	1:1 consultation	IFMP & Moira Shire web site	Email updates	Media articles	Special meetings	Draft consultation	3 year review	Individual org networks
DEECD										
DPI										
Private Schools										
School Camps										
Ambulance Vic										
Media										
Local Community/Industry Groups										
General Public										

Attachment 3: Environmental Scan Maps & Data

IFMP Municipal Fire Management Planning Fire Hazard, Exposure & Vulnerability Analysis pilot

VFRR - Human Settlements - Moira (S)

Date: 2/05/2012



0 3.75 7.5 15 Kilometers

N

Scale: 1:330,000

GDA 1994 VICGRID94

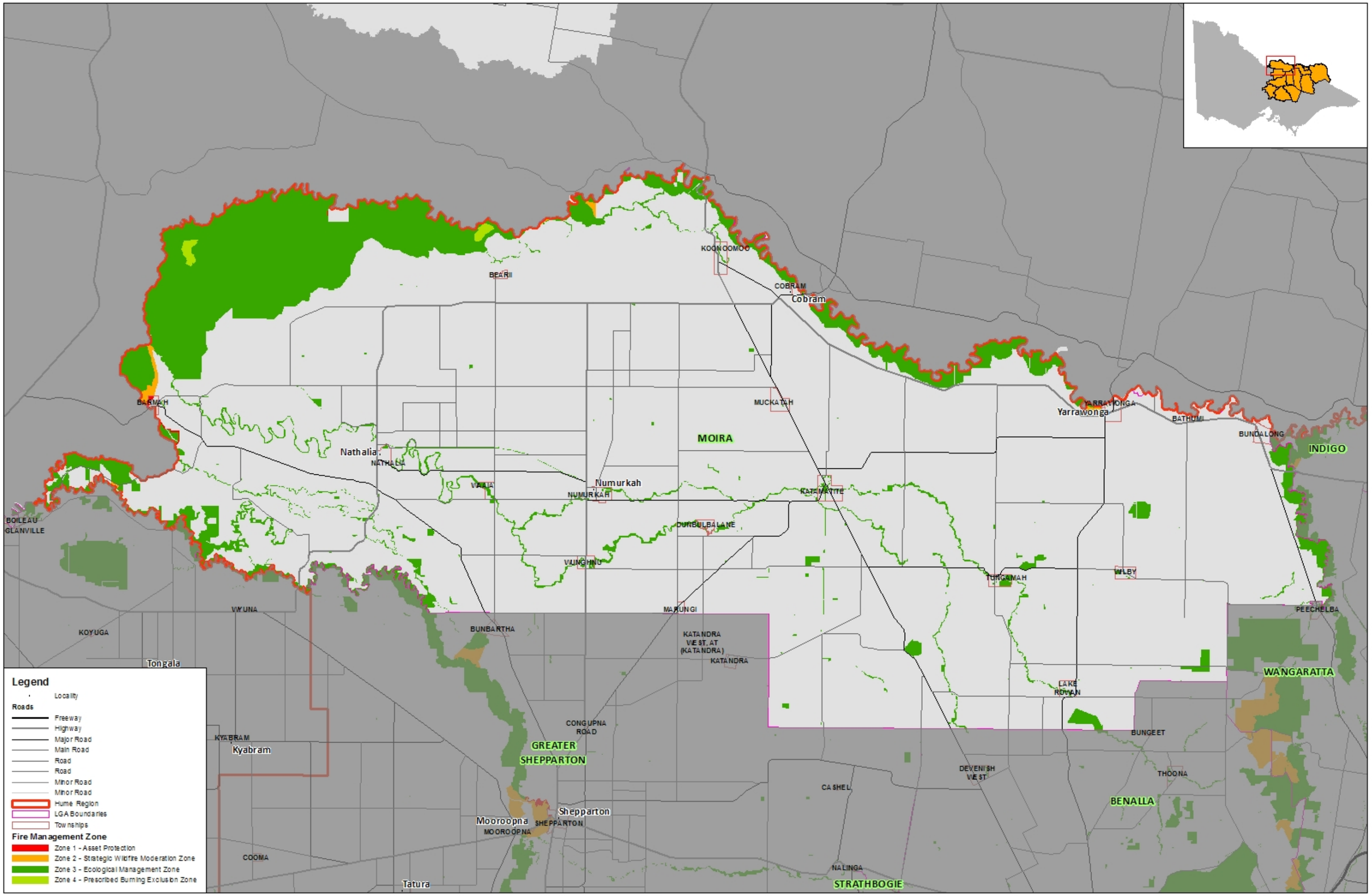
(Refer to documentation for further information)

Victoria Department of Sustainability and Environment

IFMP Municipal Fire Management Planning Fire Hazard, Exposure & Vulnerability Analysis pilot

DSE Fire Management Zones - Moira (S)

Date: 3/05/2012



0 3.75 7.5 15 Kilometers

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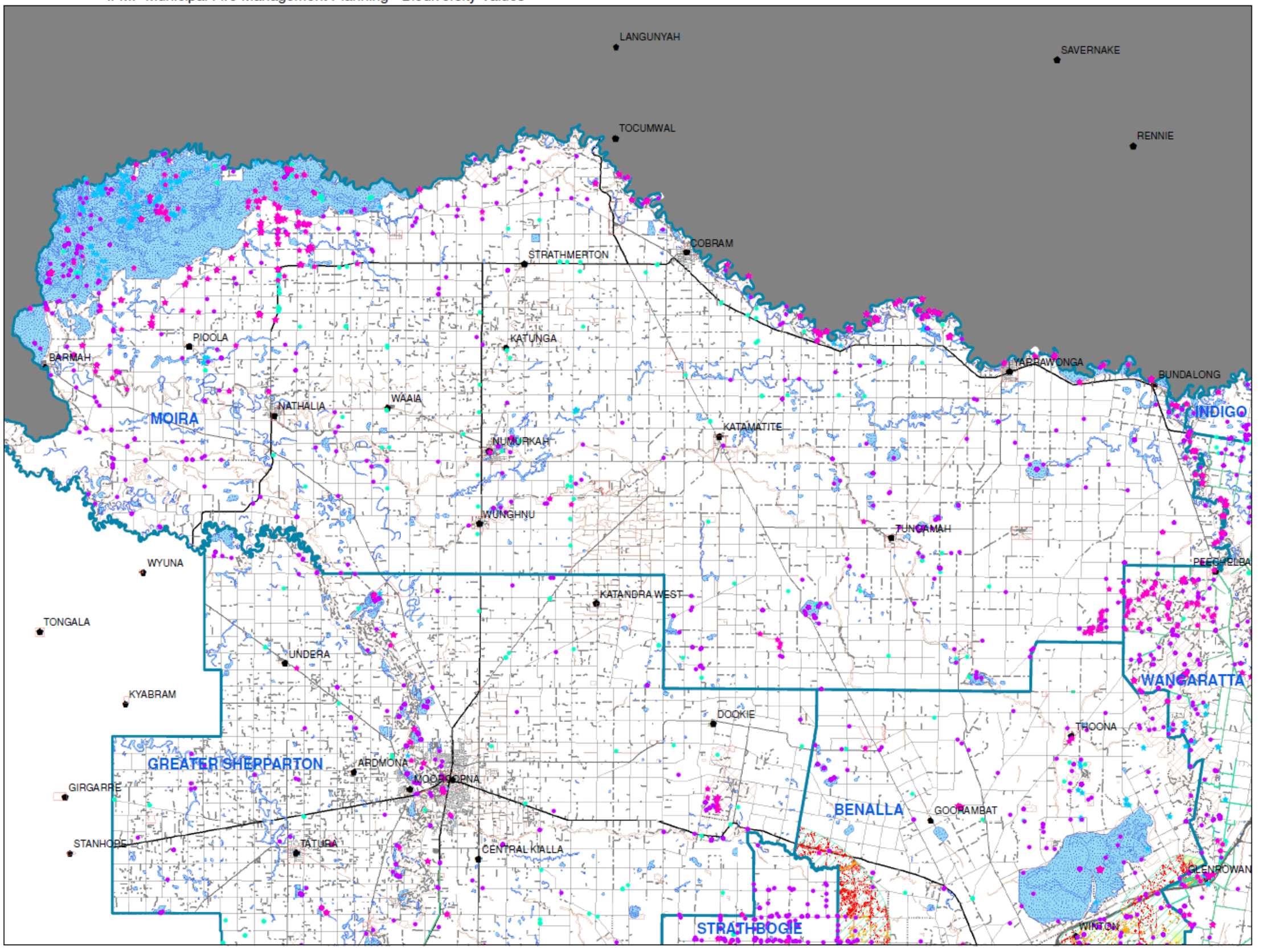
Scale: 1:330,000

GDA 1994 VICGRID94

(Refer to documentation for further information)

Victoria Department of Sustainability and Environment

IFMP Municipal Fire Management Planning - Biodiversity Values



Legend

- EPBC Act listed Fauna
- FFG Act listed Fauna
- EPBC Act listed Flora
- FFG Act listed Flora
- Vegetation Protection Overlay
- Endangered
- Vulnerable
- Depleted
- Least Concern

Fire Sensitive vegetation

EVC NAME

- Montane Riparian Thicket
- Montane Riparian Woodland
- Montane Wet Forest
- Sub-alpine Shrubland
- Sub-alpine Woodland
- Wet Forest
- Wetlands
- Township Polygon
- Locality
- Local Govt Areas
- Freeway
- Highway
- Main
- Local
- 2WD
- 4WD
- Public Land

Please note the displayed data comes from DSE GIS Corporate Data Library, gaps will appear where there has been no past survey work, however this means due diligence should be undertaken by the proponent or land manager.

These layers have not been analysed and are shown to flag locations where the presence of environmental values need to be factored into any discussions regarding possible fire management treatments.

Data Source : DSE GIS CSDL 2011
(Refer to documentation for further information)

GDA_1994_VICGRID94

N

Date: 8/06/2012

Scale: 1:339,978

State Government Victoria

0 5 10 20 Kilometers

Attachment 4: HAZARD TREES – IDENTICATION & NOTIFICATION PROCEDURES

The Electricity Safety Act 1998 (Vic) (**ES Act**) provides that a municipal council must specify, within its Municipal Fire Prevention Plan (MFPP):

(a) Procedures and criteria for the identification of trees that are likely to fall onto, or come into contact with, an electric line (**hazard trees**); and

Procedures for the notification of responsible persons of trees that are hazard trees in relation to electric lines for which they are responsible.

Under the ES Act, the person responsible for maintaining vegetation and clearance space around power lines is referred to as the 'responsible person'.

The procedures outlined in this section of the MFPP seek to address the requirement detailed above.

Each responsible person should have its own internal procedure regarding the steps that will be taken when it receives notification of a potentially hazardous tree.

What is a hazard tree?

According to the ES Act, a hazard tree is a tree which 'is likely to fall onto, or come into contact with, an electric line'.

The Electricity Safety (Electric Line Clearance) Regulations 2010 (**the Regulations**) further provide that a responsible person may cut or remove such a tree 'provided that the tree has been assessed by a suitably qualified arborist; and that assessment confirms the likelihood of contact with an electric line having regard to foreseeable local conditions.'

Due to legal requirements which require a clearance space be maintained around an electric line, hazard trees are usually located outside the regulated clearance space. Despite being outside the clearance space, the tree may still have the potential to contact the line due to its size or because of a structural fault or weakness which renders part, or all, of the tree likely to contact or fall onto the line.

Who is responsible for a hazard tree?

Under the ES Act, the person responsible for maintaining vegetation and clearance space around power lines is referred to as the 'responsible person'. This includes responsibility for keeping the whole or any part of a tree clear of the line.

Under the ES Act, responsibility is allocated between distribution businesses and other owners of electricity infrastructure, land owners and occupiers, public land managers such as municipal councils and VicRoads.

Municipal councils are responsible for trees on public land within their municipalities, for which they are the land manager, where these are also within a Declared Area for the purposes of the ES Act. Primary responsibility for vegetation clearance and management within the municipality, for areas which are not within a Declared Area, will usually fall to the relevant electricity distribution company.

Responsible Persons within Moira Shire Council

There are a number of organisations that have responsibility for line clearance in Moira Shire Council, including:

- Citipower and Powercor
- Vemco
- VicRoads
- Moira Shire Council

Other relevant information

Responsible persons, other than private persons, must have an electric line clearance management plan in place for areas for which they have responsibility *(refer Electricity Safety (Electric Line Clearance) Regulations 2010).*

Moira Shire Council is responsible for line clearance within their Declared Area, which is within the town boundaries of the following four towns located in the Moira Shire:

- Cobram
- Numurkah
- Yarrawonga
- Strathmerton

The remainder of the areas within Moira Shire are maintained by PowerCor Contractors.

PROCEDURES AND CRITERIA FOR IDENTIFYING HAZARD TREES

In the course of everyday duties, potentially hazardous trees may come to the attention of staff or volunteer members of the entities with representation on the Municipal Fire Prevention Committee (**the Committee**), staff of the distribution business (es) or other persons, including members of the public.

There are a range of factors which may indicate that a tree is a hazard tree. That is, a tree which is likely to fall onto, or come into contact with, an electric line. Some of these factors will be obvious when looking at the tree but many may only be apparent when the tree is assessed by a person with specific expertise and training, such as an arborist.

The following criteria may be used to assist in identifying a hazard tree:

- The size of the tree suggests that it is likely to come into contact with the electric line, for example because it appears to be encroaching or growing into the line clearance space.
- There is an excessive lean on the tree, or branches hanging off the tree and the tree is in proximity to an electric (power) line.
- The size or appearance of the tree suggests it could come into contact with the line including under foreseeable local conditions.

If a potentially hazardous tree is identified, the notification procedure outlined below should be followed. Where a responsible person becomes aware of a potentially hazardous tree for which

they have responsibility, they must follow their own applicable internal procedure and the notification procedure described below does not apply.

PROCEDURES AND CRITERIA FOR NOTIFYING HAZARD TREES

To ensure that information regarding potentially hazardous trees is captured in an efficient manner and, as appropriate, referred to the responsible person for action, the following procedure for the notification of hazardous trees should be followed:

- The person with responsibility for the highest percentage of lines within the municipality (**the primary responsible person, PRP***)* is the person to whom potentially hazardous trees should be reported.
- The primary responsible person (or their representative) is referred to in these Procedures as the primary responsible person representative (**PRPR**).
- Where any person becomes aware of, or receives a report of, a potentially hazardous tree within the municipality, this should be referred to the PRPR. Where the Committee becomes aware of, or receives a report of, a potentially hazardous tree within the municipality, this must be referred to the PRPR.
- Reports of potentially hazardous trees must be provided to the PRPR for action as soon as practicable. Reports must include, at a minimum:
    - The name and contact details and any relevant qualifications where known of the person making the report.
    - As much detail as possible about the location of the tree including, where known, GPS coordinates, details of numerical/name plate on nearest pole, name of nearest road or crossroads, closest landmark, whether tree is on private land or road reserve, etc.
    - A description of the tree including, if known, the genus and species of tree.
    - The primary reasons given for the tree being identified as potentially hazardous e.g. tree is in proximity to an electric line and there is evidence of structural weakness, tree is on an excessive lean and/or appears to be encroaching into line clearance space, etc.
    - An indication of whether or not urgent action is required.
- The PRPR must take all necessary steps to advise the person responsible for the tree that it may be hazardous.

PRIMARY RESPONSIBLE PERSON (PRP) AND PRIMARY RESPONSIBLE PERSON REPRESENTATIVE (PRPR)

For the purposes of this part of the Plan, details of the PRP and the PRPR are listed below including their ccontact details:

Agency name	Moira Shire Council
Primary Responsible Person	Municipal Tree Specialist – Allan Thomson
Primary Responsible Person Representative	Operations Business Support Officer
Name of contact person	Operations Business Support Officer – Adele Leathem
Telephone Number	03 5871 9222
Email address	webmaster@moira.vic.gov.au
Facsimile Number	03 5872 1567

PROCEDURES FOR NOTIFICATION OF RESPONSIBLE PERSONS

Where a potentially hazardous tree has been reported to the PRPR, the PRPR should follow the procedure outlined below.

Step 1	Report provided to PRPR.	
Step 2	PRPR to determine who the responsible person is in relation to the reported tree. If necessary, the PRPR can seek assistance from ESV for this step.	
Step 3	Is the responsible person the primary responsible person?	**Yes =>** applicable internal procedure for referral and assessment of potentially hazardous tree to be followed.
		No => proceed to Step 4.
Step 4	Did the report indicate that urgent action is required?	**Yes =>** the responsible person should be notified as soon as possible and by the close of the next business day.
		No => the PRPR must advise the responsible person of the existence and location of a potentially hazardous tree in accordance with the timelines below.*

* The PRPR should put in place mutually agreed arrangements for the manner in which it passes on reports of potentially hazardous trees to responsible persons.

Reporting Timelines

The PRPR should provide reports to the relevant responsible person as soon as practicable.

In circumstances where:

the potentially hazardous tree is located within a high bushfire risk area (as per s.80 of the ES Act) and the potentially hazardous tree is reported during the fire danger period declared under the Country Fire Authority Act 1958 (Vic); or

the report indicates that there is an imminent danger that the tree will contact or fall onto lines as a result of minor environmental changes;

the potentially hazardous tree must be referred to the relevant responsible person for action as soon as possible, and by the close of the next business day.

Each responsible person (other than the primary responsible person) must provide the PRPR with contact details of the person (position title) to whom reports should be provided. It is the responsibility of each responsible person to ensure that the PRPR is provided with up-to-date contact details.

Register

It is recommended that the PRPR maintain a register in which all notifications are recorded together with the date of receipt of the notification and the date the notification was reported to the responsible person.

It is recommended that responsible persons also maintain a register of notifications received of hazardous trees for which they are the responsible person.

PRPR Consultation

The Committee notes that the Primary Responsible Person was consulted in relation to the development of these procedures.

Attachment 5: Neighbourhood Safer Places (NSPs)

NSPs are locations of last resort and are designed to provide some sanctuary for people from the immediate life threatening effects of a bushfire. They are places or buildings designated and signposted by the municipal council, and that having met vegetation guidelines issued by the C F A have been certified to be compliant. A further assessment is then made by Council in accordance with the Municipal Neighbourhood Safer Places Plan. Only Council can designate a NSP within its Municipality.

Proposed Neighbourhood Safer Places will continue to be considered. The process for designation and ongoing review of suitability is ongoing.

Once sites are designated (see below) they will be included in this Plan, Councils' web page and sign posted on-site.

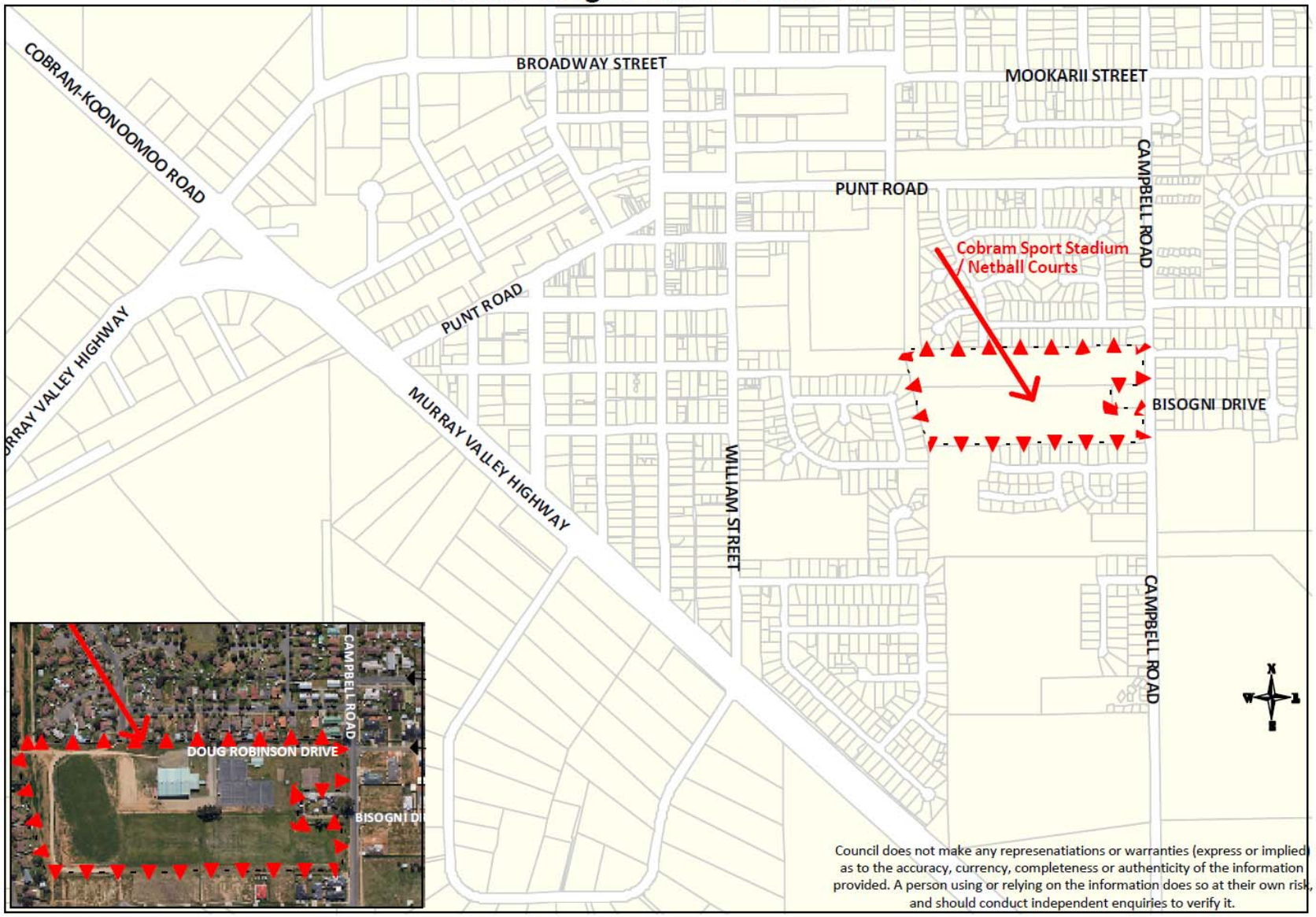
There are two designated Neighbourhood Safer Places -Place of Last Resort within the Moira Shire. These are:

1. Cobram Sports Stadium/Netball Courts, Campbell Road
2. Yarrawonga – Victoria Park Cricket Oval, Dunlop Street

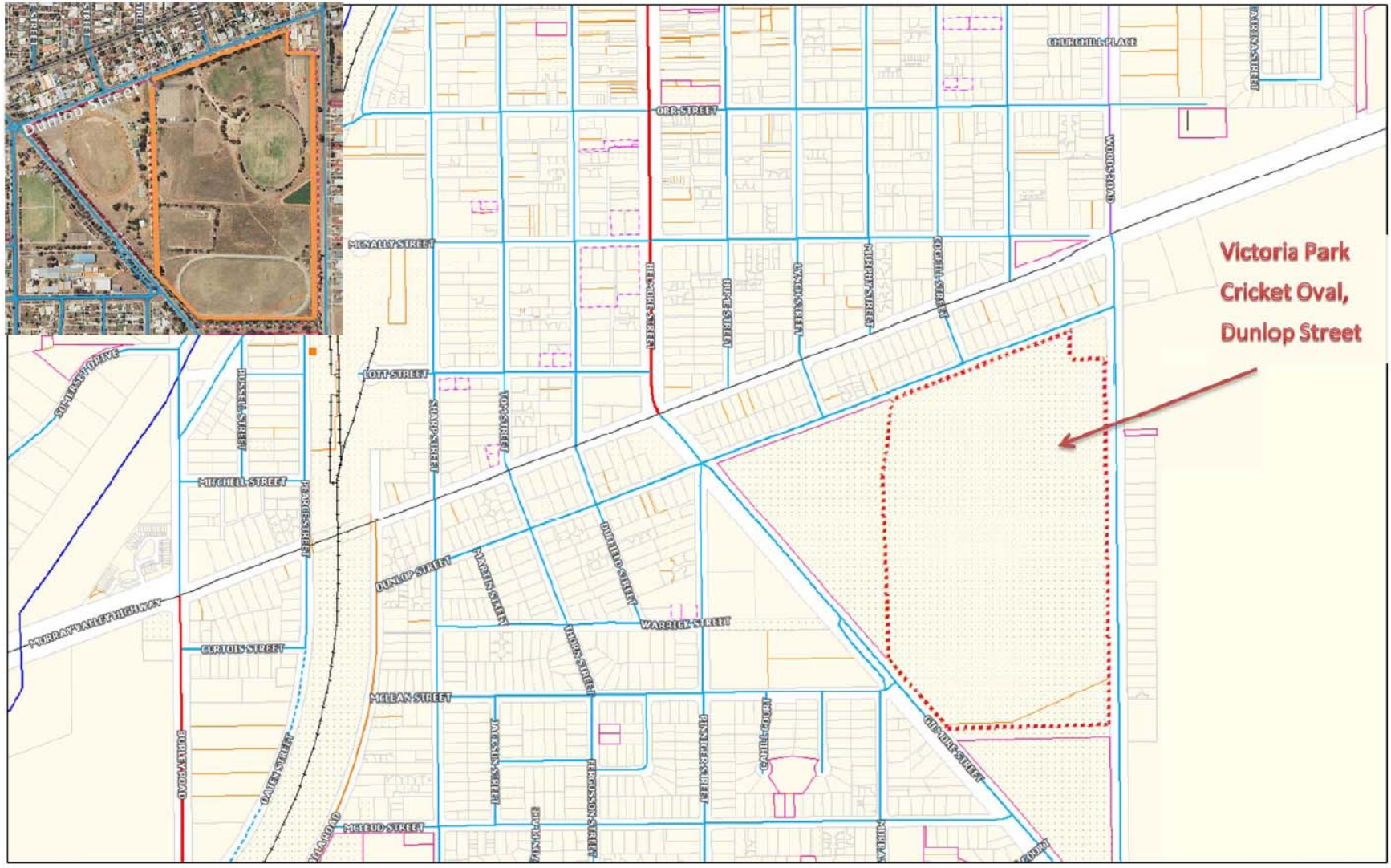
Maps of these Neighbourhood Safer Places are attached below.

For further information on NSPs, follow this link:
www.cfa.vic.gov.au/firesafety/bushfire/what-to-do/neighbourhood-safer-places.htm

Cobram - Neighbourhood Safer Places



Yarrawonga – Neighbourhood Safer Places



Council does not make any representations or warranties (express or implied) as to the accuracy, currency, completeness, or authenticity of the information provided. A person using or relying on the information does so at their own risk, and should conduct independent enquiries to verify it.

Attachment 6: Glossary

Term	Description
ABS	Australian Bureau of Statistics
Acceptable Risk	The level of potential losses that a society or community considers acceptable, given existing social, economic, political, cultural, technical and environmental conditions.
APT	Australian Pipeline Trust
ARMB	Alpine Resort Management Board
AIIMS	Australasian Inter-service Incident Management System A nationally adopted structure to formalise a coordinated approach to emergency incident management.
Assets and Values	Recognised features of the built, natural and cultural environments. Built assets may include buildings, roads and bridges; Structures managed by utility and service providers; or recognised features of private land, such as houses, property, stock and crops plus associated equipment. Natural assets may include forest produce, forest regeneration, conservation values including vegetation types, fauna, air and water catchments. Cultural values may include recreational, indigenous, historical, and archaeological and landscape values. (Code of Practice for Emergency Management on Public Land)
AWS	Automatic Weather Station The Bureau's standard AWSs use sensors to monitor temperature, humidity, wind speed and direction, pressure and rainfall. Various advanced sensors are available for specialised applications. These sensors can monitor cloud height (ceilometer), visibility, present weather, thunderstorms, soil temperature (at a range of depths) and terrestrial temperature. (Developed from the BOM).
BASO	Brigade Administration Support Officer
BMO	Bushfire Management Overlay
BOM	Bureau of Meteorology
Burning Program	A program of prescribed burns scheduled these for a designated area over a nominated time, normally looking ahead over one fire season (for the coming spring to the following autumn), but can also look ahead five years or more.
Burn Plan	The plan which is approved for the conduct of prescribed burning. It contains a map identifying the area to be burnt and incorporates the specifications and conditions under which the operation is to be conducted.
Bushfire	Unplanned vegetation fire. A generic term which includes grass fires, forest fires and scrub fires both with and without a suppression objective.
Bushfire Danger Period	A period of the year either established by legislation or declared by the relevant agency, when restrictions are placed on the use of fire due to dry vegetation and the existence of conditions conducive to the spread of fire.
Bushfire Management	All those activities directed to prevention, detection, damage mitigation, and suppression of bushfires. Includes bushfire legislation, policy, administration, law enforcement, community education, training of fire fighters, planning, communications systems, equipment, research, and the multitude of field operations undertaken by land managers and emergency services personnel relating to bushfire control.
Campaign Fire	A fire normally of a size and/or complexity that requires substantial fire fighting resources, and possibly several days or weeks to suppress.
CERM	Community Emergency Risk Management
CFA	Country Fire Authority

Term	Description
CIG	Community Information Guide (Formerly known as Township protection Plan)
COL	Consequence of Loss - OESC A dataset is owned and maintained by the OESC. The dataset contains records of infrastructure and assets under the categories: Economic Infrastructure, Economic Production, Environmental Biodiversity, Social Cultural, Social Human Life and Social Infrastructure. The dataset contains detailed attributes about the assets type, value and location.
Consequence	Outcome or impact of an event
Control Authority	The agency, service, organization or authority with legislative responsibility for control of the incident. (Also referred to as the responsible authority or agency.)
Coordination	The bringing together of agencies and elements to ensure effective response to an incident or emergency. It is primarily concerned with the systematic acquisition and application of resources in accordance with the requirements imposed by the emergency or emergencies. Coordination relates primarily to resources and operates: • vertically, within an agency, as a function of the authority to command; • horizontally, across agencies, as a function of the authority to control.
Essential Infrastructure	Those services, physical facilities, supply chains, information technologies and communication networks that, if destroyed, degraded or rendered unavailable for an extended period, would significantly impact on the social or economic wellbeing of the community E.g. Water supply facilities.
Curing	Drying and browning of herbaceous vegetation due to mortality or senescence.
DEECD	Department of Education and Early Childhood Development
DHS	Department of Human Services
DOT	Department of Transport
DPCD	Department of Planning and Community Development
DPI	Department of Primary Industries
DSE	Department of Sustainability and Environment
EHO	Environmental Health Officer – Council
Elements at Risk	The population, buildings and civil engineering works, economic activities, public services and infrastructure etc., exposed to sources of risk.
EMA	Emergency Management Act
EMMV	Emergency Management Manual Victoria
EPBC	Environmental Protection Biodiversity Conservation
Essential Service	A service (including the supply of goods) that if rendered unavailable for an extended period would significantly impact on the social or economic wellbeing of the community E.g. Electricity supply. (Adapted from Essential Services Commission Act 2001)
FDI	Fire Danger Index A relative number denoting the potential rates of spread, or suppression difficulty for specific combinations of temperature, relative humidity, drought effects and wind speed.
FDR	Fire Danger Rating A relative class denoting the potential rates of spread, or suppression difficulty for specific combinations of temperature, relative humidity, drought effects and wind speed, indicating the relative evaluation of fire danger.
FFG Act 1988	Flora and Fauna Guarantee Act 1988 – Victorian State Legislation
Fire Management	All activities associated with the management of fire prone land, including the use of fire to meet land management goals and objectives.

Term	Description
FOI	Freedom of Information
Fuel Break System	A series of modified strips or blocks tied together to form continuous strategically located fuel breaks around land units.
Fuel Management	Modification of fuels by prescribed burning, or other means.
Fuel Modification	Manipulation or removal of fuels to reduce the likelihood of ignition and/or to lessen potential damage and resistance to control (e.g., lopping, chipping, crushing, piling and burning).
Fire Season	The period during which bushfires are likely to occur, spread and do sufficient damage to warrant organised fire control.
FRB	Fuel Reduction Burn
Fuel	Any material such as grass, leaf litter and live vegetation which can be ignited and sustains a fire. Fuel is usually measured in tonnes per hectare. Related Terms: Available fuel, Coarse fuel, Dead fuel, Elevated dead fuel, Fine fuel Ladder fuels, Surface fuels, and Total fine fuel.
Fuel Hazard	A fuel complex, defined by volume, type condition, arrangement, and location, that determines the degree of ease of ignition and of resistance to control.
Fuel Management	Modification of fuels by prescribed burning or other means. (AFAC)
GBCMA	Goulburn Broken Catchment Management Authority
GMW	Goulburn Murray Water
GVW	Goulburn Valley Water
Hazard	A source of potential harm or situation with a potential to cause loss. A potentially damaging physical event that may cause loss of life or injury, property damage, social and economic disruption or environmental degradation.
Hazard Layer – DSE	Hazard layer developed and maintained by DSE, Office of Land and Fire. It is a state-wide coverage of <30 m^2> cell resolution with approx 27 attributes detailing surface and elevated fuel loads, hazard ratings and vegetation descriptions.
HVP	Hancocks Victoria Plantations
HRSFMPC	Hume Region Strategic Fire Management Planning Committee
HRSFMP	Hume Region Strategic Fire Management Plan
IAP	Incident Action Plan
IFMP	Integrated Fire Management Planning
IRSED	Index of Relative Social & Economic Disadvantage ABS scoring method for determining and comparing levels of social and economic disadvantage in given areas at a given point in time, with information displayed according to IRSED values from lowest (most disadvantaged) to highest (least disadvantaged).
ISO	International Standards Organisation
ISO 31000:2009	An international risk management standard that provides principles and general guidelines on how to manage risk
ICC	Incident Control Centre The location where the Incident Controller and various members of the Incident Management Team provide overall direction of response activities.
LGA	Local Government Authority Represents relevant Municipal Council (or ARMB) for area of concern.
Likelihood	Probability or frequency of an event can be either qualitative or quantitative.
Loss	Any negative consequence or adverse effect, financial or otherwise.
MBS	Municipal Building Surveyor - Council

Term	Description
MDA	Map Display Area
MEMP	Municipal Emergency Management Planning
MEMPC	Municipal Emergency Management Planning Committee
MERC	Municipal Emergency Response Coordinator – Victoria Police
MERO	Municipal Emergency Resource Officer – Council
MFB	Metropolitan Fire Brigade
MFMP	Municipal Fire Management Planning
MFMPC	Municipal Fire Management Planning Committee
MFPC	Municipal Fire Prevention Committee *(superseded by MFMPC)*
MFPP	Municipal Fire Prevention Plan *(superseded by MFMP)*
MFPO	Municipal Fire Prevention Officer
Mitigation	Measures taken in advance of a disaster, aimed at decreasing or eliminating its impact on society and environment.
Municipal Area	The geographic footprint of the relevant LGA/ARMB
NECMA	North East Catchment Management Authority
NEW	North East Water
NSP	Neighbourhood Safer Place – Place of Last Resort
OESC	Office of Emergency Service Commission
PPRR	Prevention, Preparedness, Response, Recovery
Practicable	What is realistic to achieve in the context of: The severity of the hazard. The state of knowledge about the hazard or risk and any ways of removing or mitigating it. The availability and suitability of ways to remove or mitigate that hazard or risk. The cost of removing or mitigating that hazard or risk. (Dangerous Goods (Storage and Handling) Regulations 2000)
Preparedness	Arrangements to ensure that in the event of an emergency occurring all those resources and services that area needed to cope with the effects can be efficiently mobilised and deployed.
Prescribed Burning	The controlled application of fire under specified environmental conditions to a predetermined area and at the time, intensity, and rate of spread required to attain planned resource management objectives.
Prevention	Regulatory and physical measures to ensure that emergencies are prevented, or their effects mitigated.
Probability	A measure of the chance of an event occurring, often expressed as a number.
Recovery	The coordinated process of supporting emergency affected communities in the reconstruction of the physical infrastructure and restoration of emotional, social, economic and physical wellbeing.
Residual Risk	Risk remaining after implementation of a risk treatment.
Resilience	The capacity of a system, community or society potentially exposed to hazards to adapt, by resisting or changing in order to reach and maintain an acceptable level of functioning and structure. This is determined by the degree to which the social system is capable of organising itself to increase its capacity for learning from past disasters for better future protection and to improve risk reduction measures. (UN/ISDR, Geneva 2004)
Response	Actions taken in anticipation of, during and immediately after an emergency, to ensure its effects are minimised and that people affected are given immediate relief and support.
Risk	The exposure to the possibility of such things as economic or financial loss or gain, physical damage, injury or delay, as a consequence of pursuing a

Term	Description
	particular course of action. The concept of risk has two elements, i.e. the likelihood of something happening and the consequences if it happens.
Risk Analysis	A systematic use of available information to determine how often specific events may occur and the magnitude of their likely consequence.
Risk Assessment	The overall process of risk identification, analysis and evaluation.
Risk Criteria	Terms of reference by which the significance of risk is assessed.
Risk Evaluation	Process of comparing the level of risk against criteria.
Risk Identification	The process of determining what, where, when, why and how something could happen.
Risk Management	The culture, process and structure that are directed towards potential opportunities whilst managing adverse effects.
Risk Management Process	The systematic application of management of policies, procedures and practices to the tasks of communicating, establishing the context, identifying, analysing, evaluating, treating, monitoring and reviewing risk.
Risk Reduction	Actions taken to lessen the likelihood, negative consequences, or both, associated with a risk.
Risk Register	A listing of risk statements describing sources of risk and elements at risk, with assigned consequences, likelihoods and levels of risk.
Risk Treatment	Process of selection and implementation of measures to modify risk.
RSFMPC	Regional Strategic Fire Management Planning Committee
SES	State Emergency Services
SFMPC	State Fire Management Planning Committee
SMR	StateNet Mobile Radio
SOP	Standard Operating Procedures
Source of Risk	Source of potential harm
Stakeholders	Those people and organisations who may affect, be affected by or perceive themselves to be affected by a decision, activity or risk.
Susceptibility	The potential to be affected by loss
TAPO	Technical Administrative Project Officer
TFB	Total Fire Ban (A day of Total Fire Ban)
Tolerable Risk	A risk within a range that society can live with so as to secure certain net benefits. It is the range of risk regarded as non-negligible and needing to be kept under review and reduced further if possible.
TOR	Terms of Reference
Treatment	An existing process, policy, device, practice or other action that acts to minimise negative risk or enhance positive opportunities. The word control may also be applied to a process designed to provide reasonable assurance regarding the achievement of objectives.
Treatment Assessment	Systematic review of processes to ensure that controls are still effective and appropriate.
Urban Rural Interface	The line, area, or zone where structures and other human development adjoin or overlap with undeveloped bushland.
VFRR	Victoria Fire Risk Register CFA process that identifies assets at risk from bushfire, assesses the level of risk and highlights the risk mitigation treatments currently in place along with the responsible agencies for implementing these treatments. The output is a geographic layer and associated attributes that identifies the asset type; name; location and risk factors and priorities of these assets based on a wildfire occurring in its vicinity on a day of 100 FDI.
VICPOL	Victoria Police

Term	Description
Vulnerability	The conditions determined by physical, social, economic and environmental factors or processes, which increase the susceptibility of a community to the impact of hazards. (UN/ISDR, Geneva 2004)
Vulnerable People	Those living in high bushfire risk areas and who are unable to make an independent decision, including due to cognitive impairment; physically dependant and totally reliant on in home personal care and support; and people who live alone and are geographically isolated with no co-resident carer or family. (DHS)
WTP	Water Treatment Plant

AFAC Bushfire Glossary can be found at the following website:
http://knowledgeweb.afac.com.au/data

Attachment 7: Excerpts from Municipal Fire Prevention Plan

1: Structural Fire

The following attachments (7-12) are taken directly from the old Municipal Fire Prevention Plan. They relate to structural and other fire types not covered in the body of the plan. They also include information regarding Fuel Reduced Corridors and Permits to Burn.

A. Dwellings

i. Context

The residential population of the Municipality is spread with widely varying density throughout its length and breadth. The majority of the population of the Municipality resides within the towns of Cobram, Nathalia, Numurkah, Tungamah, Yarrawonga and other outlying districts.
There is a wide diversity of life styles and dwelling types within the general population with a significant number of older buildings.

Statistics indicate that burns and other associated injuries, particularly to children, occur far too frequently and the highest cause of fire related death originate from fires in the home.

ii. Risks, Strategies, Programs and Actions

Risk		**Objective**	**Treatment/Program/Action**	**Responsibility**	**Others Involved**	**Time Frame**
Details	Rating					
Loss of life.	High	Maintain nil level	Community Education including the following: • Moira Matters • Brigades in schools • CFA mobile education unit • Brigade information activities.	Municipality & CFA	Fire Brigades	Ongoing.
Personal injury.	Significant	Minimise incidence and severity.	Inspect new and altered dwellings for smoke detector installation.	Municipal/ Private Building Surveyors		Ongoing

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	Rating					
Property loss.	High	Minimise incidence and severity	Inspect a minimum of 25 properties per year on a random basis for compliance with smoke detector installation requirements.	Municipal Building Surveyor		Ongoing.
			Home Carers to check for smoke detector installation when in dwellings. (CFA to provide Home Carers training)	Municipality MHA CFA	CFA	Ongoing.

B. Townships (Residential-General)

i. Context

The major towns within the Municipality are Cobram, Nathalia, Numurkah, Tungamah and Yarrawonga.

Some of these towns are located near rivers or streams and/or heavily timbered areas, and can be characterised as having many older timber buildings, an irregular layout, and in some cases are heavily treed. Some of the premises are only occupied on a seasonal basis (holiday homes).

The towns of Barmah, Cobram, Invergordon, Katamatite, Katunga, Nathalia, Numurkah, Picola, St James, Tungamah, Strathmerton, Wunghnu, and Yarrawonga are provided with a reliable reticulated water supply that is available for fire fighting purposes. The availability of the supply needs to be regularly checked to ensure its continued availability at all points within the Township.

ii. Risks, Strategies, Programs and Actions

Risk		**Objective**	**Treatment/Program/Action**	**Responsibility**	**Others Involved**	**Time Frame**
Details	Rating					
Loss of life.	Significant	Maintain nil loss of life.	Undertake property inspections under Section 41 of the CFA Act. Issue Fire Prevention Notices to owner/occupier who's property contains a fire /potential fire hazard. Undertake the work and issue infringement notices where owners do not comply	Municipality	Owner / Occupier	Ongoing
Loss of personal effects.	Significant	Minimise loss of personal effects.	Routine inspection of fireplugs and markers. • Visual inspections by Brigades. • Council notified of all unserviceable plugs. • Council to ensure maintenance work is undertaken.	Water Supply Authority	CFA Municipality, Brigades	Ongoing.

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	Rating					
Loss of property.	Moderate	Minimise of loss of property.	Community Education using the following: • Place articles in Moira Community Information page of locally distributed tabloids • Brigade information displays. • Fire Ready Victoria	Municipality CRO & CFA		Ongoing

C. Rural Small Area

i. Context

Rural residential areas are spread, with widely varying density, throughout the Municipality. This Risk Environment does not include those risks relating to any dwelling that may be contained on the property.

The expansion of residential development into rural areas can significantly increase the exposure of the residents of those areas to the impact of wildfire. Many Rural Residential developments may contain special fire related risk environments requiring specialised treatment, particularly where the residential areas that adjoin or are in close proximity to bushland.

The very nature of the population distribution throughout the shire sees some isolated settlements and communities located within heavily timbered areas, creating the potential for extensive risk to life and property.

The occurrence of isolated single dwellings specifically designed for the 'Isolated Lifestyle' is increasing. Fire related risks associated with these types of dwellings include isolation, restricted access, a lack of available water and vulnerable construction materials and design.

The residents at these premises may be absent during the week and/or absent for extended periods of many months. In some cases these properties contain unsightly land and a considerable accumulation of rubbish often as a result of bad housekeeping practices.

Planning Permits are generally required for all new developments in these locations and contain requirements for water supply, access and fuel reduced zones surrounding buildings.

The provision of electrical power by the use of exposed overhead conductors has a high potential for the occurrence of fire necessitating regular inspections/maintenance of the assets throughout the area

These areas generally are not provided with a reticulated water supply necessitating the use of dams and storage tanks that are in turn dependant on annual rainfall and supplementation by other means when required.

ii. Risk Environments, Strategies, Programs and Actions

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	**Rating**					
Loss of life from the effects of uncontrolled fire (external to the building).	High	Maintain nil level	Generally Town Planning provisions require water supplies and access.	Land Owner	CFA	Ongoing
Personal injury as a result of the effects of uncontrolled fire (external to the building).	Significant	Minimise incidence and severity.	• Moira Matters Information to highlight the need to maintain adequate water supply, access and fuel reduction. • Fire Ready Victoria	Municipality - CRO & CFA		Annually ongoing
Loss of personal effects from the effects of uncontrolled fire (external to the building).	Significant	Minimise incidence and severity.	Encourage the development of Community Fire Guard Groups where appropriate need is identified (CFA to report status of Community Fire Guard Groups annually to MFPO)	CFA	Municipality & Fire Brigades	Ongoing
Loss of property from the effects of uncontrolled fire (external to the building).	Significant	Minimise incidence and severity.	MFPO to make application for Fire Access grants and appropriate roadworks undertaken (FARSS).	Municipality – MFPO CFA - MCS	Fire Brigades	Ongoing Applications annually in March.

D. Industrial

i. Context

There are a number of industries within the Municipality that are generally located close to their supply of raw materials. The major industries at risk are the timber processing plants, oil processing factory, milk-processing factories, light engineering/fabrication, abattoirs, grain storage depots, and bulk fuel depots. There are a number of risks associated with these industries that include fire, hazardous materials spills (both storage and transport), and environmental damage from pollution and/or spillage.

There are a number other depots and industries that are located within the Industrial zones of the townships of Cobram, Nathalia, Numurkah, Tungamah and Yarrawonga where smaller amounts of dangerous goods are stored. 'This has in turn lead to an abundance of chemicals and dangerous goods being stored and used throughout the Municipality. Storage volumes are generally very low and therefore their use is not obvious to anyone other than the proprietors.

Generally the controls on Industries are quite stringent and hence the likelihood of any major incident is low. However should a major incident occur, there would be a significant impact on the community both economic and potentially to life.

ii. Risks, Strategies, Programs and Actions

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	**Rating**					
Loss of life and personal injury from the effects of uncontrolled fire.	Significant	Minimise incidence and severity.	Identify and maintain a Pre-Plan of at risk Industrial premises. Encourage the industries to develop and maintain an adequate Fire Prevention and Evacuation Plans.	CFA Brigades WorkCover Authority	CFA - FSO	Annually ongoing
Property loss and resultant Economic loss both Public and Private.	Significant	Minimise incidence and severity.	Further education/information to be provided in relation to Dangerous Goods audits.	WorkCover Authority CFA		Ongoing

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	**Rating**					
Environmental damage.	Significant	Minimise incidence and severity.	Provide training and emergency awareness for response authority workers.	CFA Training Manager		Ongoing

E. Commercial

i. Context

The major Commercial Centres within the Municipality are predominantly located within the towns of Cobram, Nathalia, Numurkah, and Yarrawonga; with isolated establishments located within the other communities. There are a number of risks associated with the occurrence of fire related to these commercial centres that include; a higher concentration of flammable materials and the proximity to other similar premises. The loss of these premises as a result fire, may result in major economic loss and the loss of employment.

Due to the nature and operation of the Commercial Premises, shortfalls in the provision of adequate housekeeping practises and general fire safety can raise the level of risk to the general public and the owners/employees.

ii. Risks, Strategies, Programs and Actions

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	**Rating**					
Loss of life from the effects of uncontrolled fire.	Significant	Maintain current nil level.	Develop a Pre-Plan of at risk Commercial premises. Encourage the operators of the premises to develop and maintain an adequate Emergency Management and Evacuation Plan.	CFA Brigades CFA	Worksafe	Ongoing
Loss of property from the effects of uncontrolled fire.	Significant	Minimise incidence and severity.	Risk management, including the inspection of a minimum of 3 properties per year on a random basis as necessary. Provide information to owners/occupiers as required. Follow up with inspections and application of enforcement under the Building Act as necessary.	Municipality – MBS CFA		Annually ongoing

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	Rating					
Personal injury from the effects of uncontrolled fire.	Moderate	Minimise incidence and severity.	MBS to liaise with CFA	Municipality – MBS CFA		Ongoing
Environmental damage.	Significant	Minimise incidence and severity.	During inspections any anomalies or concerns are noted by the Environmental Health Officer and reported to the EPA.	Municipality	EPA	Ongoing

F. Health Care

i. Context

There are Health Care Centres located in Cobram, Nathalia, Numurkah, and Yarrawonga. By nature they contain a population that generally sleep overnight, and are generally dependent on outside assistance for mobility, day to day living, control and direction. Consequently this group that encompasses; special accommodation, nursing homes, hostels and hospitals are very vulnerable to a wide range of events.

There is a risk inherent in all these facilities of multiple injuries and loss of life should a significant incident occur. Generally fire controls are high (eg fire protection equipment and structural safety), however any incident involving these premises, taking participant numbers into consideration, can lead to major consequences.

ii. Risks, Strategies, Programs and Actions

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	Rating					
Loss of life from the effects of uncontrolled fire.	High	Maintain current nil level.	Update and maintain a database of at risk premises.	Municipality	Department of Human Services, CFA & Worksafe	Updated annually-ongoing.

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	Rating					
Loss of property from the effects of uncontrolled fire.	High	Reduce incidence and severity	Risk management, including the inspection of a minimum of 2 properties per year on a random basis and encourage compliance with the Building Act where necessary.	Municipality MBS, EHO, CFA	DHS	Annually ongoing
			Environmental Health Surveyors to recognise fire risks and liaise with MBS and FSO.	Municipality & CFA		Ongoing

G. Public Accommodation and Tourist Facilities

i. Context

The nature and range of these types of facilities varies greatly across the Municipality. The type, size and age of the premises has a very significant impact on the potential for the loss of both life and/or property. As a general rule these types of premises can contain a high number of people who will be sleeping on the premises and are unfamiliar with their surroundings, are exposed to varying standards of serviceability, and different or a lack of safety procedures. In some cases the occupants have very little control over their surroundings and invariably have little interest in the risks associated with the accommodation.

Although the likelihood of a large fire in these premises or facilities is rare, the consequence in the event of fire is major (loss life).

ii. Risk Environments, Strategies, Programs and Actions

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	**Rating**					
Loss of life from the effects of uncontrolled fire.	High	Maintain current nil level.	Fire Prevention Planning. Further develop the records of at risk premises.	Municipality - EHO	CFA, Parks Victoria & Worksafe	Ongoing basis
Loss of property from the effects of uncontrolled fire.	High	Reduce incidence and severity	Risk management, including the inspection of a minimum of 3 properties per year based on the risk ranking, and application of enforcement under the Building Act where necessary.	Municipality - MBS CFA – MCS		Ongoing
Social/ Economic loss both Public and Private.	High	Reduce incidence and severity	Environmental Health Officers to recognise fire risks. And liaise with MCS.	Municipality – EHO CFA - MCS		Ongoing
			Ensure that fire-safety issues are considered and the CFA consulted when granting planning permits for Tourism Developments.	Municipality Town Planner	CFA - MCS	Ongoing.

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	Rating					
			Community Education including the following: • Moira Matters • Press Releases	Municipality – CRO	CFA – CEC	Ongoing

H. Public Assembly

i. Context

There are a number of these premises within the Municipality including public halls, sporting complexes, churches, schools, preschools and childcare centres. Each facility or premises has its own particular risk that will require individual evaluation.

As a general rule these types of premises can contain a high number of people who will be gathering together on the premises and are unfamiliar with their surroundings. In some cases the occupants have very little control over their surroundings and the risks associated with the premises.

ii. Risks, Strategies, Programs and Actions

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	**Rating**					
Loss of life from the affects of uncontrolled fire.	High	Maintain current nil level.	Fire Prevention Pre-Planning at Brigade level.	CFA – MCS	Municipality - MBS	Ongoing
Loss of property from the affects of uncontrolled fire.	Significant	Reduce incidence and severity	Risk management, to include the inspection of a minimum of 3 properties per year.	Municipality – MBS CFA		Ongoing
Social/ Economic loss both Public and Private.	High	Reduce incidence and severity	Community Education including the following: • Moira Matters • Press Releases	Municipality – CRO	CFA – CEC	Ongoing
			Environmental Health Surveyors to recognise fire risks and liaise with MSC.	Municipality – EHO	CFA – MCS	Ongoing

I. Transport

i. Context

The Murray Valley Highway and Goulburn Valley Highway, and the rail line from Shepparton to Tocumwal, and Benalla to Yarrawonga traverse the Municipality. These roads are critical to the economy of the region and the rail line provides significant opportunity for future economic development. These transport links however provide a potential fire ignition source due to vehicle malfunction, accident or inappropriate disposal of burning material by the users, such as cigarettes.

All roads carry traffic to various degrees, depending on their location. The higher the traffic usage, the higher is the requirement for the road to be able to provide safe passage for vehicles during a wild fire and to provide an area for refuge on the road shoulder.

There are a wide variety of dangerous goods transported with the ever-present potential for incidents involving loss or damage to those goods.

The vegetation on the road reserve varies significantly from open grass land to that of forested areas along the Rivers, giving a wide range of risk environments and hence the associated treatments must vary accordingly.

VicRoads requires that local land holders and Brigades wishing to undertake fire prevention work along the road frontage of Highways and Freeways under the direct control of VicRoads must obtain their approval prior to undertaking any work. (It should be noted that no new ploughed or graded fire-breaks will be approved).

ii. Risk Environments, Strategies, Programs and Actions

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	**Rating**					
Loss of life from the affects of uncontrolled fire.	High	Maintain current nil level.	Identify and monitor specific transport routes.	Municipality – MFPO	Brigades, CFA & VicRoads	Ongoing
Loss of property from the affects of uncontrolled fire.	Significant	Reduce incidence and severity.	Liase with Transport Infrastructure Operators to minimise the risks. (This can be done at MFPC Meetings). The infrastructure includes assets no longer in use.	Municipality – MFPO	CFA	Ongoing
Loss of livestock in the passage of wildfire.	Significant	Reduce incidence and severity	Develop and maintain fuel reduction works for specifically targeted areas.	Municipality – MFPO	Brigades & CFA	Ongoing
Social/ Economic loss both Public and Private.	Significant	Reduce incidence and severity	Identify potentially dangerous locations and raise awareness with the appropriate Authority.	Municipality – MFPO	Brigades & DSE	Ongoing
Environmental damage.	High	Reduce incidence and severity				

J. Special Risks

i. Context

Each Fire Brigade within their own locality should identify these risks. These identified risks should have adequate water supply for fire fighting purposes, appropriate fire suppression equipment and ready access provided for Fire Fighting Vehicles at the site.

As a general rule these premises contain a high number of people who are unfamiliar with their surroundings and are exposed to varying standards of fire safety. In some cases the occupants have very little control over their surroundings and invariably have little knowledge in the risks associated with the premises.

Many of the buildings are unoccupied and there is a general lack of people residing in these areas during the winter period.

The following specific sites/events have been identified:

- Peaches and Cream
- Barmah Muster
- Wilby Motor Sports Club
- Motor Cross at Waaia and Cobram
- Go Carts Numurkah
- Yarrawonga Boat Races (Lake Mulwala)
- Waaia Tractor Pull

The illegal discharge of fireworks has the potential to threaten both life and property and the risk is exacerbated due their use at times when response level is at its lowest.

ii. Risk Environments, Strategies, Programs and Actions

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	**Rating**					
Loss of property from the effects of uncontrolled fire.	Moderate	Reduce incidence and severity.	Special Events permits to include Fire Mitigation Plans, eg fireworks display.	Municipality	CFA & DSE	Ongoing

Risk		Objective	Treatment/Program/Action	Responsibility	Others Involved	Time Frame
Details	Rating					
Environmental damage.	Moderate	Reduce incidence and severity.	Ensure appropriate referrals are made and appropriate conditions are applied to Planning Permits issued for Special Events.	Municipality – Town Planner	CFA & DSE	Ongoing

2: Roadside Management

FUEL REDUCED CORRIDORS & PRIORITY ACCESS ROADS

i. General

It is acknowledged that Fire Brigades may identify and undertake treatments on local roads as Fuel Reduced Corridors within their own brigade boundaries, which may not necessarily be identified in the Municipality Strategy. These Fire Prevention works are not always undertaken annually, however all such works are undertaken specifically to minimise the threat to life and property from uncontrolled wildfire. The works that have been undertaken in the past form an integral part of the Fire Prevention Strategy of the Municipality and are supported by this document.

Fire Brigades are encouraged to submit annually prior to the Fire Season, details of proposed Fuel Reduction Works proposed to be undertaken on roads and/or reserves.

All works are to be undertaken in accordance with the details following:

ii. Fuel Reduced Corridors

Fuel Reduced Corridors must be sufficiently fuel-reduced to provide a safe corridor for the travelling public, provide a means of establishing a control line, reduce the time of travel to low-risk areas and to slow the spread of fire on the road reserve.

Fuel Reduced Corridors should where applicable have the fine fuel reduced for a distance of 3 m behind the guideposts on either side of the road where practical. All overhanging obstructions less than 5 m above the road pavement must be removed, and dangerous trees/limbs need to be removed to allow the safe passage of fire fighting appliances. They must be inspected annually by the controlling road authority and maintained prior to the fire danger period.

One or all of the following methods can be used to meet the requirements:

(a) Mowing or slashing a strip at least 3 metres wide on one or both sides of the road reserve, either adjacent to the shoulders of the pavement, or next to or inside the adjoining property, at the appropriate time to prevent regrowth and accumulation of dry slashed material.

(b) The grading of a strip to bare earth not less than 3 meters wide on both sides of the road reserve adjacent to the shoulders of the pavement. The over burden from the graded break should be spread out or removed to prevent the accumulation of earth and dry vegetation next to the break.

(c) The ploughing of an earth strip not less than 2 meters wide on both sides of the road reserve adjacent to the fence-line, where there has been a past history of ploughing.

(d) Fuel reduction low intensity burning by fire brigades on a coordinated basis. Fuel reduction burning shall only be required when the fuel load exceeds 4 tonne per

hectare. Fuel loadings on the roadsides identified for burning are to be reviewed annually by the Municipality in the spring of each year.

(e) The spraying of herbicide where other treatments are not practical or cost effective, to create a strip a minimum of 3m wide with little or no vegetation present on both sides of the road reserve adjacent to the shoulders of the pavement. Burning may then follow as required. Spraying of native grasses should be avoided.

(f) Thinning out of vegetation within the reserve or easement, and removing potentially dangerous trees.

Fuel Reduced Corridors are to be identified in Brigade Fire Prevention Plans. Both the Council and Brigades may undertake works on these roads as resources permit.

iii. Priority Access Roads

Priority Access Roads must be sufficiently fuel-reduced to provide a safe corridor, and minimise time travel time for the travelling public and emergency service vehicles.

Priority Access Roads must be cleared of all low overhanging obstructions less than 5 m above the road pavement and dangerous trees/limbs need to be removed. A 3.0 m minimum width fine-fuel reduced area on both sides of the road must abut a clear travelled path that has a 6.0 m minimum width.

These roads must be inspected annually by the controlling road authority and maintained prior to the fire danger period.

iv. Fire Access Roads

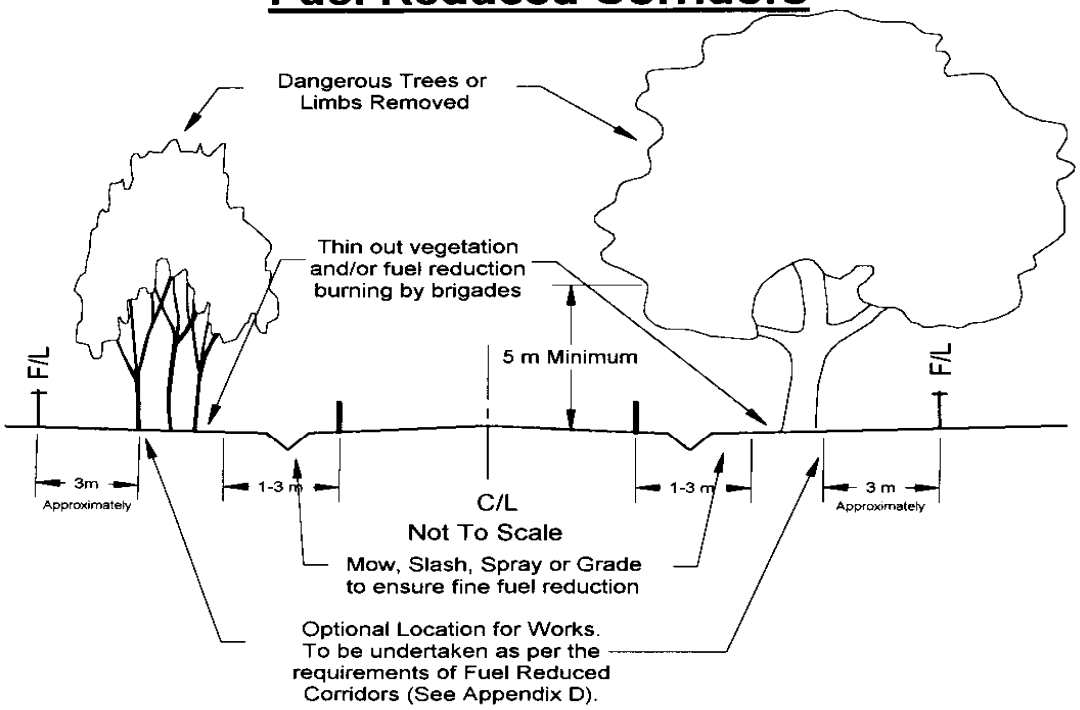
These roads are required to provide summer access for fire fighting vehicles and will be maintained by the Council accordingly, prior to the summer period.

The following Fire Access Roads have been identified in Appendix E, however Council is not restricted to these roads and may include other roads from time to time if deemed necessary.

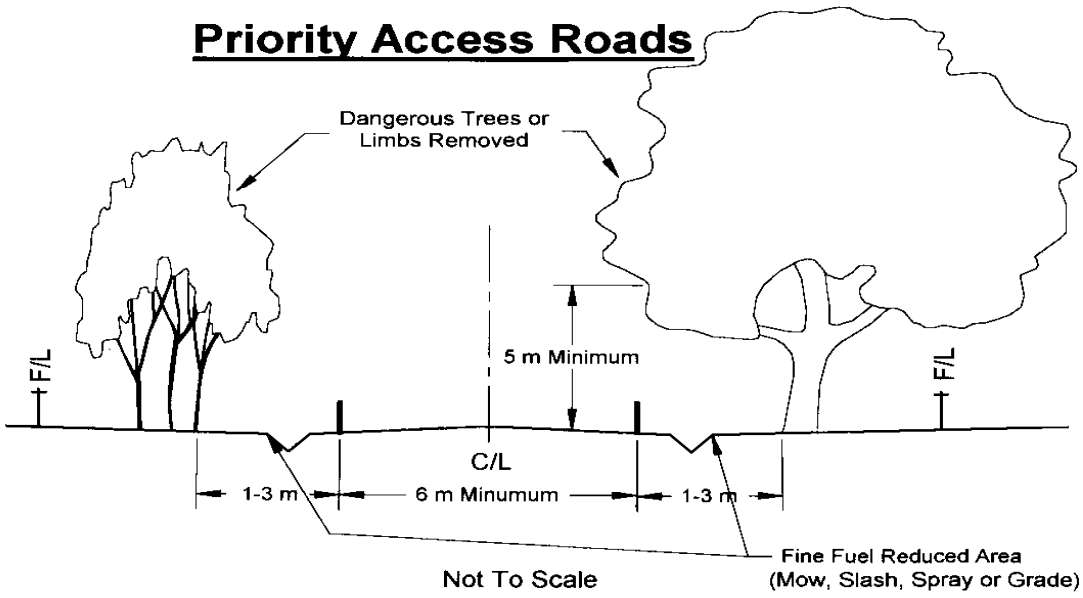
DIAGRAMS OF TYPICAL WORKS ON ROADS

NOTE: The following diagrams show the optimum desirable situation. It must be noted that this may not be achievable or practical in all situations.

Fuel Reduced Corridors



Priority Access Roads



3: Fire Refuge

Refuge from Fire
It is generally accepted that the home should be safe from fire. However without adequate attention to the removal of hazards and proper construction practises, the home may offer limited protection.

If the home has been properly prepared, the chances of the home surviving the passage of a fire front are greatly increased by the occupants remaining and being able to extinguish any ember ignitions.

The CFA encourages people to remain with their homes where these premises have been properly prepared and protected. Planned and timely evacuation with appropriate notice is required were the decision to leave has been made. There is a clear onus on residents and owners to make every endeavour to reduce fire hazards around their homes and assets. Every encouragement should be provided to assist each householder and landowner in making the property as safe as possible, both from approaching fire and from one occurring within the property.

It is critical that if evacuation is planned, that it be undertaken well in advance of the approach of the fire front. Late evacuations must be avoided, as they can prove fatal.

Buffer zones
Buffer zones are tool used in the treatment of a variety of situations. E.g.:

- Community assets.
- Individual dwellings
- Golf courses or parks located in a strategic position.
- High density population areas.

It is generally accepted that the home should be safe from fire. However without adequate attention to the removal of hazards and proper construction practises, the home may offer limited protection.

If the home has been properly prepared, the chances of the home surviving the passage of a fire front are greatly increased by the occupants remaining and being able to extinguish any ember ignitions.

The CFA encourages people to remain with their homes where these premises have been properly prepared and protected. Planned and timely evacuation with appropriate notice is required were the decision to leave has been made. There is a clear onus on residents and owners to make every endeavour to reduce fire hazards around their homes and assets. Every encouragement should be provided to assist each householder and landowner in making the property as safe as possible, both from approaching fire and from one occurring within the property.

It is critical that if evacuation is planned, that it be undertaken well in advance of the approach of the fire front. Late evacuations must be avoided, as they can prove fatal.

4: Fire Hazard Removal/Fuel Reduction and Hazard Isolation

On-going liaison shall be maintained between the MFPO and the local Fire Brigades to ensure that fire hazards are minimised throughout the year. Council Officers shall be instructed to note any occurrence during their normal inspections, which may be thought to constitute a fire hazard. When such a hazard is identified the MFPO will instigate appropriate measures to have the hazard removed.

Fire hazards/risks associated with commercial and industrial properties are controlled by legislation, such as the Building Code of Australia and the Planning and Environment Act. Where hazards are identified at these locations this specialist legislation should be used, in addition to the powers provided under the CFA Act.

The property owners or occupiers shall complete fire hazard removal, reduction and isolation, including the clearing of blocks pursuant to Section 41 of the CFA Act, prior to the introduction of the Declared Fire Danger Period. This must include blocks that have been cleared and have regrown.

A Public notice shall be placed in the local distributed Newspapers advising the public as to their responsibilities for the removal of Fire Hazards and the consequences of non-compliance. This is appropriate as it corresponds with CFA Fire Awareness activities.

This public notice shall be followed by an inspection of the townships by Shire personnel and Brigade Captains or Brigade Representatives.

Depending on seasonal conditions it is expected that the MFPO and local Fire Brigade Captain or Brigade Representative will commence formal inspections of the Townships and surrounds, generally in early October, to determine which blocks require clearance. Owners who have not undertaken the works will then be issued with a Fire Prevention Notice. Following the expiration of the allowed time for the work to be undertaken (generally 14 days), the MFPO will direct a further inspection of the Townships. Property owners who have failed to have the work performed will have the work undertaken by others at the owners expense, at the direction of the MFPO, and will have infringement notices issued to them.

Urban Residential Allotments

It is recommended that Urban Residential Allotments should have all the grass, weeds and undergrowth cut to a height of less than 100 mm including all grass up to and against fences, buildings and trees. However it is recognised that special circumstances may require a variance to this standard. Vegetation may be required to be removed, together with any dead wood or other flammable refuse from the allotments and the adjacent half width of the street.

Larger Allotments

Larger allotments, exceeding 1 hectare and less than 10 hectares, should have the fuel reduced by cutting, removing, effective grazing and ploughing for a distance of 20 m around dwellings and other assets, and a strip of 3 m to 6 m maximum width around the boundary, or as deemed suitable by MFPO. Spraying, if undertaken at the appropriate time can be used to make these breaks.

In private forest areas it is recommended that:

- All flammable vegetation and undergrowth be removed for a safe distance around buildings and other assets.
- Trees should be thinned, and cut trees and limbs removed.
- Clumps of dense vegetation should be isolated.
- A 6m minimum width firebreak should be constructed around the perimeter of the property by ploughing or spraying, where practical.
  The above may be varied as deemed necessary by the MFPO and Council Planning Provisions must be observed when removing vegetation.

In grassland areas fuel reduction should be undertaken by spraying, cutting, grazing or ploughing for a distance of 20 m around buildings and assets and other installations requiring protection. A 3m to 6 m minimum width break around the perimeter of the property should also be undertaken where practical. If necessary the MFPO may issue further directions.

Undeveloped Municipal Reserves and Municipal Public Land should have a fire break or fuel reduction strip 3 m to 6 m wide, as deemed suitable by MFPO, constructed around the perimeter of the Reserve where practical. This may be varied as deemed necessary by the Municipal Fire Prevention Officer. Access for fire fighting vehicles should be provided.

Rural dwellings should be located and constructed in accordance with the '*Design and Siting Guidelines-Bushfire Protection for Rural Houses'.*

5: Burning Within Townships

Extract from Environment Local Law 2003

Part 2 – Safety: People and Property

5. Fire Hazards

An owner or occupier of land must ensure that all necessary steps are taken to prevent a fire hazard and otherwise to prevent fires and minimise the possibility of the spread of fire and at all times land must be kept free of undergrowth, scrub, bracken, ferns, weeds, stubble and grass whether alive or dead and whether standing or not standing) and any other material or substance likely to assist in the spread of fire whether of a similar kind to that mentioned or not.

Penalty: $1,000 for first offence
$2,000 for second or subsequent offence;
with a daily penalty of $200 for each day the offence continues after convicted.

10. Burning of offensive materials

(1) A person must not, without a permit, burn or cause to burn any offensive materials in any part of the municipal district.

(2) For the purpose of sub-clause (1) materials containing the following substances are offensive;
(a) any manufactured chemical;
(b) any rubber plastic;
(c) any petroleum or oil;
(d) any paint or receptacle which contain or which contained paint;
(e) food waste, fish or other offensive or noxious matter; and
(f) any other materials as determined by the Council from time to time.

Penalty: $1,000 for first offence
$2,000 for second or subsequent offence; with a daily penalty of $200 for each day the offence continues after convicted.

(3) In deciding whether to grant a permit, the Council must have taken into consideration:

(a) the location or the proposed burning in proximity to adjoining land;
(b) the zoning of the land on which the burning is to take place;
(c) any alternative means of disposal;
(d) any adequate means of supervising the burning;
(e) any adequate means of controlling and extinguishing the spread of fire;
(f) the degree to which the material to be burned may produce offensive, toxic or unpleasant smells or smoke;
(g) any policies of the Environment Protection Authority; and
(h) any other matter relevant to the circumstances associated with the application.

11. Burning Off in a residential area

(1) A person must not without a permit light a fire either in an incinerator or otherwise in the open air in a residential or built up area.

Penalty: $1,000 for first offence
$2,000 for second or subsequent offence; with a daily penalty of $200 for each day the offence continues after convicted.

(2) A person who directs another person to light a fire in contravention of this clause is guilty of an offence.

Penalty: $1,000 for first offence
$2,000 for second or subsequent offence; with a daily penalty of $200 for each day the offence continues after convicted.

(3) For the purpose of this clause a fire is in the open air if it is any place other than within a permanent structure.

(4) A person must not without a permit construct or install an incinerator in a residential area.

Penalty: $1,000 for first offence
$2,000 for second or subsequent offence; with a daily penalty of $200 for each day the offence continues after convicted.

(5) A person who is the owner or occupier of land in a residential area is guilty of an offence if:-

(a) a person without a permit uses an incinerator on the land; or
(b) a person without a permit lights a fire in the open air on that land; or
(c) a person without a permit constructs or installs an incinerator on that land.

Penalty: $1,000 for first offence
$2,000 for second or subsequent offence; with a daily penalty of $200 for each day the offence continues after convicted.

(6) This clause does not apply to:-

(a) a barbecue while such a barbecue is being used for cooking purposes; or
(b) a fire lit in the course of duty by an officer or member of the Country Fire Authority or the Department of Conservation and Natural Resources.

12. Other Prohibited Fires

(1) A person must not light a fire within the municipality generally so as to cause a nuisance to any other person.

Penalty: $1,000 for first offence
$2,000 for second or subsequent offence; with a daily penalty of $200 for each day the offence continues after convicted.

(2) A person must not allow the discharge from a chimney in a residential or built up area of any smoke, fumes or other substance which is likely to cause nuisance to any other person, property or animal.

Penalty: $1,000 for first offence
$2,000 for second or subsequent offence; with a daily penalty of $200 for each day the offence continues after convicted.

(3) A person must not within the municipality light a fire on land so as to burn or cause or allow to be burnt any noxious or toxic substance.

Penalty: $1,000 for first offence
$2,000 for second or subsequent offence; with a daily penalty of $200 for each day the offence continues after convicted.

(4) A person who is the owner or occupier of land on which a fire has been lit contravention of this clause is guilty of an offence.

Penalty: $1,000 for first offence

$2,000 for second or subsequent offence; with a daily penalty of $200 for each day the offence continues after convicted.

(5) A person who directs another person to light a fire in contravention of this clause is guilty of an offence.

Penalty: $1,000 for first offence
$2,000 for second or subsequent offence; with a daily penalty of $200 for each day the offence continues after convicted.

Extract from the Summary Offences Act 1966

Fire

11. Lighting of fires in the open air

(1) Except as provided in sub-section (2), a person must not-

(a) light or use a fire in the open air or carry when lighted any flammable material resulting in the destruction, damaging or endangering of the life or property of others; or

(b) leave a fire in the open air which that person has lighted or of which that person is in charge without leaving another person in charge of that fire.
Penalty: 25 penalty units or imprisonment for 12 months or both.

(2) Sub-section (1) does not apply to the owner or occupier of any land or a person acting under the direction of an owner or occupier of any land who burns any grass, stubble, weeds, scrub, undergrowth or any vegetation, wood or other flammable material in an area of land if-

(a) a fire-break of not less than 3 metres and cleared of all flammable material has been prepared around the perimeter of the area of land and

(b) at least two hours before burning is commenced, notice of intention to burn has been given to each owner or occupier of land contiguous to the area of land.

(3) This section does not apply in the country area of Victoria within the meaning the *Country Fire Authority Act 1958* during a fire danger period within the meaning of that Act.

(4) This section does not affect the right of any person to sue for and recover at common law or otherwise compensation for or in respect of any damage caused by reckless or negligent use of fire.

No. 6337 s. 21.
S. 11 amended by Nos 7854
s. 2, 7877 s. 2(2) S. R. No.
137/1974
reg. 2(b)(c), Nos
9019 s. 2(1), 9554
s. 2(2), substituted
by No. 50/1989
s. 51.

6: Permits to Burn

The Council will undertake annually a publicity program via the local press to highlight the responsibilities of permit holders and the consequences of non-compliance.

When burns are lit without permits the consequences can include unnecessary call-outs and a breakdown in the effective detection of genuine wildfires. A permit system identifies land-holders who may be contacted if important information becomes available prior to the ignition of the burn.

Permits to Burn shall be issued in accordance with the following guidelines. (Seasonal conditions may lead to the need to vary the requirements as listed).

Permits to Burn issued to Brigades or individuals will only be issued after written instruction have been received from the relevant Group Officers detailing specific details of light up times, permit duration and any other conditions deemed relevant. The Group Officers will only issue these instructions after consultation with the relevant Brigade Captains.

Alternatively permits to burn may be issued after a decision has been made resultant of a teleconference with CFA Region relevant Group Officers and MFPO's.

The procedure for obtaining permits to burn are as follows:

Permits to Burn shall only be issued for the burning of stubble and/or grass (not for general burning of rubbish and hard material).

The procedure for obtaining the Permits to Burn is advertised in the local newspapers. The advertisements detail the times and locations where permit applications can be made.

The issuing of permits is at the discretion of the Group Officers who will determine the duration of the permit after consultation with MFPO's.

No person is permitted to commence burning off until they have the actual Permit to Burn in their possession.

Permits conditions are as follows:

Where possible the Permit shall include the North East Region Vicmap book map number, grid reference, the road on which the property is located and the property number if applicable.

CFA policy requires that the Local CFA Brigade Tanker cannot be included in the minimum required fire control equipment as it may be called away.

The generally accepted minimum width of the required perimeter breaks being 3 m.

Where practical an appropriate form of communication must be carried.

The burning procedure shall be in full accordance with the conditions of the Permit to Burn and include if not already listed the following:

All breaks must be continually checked and patrolled during the burn off. Trees etc must be lit around as they are reached during the lighting runs and all burning materials must be extinguished as it reaches the break.

At the conclusion of all lighting all perimeter breaks, tree breaks etc must be checked and burning material must be extinguished.

Burnt paddocks must be checked **first thing** the following day, then again later that day.

If the following day is a Day of Total Fire Ban all fires must be extinguished by midnight.

Note
DSE is responsible for Fire Protection on Protected Pubic Land. A prohibited period applies all year round within State Forests, National Parks and other Protected Public Land.

In the Moira Shire all private property within 1.5 km of protected Public Land has been excised from the Fire Protected Area.

A landholder intending to burn off property adjacent to the Fire Protected Area must notify the Department of their intentions.