



ACT
Government

Transport Canberra and
City Services

FREEDOM OF INFORMATION COVERSHEET

The following information is provided pursuant to section 28 of the *Freedom of Information Act 2016*.

FOI reference: 21-092

Information to be published	Status
1. Access application	Published
2. Decision notice and schedule	Published
3. Documents	Published
4. Additional information identified	n/a
5. Fees	waived
6. Processing time (in working days)	27 days
7. Decision made by Ombudsman	n/a
8. Additional information identified by Ombudsman	n/a
9. Decision made by ACAT	n/a
10. Additional information identified by ACAT	n/a

From: [Paliaga, Nicolas](#) on behalf of [CMTEDD FOI](#)
To: [TCCS_FreedomOfInformation](#)
Subject: FW: Freedom of Information request - CMTEDDFOI2021-241
Date: Sunday, 12 September 2021 12:00:52 PM

OFFICIAL

Good morning team,
Can you please advise CMTEDDFOI if you accept full carriage of the below.
Kind regards,
Nic

Nicolas Paliaga | Freedom of Information, Reporting and Privacy Administrator | Information Access Team
Phone: 620 79267 | Email: Nicolas.Paliaga@act.gov.au
Corporate Management | Chief Minister, Treasury and Economic Development Directorate | ACT Government
Level 5, 220 London Circuit, Canberra City | GPO Box 158 Canberra ACT 2601 | act.gov.au



Please consider our environment before printing this e-mail.

From: [REDACTED]
Sent: Sunday, 12 September 2021 4:58 AM
To: CMTEDD FOI <CMTEDDFOI@act.gov.au>
Subject: Freedom of Information request

CAUTION: This email originated from outside of the ACT Government. Do not click links or open attachments unless you recognise the sender and know the content is safe.

Please find online enquiry details below. Please ensure this enquiry is responded to within fourteen working days.

Your details

All fields are optional, however an email address OR full postal address must be provided for us to process your request. An email address and telephone contact number will assist us to contact you quickly if we need to discuss your request.

Title: Mr

First Name:

Last Name:

Business/Organisation:

Address:

Suburb:

Postcode:

State/Territory: ACT

Phone/mobile: [REDACTED]

Email address: [REDACTED]

Request for information

(Please provide as much detail as possible, for example subject matter and relevant dates, and also provide details of documents that you are not interested in.)

Documents or relevant sections of documents relating to the speed limit on Brindabella Road. Specifically documents relating to the 60 km/h speed limit that commences from the intersection of the Cotter Road and ends approximately 250 metres north-east of the Cotter

Under the Freedom of Information Act 2016 I want to access the following document/s (*required field):

Catchment Carpark. Documents related to the proposal, implementation and ongoing continuance of the speed limit through to the present day. Documents related to the installation of signage, including the removal of the signs after the completion of the Cotter Dam in 2013 and their reinstallation in 2021 excluding the contacts and payments for doing so. Documents related to the nature of the speed limit i.e. whether it was intended to be temporary for the life of the dam building works. Documents should be between 2005 and the present day.

I do not want to access the following documents in relation to my request::

Documents relating to any of the other speed limits on Brindabella Road beyond approximately 250 metres north-east of the Cotter Catchment Carpark. With respect to the installation of signage, it is intended to seek only the government records as to the signage changes without the contracts to the tendering companies and excluding record of payment for the work done. These are not relevant to the request, which is focussed on the reasons for the signage changes. Incidental records of the speed zone e.g. as part of individual records of accidents - the request is focussed on the policy of and changes to the speed zone.

Thank you.
Freedom of Information Coordinator

Attention: [REDACTED]

By Email: [REDACTED]

Dear [REDACTED]

Freedom of Information Request - Reference 21-092

I refer to the access application you made under the *Freedom of Information Act 2016* (FOI Act) received by the Chief Minister, Treasury and Economic Development Directorate (CMTEDD) on 12 September 2021. Your application has been transferred to the Transport Canberra and City Services Directorate (TCCS) as TCCS manages the speed limit on our rural roads. This application requested access to:

- *“Documents or relevant sections of documents relating to the speed limit on Brindabella road. Specifically documents relating to the 60km/h speed limit that commences from the intersection of the Cotter Road and ends approximately 250 metres north-east of the Cotter Catchment carpark.*
- *Documents related to the proposal, implementation and ongoing continuance of the speed limit through to the present day.*
- *Documents related to the installation of signage, including the removal of the signs after the completion of the Cotter Dam in 2013 and their reinstallation in 2021 (excluding the contacts and payments for doing so).*
- *Documents related to the nature of the speed limit i.e. whether it was intended to be temporary for the life of the dam building works – documents should be between 2005 and the present day.”*

Timeframes

A decision on your application was due by 12 October 2021. I thank you for agreeing to an extension to 22 October 2021.

Authority

I am an Information Officer appointed by the Director-General under section 18 of the Act to deal with access applications made under Part 5 of the FOI Act.

Decision on access

A search for documents has been undertaken by Roads ACT and a total of 22 documents have been identified as relevant to your request. The documents contain some locations that are not relevant to your application but have been included as it has been captured as part of a signage audit undertaken in 2021 and a speed limit review carried out in 2010.

I have found that some of the information within these documents is, on balance, contrary to the public interest to disclose. I have decided to provide you with:

- full access to 21 documents
- partial access to 1 document.

My decision is detailed further in the following statement of reasons. I have included a schedule of the documents at Attachment A. The documents are enclosed at Attachment B with deletions applied to information which is contrary to the public interest to disclose.

Statement of Reasons

In making my decision on disclosing government information, I must identify all relevant factors in schedule 2 of the FOI Act and determine, on balance, where the public interest lies. In reaching my access decision, I have taken the following into account:

Factors favouring disclosure (Schedule 2.1)

- Section 2.1 (a)(i) - promote open discussion of public affairs and enhance the government's accountability;
- Section 2.1(a)(ii) - inform the community of the government's operations, including the policies, guidelines and codes of conduct followed by the government in its dealings with members of the community;
- Section 2.1 (a)(iv) - ensure effective oversight of expenditure of public funds; and
- Section 2.1 (a)(viii) reveal the reason for a government decision and any background or contextual information that informed the decision.

Factors favouring non-disclosure (Schedule 2.2)

- Section 2.2 (a)(ii) – prejudice the protection of an individual's right to privacy or any other right under the *Human Rights Act 2004*.

I find that it is in the public interest to release most of this information. However, I have found some information within the relevant documents to be contrary to the public interest to disclose.

In reviewing the information in scope of your application, the personal information of third parties was identified, including the names and contact details of these parties. Deletions have been applied to information where it would prejudice the protection of an individual's right to privacy or any other right under the *Human Rights Act 2004*.

Factors in favour of release can still be met while protecting the personal information of these individuals. The protection of this information outweighs disclosure in this instance.

Charges

I have waived the fee as the number of pages being release marginally exceeds the fee-free threshold.

Online publishing – disclosure log

Under section 28 of the Act, TCCS maintains an online record of access applications called a disclosure log. Your original access application, my decision and documents will be published in the TCCS disclosure log from 3 days after the date of this decision.

Your personal contact details will not be published. You may view the TCCS' disclosure log at http://www.tccs.act.gov.au/about-us/freedom_of_information.

Ombudsman review

My decision on your access request is a reviewable decision as identified in Schedule 3 of the Act. You have the right to seek an Ombudsman review of this outcome under section 73 of the Act within 20 working days from the day that my decision is published in TCCS' disclosure log or a longer period allowed by the Ombudsman.

If you wish to request a review of my decision, you may write to the Ombudsman at:

The ACT Ombudsman
GPO Box 442
CANBERRA ACT 2601
Via email: actfoi@ombudsman.gov.au

ACT Civil and Administrative Tribunal (ACAT) review

Under section 84 of the Act, if a decision is made under section 82 on an Ombudsman review, you may apply to the ACAT for review of the Ombudsman decision.

Further information may be obtained from ACAT at:

ACT Civil and Administrative Tribunal
Level 4, 1 Moore Street
GPO Box 370
CANBERRA CITY ACT 2601
Telephone: (02) 6207 1740
www.acat.act.gov.au

If you have any queries concerning the directorate's processing of your request, or would like further information, please contact the TCCS FOI team on (02) 6207 2987 or email to tccs.foi@act.gov.au.

Yours sincerely



Kristine Scheul
Information Officer

 October 2021

FREEDOM OF INFORMATION REQUEST SCHEDULE

Please be aware that under the *Freedom of Information Act 2016*, some of the information provided to you will be released to the public through the ACT Government's Open Access Scheme. The Open Access release status column of the table below indicates what documents are intended for release online through open access.

Personal information or business affairs information will not be made available under this policy. If you think the content of your request would contain such information, please inform the contact officer immediately.

Information about what is published on open access is available online at: https://www.tccs.act.gov.au/about-us/freedom_of_information/disclosure-log

File number		WHAT ARE THE PARAMETERS OF THE REQUEST				
FOI – 21-092		Speed limit on Brindabella Road				
Ref No	No of Folios	Description	Date	Status	Reason for non-release or deferral	Open Access release status
FOI Request - 21-092						
1	1-4	Email - Subject - Brindabella Road	10 September 2020	Full access	Not applicable	Documents to be published
2	5	Email with attachment - Subject - Brindabella Road	16 September 2020	Full access	Not applicable	
3	6-75	Attachment to email - Draft Speed limits Review Part A 06 January 2010	6 January 2010	Partial access	Schedule 2, Section 2.2 (a)(ii) Prejudice the Protection of an Individual's Right to Privacy	
4	76	Email with one attachment - Subject Folded Speed sign review - meeting 2	25 February 2021	Full access	Not applicable	
5	77-78	Attachment - Rural Roads Speed Signage - 2nd meeting notes 25 Feb 2021	25 February 2021	Full access	Not applicable	

6	79-80	Email	25 February 2021	Full access	Not applicable
7	81-90	TC-732077_FINAL LAYOUT_Part3	9 March 2021	Full access	Not applicable
8	91-95	Defects - Rural Road Speed Sign review	Document created on 10 March 2021	Full access	Not applicable
9	96	IMG_0611 - taken on 16 March 2021	16 March 2021	Full access	Not applicable
10	97	IMG_0647 taken on 16 March 2021	16 March 2021	Full access	Not applicable
11	98	IMG_0676 taken on 16 March 2021	16 March 2021	Full access	Not applicable
12	99	IMG_0978 taken on 16 March 2021	16 March 2021	Full access	Not applicable
13	100	IMG_1231 taken on 16 March 2021	16 March 2021	Full access	Not applicable
14	101	IMG_1238 taken on 6 April 2021	6 April 2021	Full access	Not applicable
15	102	IMG_1247 taken on 16 March 2021	16 March 2021	Full access	Not applicable
16	103	IMG_1254 taken on 16 March 2021	16 March 2021	Full access	Not applicable
17	104-105	Rural Roads Speed Signage - 3rd Meeting Notes 29 March 2021	29 March 2021	Full access	Not applicable
18	106	Details of signs to be erected	Document created on 6 April 2021	Full access	Not applicable

19	107	Number of folded Speed Signs to be erected	Document created on 6 April 2021	Full access	Not applicable	
20	108	Email with attachment - subject - Brindabella Road speed zone request	23 September 2021	Full access	Not applicable	
21	109	Attachment - Brindabella speed zone	23 September 2021	Full access	Not applicable	
22	110-113	Advisory Note	14 March 2019	Full access	Not applicable	

Bruan, Nicole

From: Potapowicz, Pawel
Sent: Thursday, 10 September 2020 10:55 AM
To: Pincombe, Neil; Mehta, Jayesh; Vikneson, Jayanthi; Islam, Shahidul
Cc: Wilson, Adam
Subject: RE: Brindabella Road

OFFICIAL

Hi All

I think we should review this, given the fact that this road was supposed to be 60 anyway.

Regards
 Pawel

From: Pincombe, Neil <Neil.Pincombe@act.gov.au>
Sent: Thursday, 10 September 2020 10:53 AM
To: Potapowicz, Pawel <Pawel.Potapowicz@act.gov.au>; Mehta, Jayesh <Jayesh.Mehta@act.gov.au>; Vikneson, Jayanthi <Jayanthi.Vikneson@act.gov.au>; Islam, Shahidul <Shahidul.Islam@act.gov.au>
Cc: Wilson, Adam <Adam.Wilson@act.gov.au>
Subject: RE: Brindabella Road

OFFICIAL

Hi,

Shahidul is managing the flip-down sign/cycle event signage. They currently show 80kph as normal, and 60kph when flipped over for an event?

Regards,
 Neil

From: Potapowicz, Pawel <Pawel.Potapowicz@act.gov.au>
Sent: Thursday, 10 September 2020 10:44 AM
To: Mehta, Jayesh <Jayesh.Mehta@act.gov.au>; Vikneson, Jayanthi <Jayanthi.Vikneson@act.gov.au>
Cc: Wilson, Adam <Adam.Wilson@act.gov.au>; Pincombe, Neil <Neil.Pincombe@act.gov.au>
Subject: RE: Brindabella Road

OFFICIAL

Hi All

About ten years ago now, this section of road was recommended for 60 from Uriarra village 80 down to Paddy's River/Cotter.

If this is not in the system could we please raise MNW and update the grid to reflect the initial intent for this section of road.

I noticed that the passing distance signs have recently been installed on this road. These should also be in the grid.

There is another project which will install flip signs for events in this area. What is the speed limit for the flip signs?

Jayanthy can you please coordinate the upcoming TCD changes for this section of road please.

Regards
Pawel

From: Mehta, Jayesh <Jayesh.Mehta@act.gov.au>
Sent: Thursday, 10 September 2020 10:22 AM
To: Vikneson, Jayanthy <Jayanthy.Vikneson@act.gov.au>
Cc: Potapowicz, Pawel <Pawel.Potapowicz@act.gov.au>; Wilson, Adam <Adam.Wilson@act.gov.au>
Subject: RE: Brindabella Road

OFFICIAL

Dear Pawel/Jayanthy,

Good Morning as you know that Rural grid R3 due to some how this dwg file is corrupt which mentioned by My and they are trying to recover this file.

So I am sending you pdf copy for both locations.

Please have a look these are ok or not?

Thanks,
Jayesh

From: Vikneson, Jayanthy <Jayanthy.Vikneson@act.gov.au>
Sent: Thursday, 10 September 2020 9:11 AM
To: Mehta, Jayesh <Jayesh.Mehta@act.gov.au>
Cc: Potapowicz, Pawel <Pawel.Potapowicz@act.gov.au>
Subject: RE: Brindabella Road

OFFICIAL

Hi Jayesh,

I remember Margo looking at reduction of speed here as part of a Ministerial commitment – might have been a few years ago – 2017/18???

Regards,
Jayanthy

From: Mehta, Jayesh <Jayesh.Mehta@act.gov.au>
Sent: Wednesday, 9 September 2020 6:05 PM
To: Potapowicz, Pawel <Pawel.Potapowicz@act.gov.au>
Cc: Vikneson, Jayanthy <Jayanthy.Vikneson@act.gov.au>
Subject: RE: Brindabella Road

OFFICIAL

Hi Pawel,

Thanks for your email.

Yes I remember this job may be Margo or Jayanthi created MNW for this job.

I tried to open Rural Grid R1 and R3 but due to somehow I can't open it.

Tomorrow I will try again and let you know.

Meanwhile Jayanthi do you know in which year this job was completed?

Due to non-availability of TCD Register bit hard to find out.

I will try to find out something tomorrow.

Thanks,
Jayesh

From: Potapowicz, Pawel <Pawel.Potapowicz@act.gov.au>
Sent: Wednesday, 9 September 2020 1:44 PM
To: Mehta, Jayesh <Jayesh.Mehta@act.gov.au>
Subject: Brindabella Road

OFFICIAL

Hi Jay

Could you please send me a TCD for Brindabella Road. I am interested in the speed signs.

Recently a **100** sign was installed as you are leaving Uriarra Village going East, its 80 the other way.
I recall we would have changed this to 60 years ago???





I would like to know what is on the grid in this area and also on the bottom of Brindabella Road...?



Thank you

Pawel Potapowicz | Assistant Director | Traffic Management and Safety
Phone: 02 6205 0946 | Email: pawel.potapowicz@act.gov.au Roads ACT, City Operations | Transport Canberra and
City Services Directorate | ACT Government
480 Northbourne Avenue, Dickson 2602 | GPO Box 158 Canberra ACT 2601 | www.act.gov.au www.tccs.act.gov.au

Bruan, Nicole

From: Vikneson, Jayanthy
Sent: Wednesday, 16 September 2020 11:10 AM
To: Kim, David; Piper, Graham; Islam, Shahidul
Subject: Brindabella Road
Attachments: Draft Speed limits Review Part A 06 January 2010.pdf

OFFICIAL

Hi David, Graham & Shahidul,

Thanks for the discussion earlier!

Attached is the speed limit review done in 2010.

The Brindabella Rd review is at Section 5.6 (pages 25 – 27); and Section 5.6.20 recommends speed limit reduction to 60km/h between Uriarra Settlement and Paddys River Road.

Pawel advises that a 60km/h speed reduction across Uriarra Village was implemented in 2011/12, with reduction to 80km/h for the rest of the recommended section. However, apparently this is not the signage on site and we have no record of the lower speed limit signage on our TCDs.

Hence, the request to do a road sign audit (of all signage) on all of Brindabella Rd as we have since also implemented other signage such as warning signage on the curves, etc.

As discussed,

- Shahidul to provide existing TCD plans to David.
- Graham and David will start off with the audit of the 1st section as a priority – from Cotter to just past Uriarra Village – and provide mark ups of wrong/missing signage to Shahidul.
- Shahidul to liaise with Asset Information on TCD grid updates.
- Graham and David to continue with remaining sections whenever time permits.
- David to implement the 60km/h speed reduction under MNW.

Kindly note – no urgency for this project, but still needs to be done. So please see if you can fit in a some time over the next 6 – 8 weeks for its completion.

Thanks again Team!!! 😊

Regards,
Jayanthy

From: Potapowicz, Pawel <Pawel.Potapowicz@act.gov.au>
Sent: Tuesday, 15 September 2020 11:46 AM
To: Vikneson, Jayanthy <Jayanthy.Vikneson@act.gov.au>
Subject: Draft Speed limits Review Part A 06 January 2010.pdf

OFFICIAL

Hi Jayanthy

Please see attached document and coordinate the audit.

Regards
Pawel



REVIEW OF ARTERIAL ROAD SPEED LIMITS IN THE ACT

DRAFT REPORT



Consulting Engineers



REVIEW OF ARTERIAL ROAD SPEED LIMITS IN THE ACT

DRAFT REPORT



Consulting Engineers

Prepared by: _____
[Redacted] MIEAust

Checked by: _____
[Redacted]

R D Gossip Pty Ltd Pty Ltd
2 Lawry Place
Macquarie ACT 2614
Australia
Telephone :+61 2 6251 6313
Facsimile :+61 2 6253 1989
Date : 6 January 2010
Reference : Report RG 08038-1
Status : Final Draft



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1. PREAMBLE

1.1. Objective

1.1.1. The objective of this study is to investigate the appropriateness of existing speed limits on all ACT arterial roads and to provide advice on signage changes required to upgrade speed limit signage to meet Australian Standard requirements.

1.2. Background

1.2.1 In meeting its responsibilities for managing ACT roads, Roads ACT has produced the ACT Road Safety Strategy for 2007-2010 incorporating the ACT Road Safety Action Plan (the Action Plan) for 2007 and 2008.

1.2.2 The Action Plan includes a requirement to

- Review the appropriateness of speed limits for particular lengths of road; and
- Review current arrangements for speed limit signage including the possible use of pavement markings.

1.2.3 This study is intended to meet this requirement of the Action Plan.

1.3. Scope

1.3.1 The scope of work under this brief includes the study requirements described below and headed Parts A & B together with associated reports and consultation requirements as outlined in the brief.

1.3.2 This report covers tasks specified in Part A of the brief:

PART A

- Check the appropriateness of existing speed limits on all arterial roads in the ACT, while considering the current development of the relevant Australian Standards, the Austroads Guide to Traffic Management Part 5: Road Management and the Austroads Guide to Road Safety Part 3: Speed Limits and Speed Management.
- Using TCD drawings check whether these speed limits are adequately signposted, including whether the location and size of these signs conform to current standards (including repeater signs).
 - Indicate the appropriate way to signpost these limits.
 - Prepare preliminary sketch plans highlighting the location of additional signs (if needed) for approval by T&MS and prepare cost estimates.
 - On approval of these sketch plans prepare TCD drawings for implementation.
- Once approved and implemented, prepare a data base and colour-coded map highlighting the various speed limits on the arterial road network.

PART B

- Review the use of pavement markings to complement the use of speed limit signs, including:
 - relevant interstate and overseas practices;
 - any previous evaluations of pavement speed markings;
 - potential ACT uses for pavement speed markings, including costs and benefits; and
- a recommended ACT approach.

1.4. The Project Team

1.4.1. The client is Roads ACT and the client's representative is Pawel Potapowicz.

1.4.2. The R D Gossip Pty Ltd project team is:



Project Manager / Senior Traffic Engineer
Senior Traffic Engineer
Senior Technical Officer
Draftsperson

2. METHODOLOGY

2.1. Introduction

- 2.1.1. Part A of the study involved a combination of field survey, desk top assessment and field verification detailed below.
- 2.1.2. In recent years there has been significant progress and development in the philosophy behind the setting of appropriate speed limits for particular roads and process for determining those limits. In particular Austroads has recently produced two relevant publications. These are a Guide to Road Safety Part 3: Speed Limits and Speed Management (GRS3) and a Guide to Traffic Management Part 5: Road Management (GTM5).
- 2.1.3. GRS3 outlines the philosophy behind setting appropriate speed limits. It focuses on the importance of speed management and introduces the concept of a Safe System approach to road safety.
- 2.1.4. The Safe System approach promotes the desirability of setting speed limits so that they appropriately reflect a range of factors including crash history, operating performance, road infrastructure, road geometry and roadside development. The philosophy can be summarised as attempting to ensure that speed limits are not set at levels which are higher than appropriate based on the premise that the lower the speed of travel the lower the injury consequences of accidents when they occur.
- 2.1.5. GTM5 develops the philosophy of GRS3 (the Safe System approach) by outlining a process for setting speed limits. In its introduction to the section on speed limits it states that speed limits need to be:
- Credible and compatible with road user expectations
 - Consistently applied throughout the road network; and
 - Clear and unambiguous.
- 2.1.6. It elaborates on the difficulties of balancing the tensions between a community's desire for safety with a concern about reduced amenity associated with lower travel speeds. It restates the philosophy that the functional, geometric and operational characteristics of a road will usually reflect the appropriate speed zone for a particular road. It also notes that lower speed limits might be assigned where particular parts of the network have a high probability of conflict between various road users and hence a higher probability of crashes. Some examples are provided including CBDs and roads abutting schools and shopping centres in urban areas.
- 2.1.7. The new Australian Standard AS 1742.4-2008 Manual of Uniform Traffic Control Devices Part 4: Speed Controls adopts this philosophy for setting speed limits and takes its application a step further by providing practical and specific guidance on how the speed limit setting process should be applied. In the forward to the standard it is stated that "At the time of publication of this standard the specified relationship between road function, application and corresponding speed limit was deemed to be consistent with the Safe Systems approach".
- 2.1.8. There is significant correspondence and consistency between GTM5 and AS1742.4 with key sections outlining the objectives of speed management, general principles and the establishment of appropriate speed limits being closely correlated.

REVIEW OF ARTERIAL ROAD SPEED LIMITS IN THE ACT

- 2.1.9. The assessments in this report have been based on the range of concept, philosophy and process presented in the three documents. The specific recommendations are derived by the process outlined in GTM5 and interpreted in relation to the specific guidance provided in AS1742.4.
- 2.1.10. It should be noted that there are some locations where detailed design factors in addition to the issues covered in GTM5 and AS1742.4 could become relevant to the application of a speed limit on a particular section of road. Such detail design issues might include geometric details such as sight distance constraints and localised cross section requirements for example in relation to on road bicycle facilities. The recommendations of this study do not address such detail design factors. The expectation is that the detailed design of any recommendations would take these factors into account.
- 2.1.11. Also, a relevant factor in the timing of changes to speed limits is any ongoing roadworks particularly upgrades. It would not be sensible to increase the speed limit while decreased speed limits associated with any construction works temporarily apply and consequently it might be appropriate to time the introduction of altered limits to correspond to completion of any upgrade works.

2.2. Process Adopted

- 2.2.1. The study was to cover all arterial roads in the ACT. This included the urban arterials as well as most of the rural roads (sealed and unsealed) in the ACT.
- 2.2.2. Plan bases were prepared. For the urban area arterials these were based on existing TCDs.
- 2.2.3. All roads were then driven and information collected on existing signage and speed limits. This included recording chainages of existing signs and road intersection points for future detail design purposes.
- 2.2.4. At the same time a preliminary assessment was made of road environment features which are a key determinant in the selection of appropriate speed limits under the revised Austroads and Australian Standard approaches. Consideration was given to travel speeds, traffic volumes and traffic patterns and where relevant to crash history.
- 2.2.5. The primary assessment was made based on AS 1742.4 Table 2.1. This assessment was then considered in the context of whether or not adjustments were appropriate as detailed in AS1742.4 and in particular Clause 2.3.3 and Appendix A together with other relevant clauses.
- 2.2.6. These adjustment factors include roadside development, road characteristics such as width or type of construction, traffic characteristics including the presence of significant numbers of non-motorised traffic and crash history. AS1742.4 Appendix A provides more comprehensive and detailed elaboration of these factors.
- 2.2.7. A spreadsheet was then prepared which identified each section of each arterial road based on obvious changes to the road environment or characteristics of the road.
- 2.2.8. This spreadsheet identified the existing speed limit for each section and proposed a speed limit for each section. The basis for each speed limit assessment is then identified for each section of road whether the proposal is to retain the existing speed limit or to change it. The range of key factors considered relevant in the recommendation for each section are detailed in the table below.

REVIEW OF ARTERIAL ROAD SPEED LIMITS IN THE ACT

- 2.2.9. The general approach proposed in GTM5 and AS1742.4 is to identify the speed limit suggested by basic considerations of road type and road environment. Then consideration is given as to whether or not there are valid reasons consistent with the guides and standard for reducing that speed limit or for altering the existing limit to reflect those factors.
- 2.2.10. The arterial roads covered in this study are as identified in the ACT Road Hierarchy plans prepared by R D Gossip initially in 2002 and subsequently revised in 2006.

BASIS OF SPEED LIMIT ASSESSMENT	
Identifier used in Table in Attachment 1	Reasons for the Proposed Speed Limit for Individual Road Sections
A	Speed limit assessed based on GTM5 and AS 1742.4 Table 2.1 where no requirement to modify the primary assessment was identified
B	Speed limit assessed based on GTM5 and AS 1742.4 Table 2.1 but reduced primarily due to considerations of roadside development (ie is direct access allowed, is there adjacent development such as housing, industry or shops with the potential to generate significant turning movements at intersections or is the adjacent development an open space buffer area)
C	Speed limit assessed based on GTM5 and AS 1742.4 Table 2.1 but reduced primarily due to considerations of road characteristics including crash history (ie are accidents occurring and if so is of traffic speed a key relevant factor in these accidents).
D	Speed limit assessed based on GTM5 and AS 1742.4 Table 2.1 but reduced primarily due to considerations of traffic characteristics (ie is there a significant mixture of local and/or accessing traffic with traffic using the arterial road as part of a longer urban trip for example where an arterial road passes a Group or Town Centre)
E	Existing speed limit does not meet minimum length requirement for speed zones prescribed in AS1742.4
F	AS 1742.4 Appendix 3.3 and GTM5 s5.2 specify that speed limits should not be reduced for single intersections
G	Buffer Zone modifications generally to apply consistent application of "Speed Zone AHEAD" option where there is a significant reduction (30 km/h or greater) in the posted speed limit
H	Use of "End 80 km/h" rather than 100 km/h at the start of a rural default zone where immediate road characteristics are unsuitable for 100 km/h limit

Table 2.1 detailing the reasons for proposed speed limits to be read in conjunction with Attachment 1

2.3. Desktop Assessment

- 2.3.1. Summaries were prepared of the key features of the standard and guidelines specification of speed limit determination and signage particularly of the detail in AS1742.4 Section 3 and Appendix C. This was done in a manner that assisted the process of desktop assessment. The standard is written in the form of statements of where particular signage components should be used. This was converted into a format that pulled together signage requirements based on different types of location.
- 2.3.2. For example the standard specifies sign size and gating requirements. A tabulation was prepared that summarised signage requirements (eg size and gating requirements) for particular types of locations.
- 2.3.3. A desktop assessment was then undertaken to compare existing arrangements with the requirements of AS1742.4 and the Austroads publications and any proposed changes were recorded.
- 2.3.4. The information compiled on the spreadsheets has been drafted onto bases to produce the required Preliminary Sketch Plans. They also provide a visual display of the extent and spread of changes required to meet the requirements of the standard.
- 2.3.5. The assessment of rural roads was more simple than for urban arterials. In most cases this involved checking whether or not there was a case for any variation from the rural default limit as well as ensuring that there was no signage inconsistent with the Australian Standards such as advisory speed signs on gravel roads.

3. SIGNAGE ASSESSMENT

3.1. General Signage Issues Identified in the Field Assessments

- 3.1.1. A small number of general variations from the Australian Standard in relation to speed limit signage were identified in the surveys. These involved many locations throughout the ACT.
- 3.1.2. In most locations signs have been positioned consistently with the locational criteria specified in AS1742.4 and AS 1742.2.
- 3.1.3. One notable exception to this has been the tendency to collocate speed limit signs with other signage, particularly on road bicycle lane signage. AS 1742.4 specifies that speed limit signage should stand alone and not be located on the same post as other signage. Where collocation has been identified it is recorded in the spreadsheet at Attachment 2.
- 3.1.4. The most common variations from the Australian Standard noted in the surveys were in relation to the provision of second (gating) signs where speed zones are commencing or where repeater signs are provided after major intersections. These are discussed below.
- 3.1.5. Additionally Roads ACT has questioned the relevance of the location of speed limit signs particularly in relation to the potential for signage to become a hazard for vehicles, particularly motorbikes. We are not aware of any reference to this in the relevant Australian Standards but common sense should be exercised in any particular sign placement.
- 3.1.6. Under normal circumstances speed limit signs would be located immediately after but beyond the extremity of an intersection on the expectation that a driver needs to complete negotiation of an intersection before being provided with further regulatory information. Detail design of sign locations should reflect this consideration.

3.2. Repeater Signs after Important Intersections

- 3.2.1. In relation to repeater signs after major intersections the practice in the ACT varies between locations. AS1742.4 specifies that gated speed limit signs shall be provided after important intersections. The definitions incorporated into that standard state that the term “shall” indicates a mandatory requirement. In many locations in the ACT repeater signs are not provided and where they are, they are frequently not gated.
- 3.2.2. On two way carriageways in the ACT the tendency has been not to provide a second speed limit sign on the right side of the carriageway. It is not clear whether this is a formally adopted policy position or rather reflects a general practice that has developed in relation to approvals of Traffic Control Devices (TCDs).
- 3.2.3. The Australian Standard AS 1742.2 requires at 3.2.7(d) that repeater signs “shall be provided just beyond important intersections”. The standard does not define what is meant by an important intersection. However in a non-ACT context it is common to have frequent occurrences of quite minor roads intersecting with arterial roads. In such locations a median island on the arterial road often limits the movement opportunities to/from the minor road to left in/left out.
- 3.2.4. It would be sensible to interpret the requirement in AS1742.4 to be clarifying that it is not a requirement to provide speed limit repeater signage after every such intersection.

- 3.2.5. In the ACT context, most intersections along arterial roads in areas other than old Canberra could be described as important intersections. It is unusual to have roads other than major or minor collectors intersecting with arterial roads and it is usual that full movements are allowed at such intersections.
- 3.2.6. For the purposes of this review, any intersection of an arterial road with another arterial or a major or minor collector has been interpreted as an important intersection.
- 3.2.7. Another common feature of the ACT road network is the staggered T arrangement where two closely spaced T intersections have been constructed to avoid a cross intersection. For the purposes of this review, where the distance between such intersections is short, then the dual intersections have been considered to be a single intersection complex and the repeater sign obligation is met by provision of signs beyond the intersection complex.

3.3. Signage identifying the Commencement of a Speed Zone

- 3.3.1. AS1742.4 specifies that signage commencing a speed zone should be gated ie signs should be provided on both sides of the carriageway. The definitions incorporated into that standard state that the term "should" indicates a recommendation but is non-mandatory.
- 3.3.2. There are many locations in the ACT where this has not been done.
- 3.3.3. A particular category of location where this has not been done is on two lane two way roads. Although not a fixed policy it appears that there has been concern in the past that the provision of a sign on the right side of a carriageway might convey an impression to drivers that the carriageway is a one way section of road.
- 3.3.4. It is not clear if there has been any formal assessment of this concern or of accidents occurring as a result. Additionally it is a clear practice in other jurisdictions, particularly in NSW to provide gated signs on two way carriageways.
- 3.3.5. In meeting that requirement of our brief, we have identified all locations where gated signs are required or recommended. In meeting that requirement we have also identified those locations where the gating is proposed on a single carriageway road. This will allow ready identification of those sites that would be deleted from the recommended signage changes if a decision was taken to continue with the practice of not gating signs on two way single carriageway roads.

3.4. Speed Limit Buffers

- 3.4.1. AS1742.4 provides two options for situations where there is a significant reduction in the speed limit. The first is by use of a speed zone of intermediate value. The second is by use of a "Speed Limit AHEAD" sign.
- 3.4.2. While the standard provides for either to be used, it also suggests that only one of these options is used throughout a region. It seems reasonable to interpret the Australian Capital Territory as a region.
- 3.4.3. In NSW, the practice preferred by the NSW Roads and Traffic Authority is to use the "Speed Limit AHEAD" option. It seems that this option is considered to be more consistent with the principle of setting speed limits to provide to drivers wherever possible a clear correlation between road environment and speed limit. In circumstances where the limit is changing from

say 100 km/h to 60 km/h, there is not usually a short section of road where an 80 km/h limit is more appropriate than the higher or lower limit.

- 3.4.4. Conversely providing advance warning of a reduction in a speed limit is considered to be more effective in modifying travel speeds.
- 3.4.5. In the ACT both options have been used. However there are only a small number of locations where speed limits reduce more than 30 km/h. A notable example is the approach to the Tharwa Bridge where there are two intermediate speed limits before the 20 km/h limit applicable across the bridge is reached. This location is discussed in more detail later in this report.
- 3.4.6. The logic behind use of the "Speed Limit AHEAD" sign is compelling. Conversely the notion behind an interim reduced speed limit which is difficult, if not impossible, to enforce in any case seems inherently flawed.
- 3.4.7. This report then recommends use of the "Speed Limit AHEAD" option as a general rule but notes that both are acceptable under the standard.

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4. ASSESSMENT OF APPROPRIATE SPEED LIMITS

4.1. Existing Speed Limits

- 4.1.1. As a general observation, the road hierarchy in the ACT is quite well defined. Most of the road infrastructure has been planned, designed and constructed to reflect this road hierarchy. Even in the original Griffin plan for Canberra there is a clear differential between local access roads and roads that serve broader functional purposes.
- 4.1.2. The latest approach to the setting of speed limits for particular sections of road is based on the philosophy and process detailed in GRS3, GTM5 and AS1742.4 and summarised in Section 2 of this report.
- 4.1.3. There is a clear intention that limits should be set at the lowest level which is appropriate for the functional and geometric characteristics of a road and which drivers will recognise as sensible and warranted. Provided that there is consistency between road geometry and the configuration of intersections and accesses and the speed limit posted, then the expectation is that higher levels of driver compliance will result.
- 4.1.4. In typical Australian cities, there are frequent examples of roads whose function and scale have altered dramatically over time and along which land uses can alter significantly within short distances. This often results in the setting of speed limits intended to improve road capacity but which are then sometimes too high to be compatible with the road environment and the range of people affected by it.
- 4.1.5. While the speed of traffic using such roads might be quite high, that high speed usage (often characterised as the measured 85th percentile speed) does not in itself provide a sound basis for the setting of the speed limit. The revised Australian Standard and Austroads Guidelines emphasise this and promote the approach that the road function and environment should provide the primary determinant for setting speed limits.
- 4.1.6. In the ACT, most of the arterial road network has been planned and designed to separate arterial roads from local access and activity not directly associated with arterial road function. This study has not identified many locations where the existing speed limit should be reduced to provide a sensible match with adjacent road environment.
- 4.1.7. On the other hand a number of locations have been identified where the existing speed limit is assessed as not being appropriate and where some change is recommended. These particular locations are discussed in the following sub-sections.

4.2. Gungahlin Drive - Barton Highway to Glenloch Interchange (GDE)

- 4.2.1. Gungahlin Drive between the Barton Highway and the Glenloch Interchange is a freeway standard road as defined in GRS3 (a high standard divided road whose primary function is to carry high volumes of traffic) and AS1742.4 (a divided highway for through traffic with full or partial control of access and generally with grade separation at intersections). There is no direct access from adjacent land uses and all intersections are grade separated. We understand that the alignment was designed to a 100 km/h standard.
- 4.2.2. The GDE along this length is currently signposted with an 80 km/h speed limit.

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- 4.2.3. AS 1742.4 provides that “The primary determination of the speed limit for a particular length of road shall be by road function and application in accordance with the hierarchy of speed limits listed in Table 2.1 and further reference to Appendix A as appropriate.” The standard allows for that limit to be adjusted up or down if circumstances warrant it.
- 4.2.4. Table 2.1 specifies that the limit for an urban expressway, described as a road with full control of access and grade separated interchanges, should be 90 or 100 km/h. GTM5 (Table 5.4) identifies that the typical speed limit for this type of road in Australia is 100km/h
- 4.2.5. The GDE meets the definition of an urban freeway. In relation to potential justification for adjusting this assessment, the following factors have been assessed

Relevant factor	Comment
Roadside development	There is no roadside development with direct access to this road and the existing development is sparse. AS1742.4 Cl 2.3.3(b)(i) suggests that less development over an appreciable length may warrant an increase in speed limit.
Road characteristics	There are width constrictions in some sections with concrete barrier in the centre and tight sections between safety barriers on bridges. This implies some reduction in the limit as otherwise assessed.
Traffic characteristics	The road incorporates on road cycle facilities but actual cycle volumes are not high. There is no pedestrian use of the road.

- 4.2.6. Considering these factors suggests that some reduction in the assessed 100 km/h speed limit might be warranted in recognition of the localised narrow sections. AS1742.4 states that such adjustments shall be limited to +/- 10 km/h and on that basis it is concluded that the appropriate speed limit should be 90 km/h.
- 4.2.7. The localised narrow sections occur in a range of locations along this length of road. This implies that the 90km/h limit could be applied over the whole length of the road from the Barton Highway to the Glenloch Interchange.
- 4.2.8. The length of this road between Belconnen Way and the Glenloch interchange has recently been widened to generally provide two traffic lanes in each direction. This section of road could operate satisfactorily if the limit was set at the assessed speed for roads of this nature ie 100 km/h. Additionally, this would be consistent with the limit on the Tuggeranong Parkway which is the extension of this road south of the Glenloch Interchange.
- 4.2.9. However the narrow nature of the carriageway through the Glenloch interchange warrants the reduction to 90 km/h discussed above. It is considered that raising the limit to 100km/h in the section between Belconnen Way and the Glenloch Interchange but having a 90 km/h limit north of Belconnen Way and through the interchange introduces an undesirable variation in speed limits over a relatively short section of road.
- 4.2.10. Based on the above we **recommend** that the limit be set at 90 km/h over the full length of this section of road.
- 4.2.11. Clearly this raises the limit from the existing 80 km/h limit. Anecdotally it appears that motorists generally are of the view that the existing 80 km/h speed limit on this road is set too low. The

operational characteristics of this road, based on the “measured” 85th percentile speed, are 85km/h northbound and 87.3 km/h southbound.

- 4.2.12. It should be noted that the 85th percentile speed as calculated from automatic counter data in the ACT can be expected to underestimate the 85th percentile speed because it assumes that the speed of travel of every vehicle represents the unrestrained free flow speed of that vehicle. That assumption is not necessarily valid for any vehicle other than the lead vehicle in a platoon of vehicles.
- 4.2.13. It is quite possible, given the extent of platooning on that road even in off peak periods that the true 85th percentile speed is at or above 90 km/h.
- 4.2.14. If that is the case then it seems clear that the existing limit is contravening one of the key General Principles for setting speed limits stated in GTM5 s5.1 and AS1742.4 Cl 2.1.2.(b) namely “The speed limit shall not be so low that a significant number of drivers will not be able to understand the reason for it and hence tend not to observe it.”
- 4.2.15. If/when the speed limit is increased on this section of road care needs to be exercised at cross section pinch points, particularly bridges, to ensure that the on road cycle lane has adequate width or is otherwise appropriately treated.
- 4.2.16. A relevant factor in the timing of changes to the speed limit on this road is the ongoing roadworks upgrading the road to two lanes in each direction. It would not be sensible to increase the speed limit while decreased speed limits associated with the construction works temporarily apply and consequently it might be appropriate to time the introduction of altered limits to correspond to completion of the upgrade works.

4.3. Glenloch Interchange

- 4.3.1. The Glenloch Interchange is a grade separated intersection which has been posted with an 80km/h speed limit on each approach.
- 4.3.2. AS1742.4 Table 2.1 specifies that the limit for an urban expressway, described as a road with full control of access and grade separated interchanges, should be 90 or 100 km/h. GTM5 (Table 5.4) identifies that the typical speed limit for this type of road in Australia is 100km/h.
- 4.3.3. Some adjustment to this assessed speed could be warranted due to the road characteristics.
- 4.3.4. Traffic passing through this interchange in the east west direction has some geometric limitations which require some caution. We have been advised that the design resulted in available sight distance being limited to 80 km/h. If that is the case the speed limit for the east-west sections of Glenloch Interchange should remain as posted at 80 km/h.
- 4.3.5. However the north south routes through the interchange as well as the three main bypass ramps (GDE southbound to Parkes Way eastbound, Parkes Way westbound to Tuggeranong Parkway southbound and Tuggeranong Parkway northbound to William Hovell Drive westbound) do not have these road characteristics limitations.
- 4.3.6. Even so, given the traffic characteristics of this interchange environment, the speed limit warrants some reduction from the assessed 100 km/h limit.
- 4.3.7. We understand that the interchange is being modified in the context of the duplication of GDE. Assuming that the resulting modifications ensure that adequate merge distances are provided then we **recommend** that the speed limit through the interchange for traffic travelling

north/south as well as traffic using the three main bypass ramps could appropriately be set at 90 km/h.

- 4.3.8. A relevant factor in the timing of changes to the speed limit on these sections of road is the ongoing roadworks upgrading the interchange. It would not be sensible to increase the speed limit while decreased speed limits associated with the construction works temporarily apply and consequently it might be appropriate to time the introduction of altered limits to correspond to completion of the upgrade works.
- 4.3.9. We note that the 60 km/h speed limit that applied on the ramp connecting William Hovell eastbound to Tuggeranong Parkway southbound has been removed and replaced with appropriate advisory speed and warning signs. This change was to have been a recommendation of this report.

4.4. Fairbairn Avenue

- 4.4.1 Fairbairn Avenue from Anzac Parade to Robert Campbell Road is signposted at 60 km/h. East of Robert Campbell Road the limit increases to 80 km/h.
- 4.4.2 Much of the 60 km/h section has been reconstructed in recent years providing improved horizontal alignment as well as duplicated carriageways from Anzac Parade to Northcott Drive.
- 4.4.3 No speed survey data is available for this road at the moment. However traffic regularly travels at speeds in excess of the existing 60 km/h speed limit.
- 4.4.4 GTM5 Table 5.4 and AS 1742.4 Table 2.1, describe a road of this type as an urban arterial road in a sparsely built up area. On that basis the choice of limit is either 80 or 90 km/h. The road characteristics feature grade separated carriageways and no direct property access and the traffic characteristics do not feature significant numbers of non-motorised traffic.
- 4.4.5 However, a particularly relevant feature is that one end of the road is a major intersection with a poor injury accident record (Anzac Parade) as well as significant tourist turning movements associated with the Australian War Memorial. Consequently increasing the limit to a speed higher than 80 km/h would not be appropriate. Additionally it would seem appropriate to retain the existing 60 km/h limit (on both Anzac Parade and Limestone Avenue) until east of Treloar Crescent (after the War Memorial and the Creswell Street access from Campbell).
- 4.4.6 We understand that there is also some deficiency in the vertical alignment of Fairbairn Avenue. This could explain general driver reluctance to travel at speeds significantly higher than the existing speed limit. On that basis it appears sensible to modify the speed limit as provided in Appendix A of AS1742.4 and reduce the assessed speed limit from 80 km/h to 70 km/h.
- 4.4.7 Roads ACT has expressed some concern that raising the signed speed limit might increase traffic noise past the residential areas of Campbell. However traffic noise is not identified in any of the standards and guidelines as a basis for setting speed limits. To use traffic noise to set limits is likely to be inconsistent with other speed limit setting principals such as the desirability of setting limits that are not so low that a significant number of drivers will not be able to understand the reason for it and hence not to observe it (s 2.1.2 AS1742.4).

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- 4.4.8 Given that the design of the upgrade of this road has removed or minimised the visual link between the road and the adjacent residential area, this apparent inconsistency is likely.
- 4.4.9 Consequently we **recommend** that the limit on Fairbairn Avenue from east of Treloar Crescent to Robert Campbell Road be increased to 70 km/h.
- 4.4.10 This changed limit needs to be meshed into the revised limits at the eastern end of Fairbairn Avenue, with the start of the 70 km/h limit being consistent with limits in the revised roads around the airport.

4.5. Northcott Drive

- 4.5.1 Northcott Drive is generally signposted at 60 km/h. However immediately north of the roundabout intersection with Constitution Avenue, there is a section of the road which has a reduced speed limit (40 km/h) in conjunction with a slow point.
- 4.5.2 AS 1742.4 states at 2.1.2(c) that “Where the speed limit exceeds the maximum safe speed of travel due to an isolated geometric deficiency or hazard, advisory speed signs displayed in conjunction with the relevant warning signs shall be used to advise drivers of the need to reduce speed. Speed limits shall not be applied specifically for this purpose.”
- 4.5.3 In addition the length of the existing 40 km/h zone is significantly less than the minimum 400 metres for a 40 km/h speed zone as specified in the standard.
- 4.5.4 On that basis we **recommend** that the existing 40 km/h limit should revert to the 60 km/h limit with appropriate advisory speed signs at the constructed slow point.

4.6. Tharwa Drive Southbound Approach to the Tharwa Bridge

- 4.6.1 Tharwa Drive south of the residential development of Banks has a (rural default) speed limit of 100 km/h. The speed limit over the Tharwa Bridge has been set at 20 km/h for bridge strength structural reasons.
- 4.6.2 The speed limit for southbound traffic changes from the default limit to 60 km/h, followed by 40 km/h after 200 metres and then 20 km/h after a further 100 metres.
- 4.6.3 This is not consistent with the speed limit buffer options as specified in AS 1742.4 particularly in relation to the lengths of the intermediate zones.
- 4.6.4 However it seems evident that the cluster of speed limit signs is proving effective in the significant reduction (100 km/h to 20 km/h) required at this location and given the unique nature of this particular location we are of the view that a buffer zone approach is to be preferred to the general recommendation stated earlier to generally use the “Speed Limit AHEAD” option.
- 4.6.5 To make the signage consistent with the standard, the arrangement should be:
- 60 km/h zone for 300 metres (commencing 500 metres from the bridge and 100 metres further from the bridge than at present);
 - 20 km/h with start of zone 200 metres from the bridge (where the current 40 km/h zone starts at present); and
 - Repeater 20 km/h sign 100 metres from the bridge (where the 20 km/h zone starts at present).

- 4.6.6 This would provide three speed control signs between the 100 km/h zone and the bridge as at present but would do so with zone lengths consistent with the standard.
- 4.6.7 We recommend that these changes be made.

4.7. Tharwa Drive Northbound after Crossing Tharwa Bridge

- 4.7.1 Tharwa Drive northbound from the bridge has a series of speed limit zones corresponding to the length of zones on the southbound approach and consisting of a 40 km/h limit zone for 100 metres, a 60 km/h zone for approximately 200 metres followed by a 100 km/h zone.
- 4.7.2 AS1742.4 provides at 2.3.6(b) that offset speed limits can be provided on an undivided road where there is a speed limit buffer in the opposite direction not exceeding 400 metres in length.
- 4.7.3 Consequently on the northbound departure from the bridge the 100 km/h (rural default) zone could be signposted as starting at least 100 metres from the bridge.
- 4.7.4 We recommend that this change be made.

4.8. Eastern Valley Way Southbound / Bindubi Street Northbound

- 4.8.1 Eastern Valley Way has a signposted speed limit of 70 km/h. Generally this limit is considered appropriate.
- 4.8.2 This road becomes Bindubi Street after crossing Belconnen Way and the speed limit past the school reduces to 60 km/h.
- 4.8.3 That reduced speed limit is appropriate in terms of road function and environment but the length of the 60 km/h zone is less than the minimum required by the standard.
- 4.8.4 An acceptable way to resolve that is to commence the 60 km/h zone for southbound traffic on the Eastern Valley Way approach to the Belconnen Way intersection. This would result in a 60 km/h zone sufficiently long to meet the minimum required length.
- 4.8.5 In the opposite direction, the 60 km/h zone could extend through the Belconnen Way intersection to match the altered start of the 70 km/h zone southbound.
- 4.8.6 This change is recommended although it is a low priority since it achieves compliance with AS1742.2 but in practice is unlikely to result in significant changes in speed behaviour.

4.9. Aikman Drive

- 4.9.1 Aikman Drive has a signposted speed limit of 60 km/h.
- 4.9.2 GTM5 Table 5.4 and AS 1742.4 Table 2.1, describe a road of this type as an urban arterial road in a sparsely built up area. This suggests that the assessed speed limit is 80 km/h.
- 4.9.3 However there are characteristics of this road that warrant some adjustment to that assessed speed limit.
- 4.9.4 In relation to potential justification for adjusting this assessment, the following factors have been assessed

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Relevant factor	Comment
Roadside development	There is medium density residential development along this road. Although there is limited direct access to this road there is significant development activity.
Road characteristics	Part of the road is two lane two way and part is four lane divided carriageway. There are two intersections, one of which is traffic signal controlled but the other is uncontrolled.
Traffic characteristics	There are significant numbers of pedestrian movements across this road as it is the route between the University of Canberra and the Belconnen Town Centre and related facilities. The recently constructed extension of Aikman Drive to Eastern Valley Way is currently used as a bus layover although its long term requirement for this purpose is not clear.

4.9.5 GTM5 at s5.4.2 identifies that the safe systems approach does not support the use of measured 85th percentile speeds but points out that assessment of travel speeds can provide useful information in relation to assessing the operational characteristics of a road. In the case of this road observations suggest that travel speeds on this road are frequently significantly exceeded.

4.9.6 However, given the significant volumes of pedestrian traffic across this road some reduction in the assessed 80 km/h speed limit is warranted. Also s6.2.2 of AS1742.10 specifies that pedestrian crossings can be installed where the 85th percentile speed is less than 80 km/h.

4.9.7 The combination of these factors suggests that the assessed limit should be reduced from 80 km/h to 70 km/h. It is expected that this is likely to be seen by road users as reasonable for this road based on function and environment.

4.9.8 We **recommend** that the limit on the length of Aikman Drive be increased to 70 km/h.

4.10. Flemington Road

4.10.1 Flemington Road between Randwick Road and Sandford Street has a speed limit of 80 km/h which is consistent with the road being an urban arterial road in a sparsely built up area (AS1742.4 Table 2.1).

4.10.2 This seems reasonably consistent with driver behaviour on that road.

4.10.3 However the 80 km/h zone as signposted is approximately 600 metres long which is significantly less than the required minimum of 800 metres long. The options are to reduce the speed limit or extend the length of the zone to be 800 metres.

4.10.4 If the 80 km/h zone length was increased to 800 metres, the current minimum length for an 80 km/h speed zone specified in AS 1742.4, then the zone would extend through the Flemington Road / Randwick Road intersection. Although this intersection does not have high numbers of turning movements, its isolated location and occasional high traffic movements imply that a lower speed limit would be appropriate.

- 4.10.5 It should also be noted that the NSW RTA is proposing to increase its minimum lengths of speed zones with the minimum length for an 80 km/h zone increasing to 2km. On that basis there is insufficient distance for an 80 km/h zone between Northbourne Avenue and Sandford Street.
- 4.10.6 Consequently we **recommend** that the existing 80 km/h speed limit zone between Sanford Street and Randwick Road be replaced by a continuation of the 60 km/h zones either side.
- 4.10.7 In conjunction with this change, it is recommended that the presence of the 60 km/h zone be emphasised by the painting of 60 km/h speed limit logos on the westbound carriageway west of Randwick Road and on the eastbound carriageway east of Sanford Street.
- 4.10.8 Note however that Flemington Road is being upgraded. When that work is concluded then the speed limit for the length of Flemington Road would need to be re-assessed. It is likely that a revised limit would be either 70 or 80 km/h but this would need to be assessed when more detail is known of the upgrade.

4.11. Melrose Drive

- 4.11.1 Melrose Drive between Athllon Drive and Hindmarsh Drive has a posted speed limit of 60 km/h. GTM5 and AS1742.4 Table 2.1 describe this road as an urban arterial road. However the road has significantly differing road characteristics in opposite directions in a fully built up area.
- 4.11.2 Travelling south from Hindmarsh Drive in addition to the through traffic using this road, there is considerable roadside activity with commercial development generating frequent access movements and on street parking. 60 km/h is clearly an appropriate speed limit for this section of road.
- 4.11.3 Conversely, travelling north from Athllon Drive to Hindmarsh Drive, although there is residential development there is no property access and limited pedestrian movement. The road characteristics also feature divided carriageways with little visual connection between the two sides of the road.
- 4.11.4 Based on AS1742.4 Appendix A, A2(a), there is a case to suggest that the speed limit on this section of road in the northbound direction might have the limit increased to 70 km/h.
- 4.11.5 The intersection with Botany Street is signalised and the speed limit on Melrose Drive immediately north of Hindmarsh Drive is already 70 km/h.
- 4.11.6 AS1742.4 provides for divided carriageway roads to have different speed limits in opposite directions. However there are some road characteristics which suggest that this might not be appropriate.
- 4.11.7 Traffic characteristics of this road include significant numbers of school children crossing from the two senior schools at Pearce. There are no underpasses or other pedestrian crossing facilities on this road although the wide median facilitates pedestrian crossing movements.
- 4.11.8 Additionally, driver expectation is that roads usually have the same speed limit on opposite sides of the road. This road has had a 60 km/h speed limit for many years and increasing the limit at this stage might generate some confusion between road users. This could lead to increased differential speeds and potentially an increase in accidents.

- 4.11.9 Consequently it is **recommended** that the limit in the northbound direction remain at 60 km/h.
- 4.11.10 However given the potential for the speed limit on this road in the northbound direction to be misread, it is further recommended that the presence of the 60 km/h zone be emphasised. This could be achieved by increasing the size of the speed limit signs and gating them. Alternatively this could be a location where the painting of 60 km/h speed limit logos on the road pavement would be beneficial.

4.12. Cotter Road between Streeton Drive and Eucumbene Drive

- 4.12.1 Cotter Road between Streeton Drive and Eucumbene Drive is a rural arterial road. The adjacent land use can be classified (for the purposes of AS1742.4 Table 2.1) as either sparsely built up or farmland. There are two significant accesses off Cotter Road in this length, the first provides access into a small area of residential development at Settlement Drive, the second provides access to an ACT Government Depot.
- 4.12.2 At both locations there is some localised road widening to allow through traffic to pass vehicles waiting to turn right. There is no change to the 80 km/h speed limit past Settlement Drive but the signposted limit past the depot reduces to 60 km/h.
- 4.12.3 AS1742.4 at 2.1.2(c) and Appendix A3.3 states that speed limits should not be lowered specifically to reduce speeds at an isolated geometric deficiency or hazard or intersection. The approach in such locations should be to use relevant warning signs and advisory speed signs.
- 4.12.4 Additionally AS 1742.4 at 2.3.4 provides desirable minimum lengths for speed zones. The desirable minimum for a 60 km/h zone is 600 metres. The existing signposted zone length is around 300 metres. It would be reasonable to conclude that the existing limit is unlikely to be influencing travel speeds through this section of road.
- 4.12.5 Conversely appropriate warning signs could be expected to have a better impact on driver behaviour past the depot entrance.
- 4.12.6 We **recommend** that the 60 km/h speed limit past the depot be removed and appropriate warning signs provided.

4.13. Cotter Road west of Eucumbene Drive

- 4.13.1 GTM5 and AS1742.4 describe Cotter Road west of Eucumbene Drive Duffy as a rural arterial road. The adjacent land use can be classified (for the purposes of AS1742.4 Table 2.1) as farmland. The assessed speed limit for this road then without other extenuating factors should be the normal rural default speed limit of 100 km/h.
- 4.13.2 Generally the geometric alignment along the length of Cotter Road from Duffy to the Cotter River is not to a standard that is comfortable at 100 km/h. With the default rural roads limit, the intention is that drivers will travel at a speed which is appropriate rather than use the speed limit as an indication of an acceptable speed. However Cotter Road is arguably a special case given its limited design standard and the traffic volume it carries.
- 4.13.3 This section of Cotter Road has recently been reconstructed. While this has improved the road cross section and surface condition it has not altered the geometric alignment.

- 4.13.4 A further relevant factor is that this section of road will carry significant numbers of heavy vehicles for several years from early in 2010 due to the Cotter Dam construction works.
- 4.13.5 Consequently it is considered that the existing 80 km/h limit is an appropriate adjustment to the rural default limit recognising the geometric alignment and traffic characteristics.
- 4.13.6 There is one significant access off Cotter Road in this length, the intersection with Mount Stromlo Road. A short length of Cotter road through this intersection has been signposted with a 60 km/h speed limit. Roads ACT advises that the limit was reduced in this location following the bushfires in 2003 in recognition of the significant number of heavy vehicles turning at this intersection in the clean-up and re-building works at Mount Stromlo.
- 4.13.7 AS1742.4 states at Appendix A3.3 the "Intersections should not, of themselves require a lowering of speed limits; improving the sight distance, design layout and warning signs are often more effective in promoting safety at the site".
- 4.13.8 Consequently and on a similar basis to the speed limit past the depot in the section above, the reduced speed limit past this intersection is inconsistent with AS1742.4 and, now that the number of heavy vehicles has reduced to normal proportions, the lower limit should be removed.
- 4.13.9 We **recommend** that the 60 km/h speed limit through the Mount Stromlo Road intersection be removed and appropriate warning signs be installed.
- 4.13.10 We also **recommend** that the speed limit on this road be retained at 80 km/h.
- 4.14. Monaro Highway between Isabella Drive and the Alexander Maconochie Centre**
- 4.14.1 The speed limit on the Monaro Highway between Isabella Drive and Lanyon Drive reduces from 100 km/h to 80 km/h as it passes Hume industrial area. It remains at this speed until north of the signalised intersection entrance to the Alexander Maconochie Centre.
- 4.14.2 This is a divided carriageway rural arterial with a generally good alignment. There are three signalised intersections and an unsignalised intersection along this length of road.
- 4.14.3 Apart from that, the only access is to the Southcare Helicopter Base. This access is intended to be only a left in left out access although tracks in the median suggest that movements across the median are common. In that sense this access is operating as a lightly used uncontrolled intersection.
- 4.14.4 In terms of GTM5 and AS 1742.4 Table 2.1 this road is described as a rural arterial road in sparsely built up area (or farmland). This suggests a speed limit of 80, 90 or 100 km/h.
- 4.14.5 It is not immediately clear why a limit of 80 km/h might have been chosen for this road. However the presence of speed cameras in both north and south directions suggests that there might be a problem with a mismatch between driver perception of the road environment and the appropriate speed limit given that perception compared with the applied limit.
- 4.14.6 Given the number of heavy vehicles using this length of road for both through movements and also turning movements accessing Hume and the Mugga Tip facilities, a significantly lower posted limit can be appropriate.
- 4.14.7 This study has assessed that that an appropriate limit along this section of road is 80 km/h.

4.14.8 We **recommend** that the limit along this length of road be retained at 80 km/h.

4.15. Monaro Highway between Alexander Maconochie Centre and Hindmarsh Drive

4.15.1 The Monaro Highway between the Alexander Maconochie Centre and Hindmarsh Drive is signposted with a 100 km/h speed limit.

4.15.2 In terms of GTM5 this road meets the description of a rural road and in terms of AS 1742.4 Table 2.1 as a rural arterial road in farmland. On that basis, the assessed speed limit is 100 km/h.

4.15.3 We **recommend** that the 100 km/h speed limit from north of the Alexander Maconochie Centre and Hindmarsh Drive be retained.

4.16. Monaro Highway between Hindmarsh Drive and Pialligo Avenue

4.16.1. The Monaro Highway between Hindmarsh Drive and Pialligo Avenue is signposted with an 80 km/h speed limit.

4.16.2. In terms of AS 1742.4 Table 2.1 this road could be described as an urban expressway with full control of access and grade separated interchanges. This suggests a speed limit of 90 or 100 km/h.

4.16.3. As this road passes Fyshwick it reduces to one lane width and there appear to be some deficiencies in the geometric alignment. There is a history of single vehicle accidents involving cars striking the separator between the carriageways. For this reason we consider that raising the limit to 100 km/h would not be appropriate. In this section the alignment limitations suggest that it would be appropriate to retain the 80 km/h limit between Hindmarsh Drive and Newcastle Street.

4.16.4. In the section of this road between Newcastle Street and Pialligo Avenue, some reduction from the assessed 100 km/h limit would be reasonable given the intersection complexities at Pialligo Avenue and the alignment limitations south of Newcastle Street.

4.16.5. For that reason it is recommended that the speed limit between Newcastle Street and Pialligo Avenue be set at 90 km/h.

4.17. Taverner Street between Drakeford Drive and Erindale Drive

4.17.1 Taverner Street generally has an 80 km/h speed limit except for around the intersection with Forlonge Street and Newman Morris Circuit where the limit reduces to 60 km/h.

4.17.2 In terms of AS 1742.4 Table 2.1 this road could be described as an urban arterial road in a sparsely built up area since although housing backs onto the road, there is no direct access apart from the two intersections. This suggests a speed limit of 80 km/h.

4.17.3 AS1742.4 at 2.1.2(c) implies that speed limits should not be lowered specifically to reduce speeds at an isolated geometric deficiency or hazard. The approach in such locations should be to use relevant warning signs and advisory speed signs.

4.17.4 Additionally AS 1742.4 at 2.3.4 provides desirable minimum lengths for speed zones. The desirable minimum for a 60 km/h zone is 600 metres. The existing signposted zone length is around 360 metres. It would be reasonable to conclude that the existing limit is unlikely

to be influencing travel speeds through this intersection of road without significant enforcement levels.

- 4.17.5 Conversely appropriate warning signs could be expected to have a better impact on driver behaviour in this area.
- 4.17.6 We **recommend** that the speed limit through this intersection should be increased to 80 km/h together with appropriate warning signs.

4.18. William Hovell Drive between Coppins Crossing Road and Drake Brockman Drive

- 4.18.1 William Hovell Drive in this section has a speed limit of 90 km/h.
- 4.18.2 In terms of AS 1742.4 Table 2.1 this road could be described as a rural arterial road in farmland. This suggests a speed limit of 100 km/h.
- 4.18.3 However the road carries significant traffic volumes particularly in the peak periods, is undivided and has a history of serious accidents involving vehicles travelling in opposite directions.
- 4.18.4 AS1742.4 at 2.3.3(c) provides for the possibility of adjusting a speed limit indicated by Table 2.1 based on crash history. The provision cautions the application of this rationale to reduce a posted limit rather than taking other action to correct some specific cause of accidents.
- 4.18.5 We are not aware that the accidents that have occurred on this road are due to a specific correctible deficiency.
- 4.18.6 Consequently we conclude that the lower speed limit (90 km/h) is justifiable and appropriate and we **recommend** that it be retained.

4.19 Majura Road between Mustang Avenue and Fairbairn Avenue

- 4.19.1 This section of road has been recently reconstructed as part of the roadworks associated with the airport. It is approximately 750 metres long and has a posted speed limit of 60 km/h. It features two T intersections controlled by roundabouts and there is traffic signal control of the intersection with Fairbairn Avenue.
- 4.19.2 In terms of GTM5 and AS1742.4 this could be classified as a rural road. However it is probably more accurately described as a rural arterial road in a sparsely built up area. This implies an assessed speed limit of 80 or 90 km/h.
- 4.19.3 Given that the speed limit immediately north of Mustang Avenue is 90 km/h, it is appropriate that there should be some change in the speed limit to reflect the changing road environment and matching the 80 km/h limit on Fairbairn Avenue where Majura Road ends.
- 4.19.4 On the other hand roads meeting this description (two lane two way arterial with roundabout control) are common in the ACT with 80 km/h speed limits. To set the speed limit too low on this section of road would likely appear unreasonable to motorists resulting in significant levels of non-compliance and consequential higher levels of differential speeds between vehicles.
- 4.19.5 On that basis a speed limit of 80 km/h appears appropriate

- 4.19.6 However this section of recently constructed road leads into the extensive road reconstruction being undertaken on roads passing and accessing the Canberra Airport. The speed limit should be reviewed on all these roads when roadworks have been completed.
- 4.19.7 It is **recommended** that the existing speed limit on Majura Road between Mustang Avenue and Fairbairn Avenue be retained until a review of the speed limits associated with the reconstructed roads in the area can be undertaken.

4.20 Woodcock Drive

- 4.20.1 Woodcock Drive has two separate speed limit sections. From Drakeford Drive to west of the intersection with Lewis Luxton Crescent (east) the signposted speed limit is 80 km/h. From this location to Tharwa Drive the signposted limit is 60 km/h. Also this section incorporates a school zone with the associated 40 km/h school zone speed limit at signposted times.
- 4.20.2 There are deficiencies in the existing signage. There is no speed limit sign heading west on Woodcock Drive from Tharwa Drive until the school zone sign is reached. If the school zone is not activated the first speed limit sign encountered is the 60 Km/h sign west of Knoke Avenue at the end of the school zone.
- 4.20.3 Legally then the speed limit on Woodcock Avenue in the westerly direction from Tharwa Drive to that point is 50 km/h. This is unlikely to be intentional.
- 4.20.4 Also the distance from the 60km/h sign at the end of the school zone to the start of the 80 km/h zone(in the westbound direction) is approximately 100 metres .
- 4.20.5 In terms of AS 1742.4 Table 2.1 this road could be described as an urban arterial road in a sparsely built up area since although housing backs onto the road, there is no direct access apart from the intersections.
- 4.20.6 However the section of this road between Tharwa Drive and Jim Pike Avenue has four local access intersections in 600 metres as well as a school zone and a local shopping centre.
- 4.20.7 Consequently the indicated speed limit of 80 km/h could be reduced given the characteristics of adjacent development and traffic characteristics. In this section of the road, there are many turning movements at the intersections.
- 4.20.8 It is recommended that the speed limit on Woodcock Drive between Tharwa Drive and Jim Pike Avenue be 60 km/h.
- 4.20.9 Between Drakeford Drive and Jim Pike Avenue the nature of the adjacent development changes with lengthy sections of open space as well as increased setback of adjacent residential development from the edge of the carriageway. Intersection spacing is much greater than on the other section and the traffic is more likely to be on longer regional trips rather than on local trips.
- 4.20.10 There is a school zone in the section immediately west of Drakeford Drive and this is well signposted.
- 4.20.11 In this section of Woodcock Drive there is no significant requirement to reduce the speed limit from the indicated 80 km/h limit.

4.20.12 It is **recommended** that the speed limit on Woodcock Drive between Drakeford Drive and Jim Pike Avenue be 80 km/h.

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5 RURAL ROADS

5.19 General

- 5.1.1 All rural roads were inspected as part of this study.
- 5.1.2 The primary purpose was to assess existing speed limit signage, and associated signage, to ensure that the requirements of AS1742.4 are met.
- 5.1.3 Additionally there were some particular locations where some change is recommended for consistency and to meet AS1742.4 requirements. These are detailed below.

5.20 Rural Default Limit

- 5.2.1 In most cases the 100 km/h rural default limit applies although there are some locations where lower limits are posted for particular reasons. Apart from the cases mentioned in the previous Chapter, existing signage is generally consistent with the standard.
- 5.2.2 There are some situations which are not consistent with the standard but for which the variation is considered reasonable.
- 5.2.3 A particular issue is where roads cross the border with NSW in remote locations.
- 5.2.4 AS1742.4 covers the situation where a road leaves a built-up area and enters a rural area. However it does not specifically cover rural locations moving from one jurisdiction to another.
- 5.2.5 Where rural roads cross the ACT/NSW border in remote locations there is not usually signage identifying the applicability of the 100 km/h rural default limit. In such locations, it is arguable that erecting 100 km/h speed limit signs might be inappropriate since the road geometry and surface are not adequate for such speeds and this is obvious to drivers. Whether or not the signs are provided does not alter the legality of the default limit.
- 5.2.6 Consequently this report does not recommend the provision of default limit signage on border crossing roads such as Fairlight Road and Brindabella Road.
- 5.2.7 However one exception to this is on Boboyan Road.
- 5.2.8 Boboyan Road is used regularly and is a reasonable standard of rural unsealed road for the first 20 kilometres from the border with New South Wales. There is no signage at the border.
- 5.2.9 We recommend that gated 100 km/h signs be provided at the border to emphasise the location of the border and the default speed limit

5.21 Unsealed Road Signage

- 5.3.1 A key requirement of signage on unsealed roads is that advisory speed signs should not be used (AS1742.4 cl 3.4.7).
- 5.3.2 Alignment warning signs are used on most unsealed rural roads in the ACT. No instances were recorded of the use of Advisory Speed signs on unsealed roads.

5.22 Paddys River Road South of Cotter Road

- 5.4.1 Immediately south of the Cotter River crossing, in the southbound direction the speed limit is signposted at 60 km/h to the intersection with Vanity's Crossing Road. In the opposite direction the signposted limit is 100 km/h.
- 5.4.2 The differential speeds in opposite directions does not meet AS1742.4.
- 5.4.3 Travelling south this section of road is a long uphill climb. The presence of heavy vehicles on this road travelling slowly up this grade could generate frustration for drivers if the limit was set at 100 km/h. Additionally the long downgrade in the opposite direction ends at the recreation area at Cotter River.
- 5.4.4 Given the traffic characteristics of this section of road featuring tourist use including pedestrians at the northern end of the section and the presence of a significant number of heavy vehicles (logging traffic) there is a case for reducing the speed limit otherwise assessed.
- 5.4.5 Consequently it is **recommended** that the existing 100 km/h limit be reduced to 60 km/h.

5.23 Paddys River Road North of Tharwa

- 5.5.1 The current speed limits at the transition between the town and the rural highway are inconsistent in opposite directions.
- 5.5.2 Approaching Tharwa from the north, the 100 km/h limit reduces to 60 km/h at the edge of the town. Approximately 150 metres further on is the start of a School Zone.
- 5.5.3 In the opposite direction there is no end of school zone other than a sign indicating 60 km/h speed limit immediately opposite the sign commencing the 60 km/h zone southbound. There is no sign indicating the start of the 100 km/h zone.
- 5.5.4 In the NAAS Road part of Tharwa, the speed limit is signposted at 50 km/h.
- 5.5.5 It is **recommended** that these inconsistencies be resolved by adopting a 50 km/h limit within the township and using the 50 Ahead buffer zone (AS 1742.4 2.3.5(b)).

5.6 Brindabella Road between Uriarra Road and Paddys River Road

- 5.6.1 Immediately north of Paddys River Road travelling towards Uriarra Road (and Uriarra Village) there is a 60B speed limit sign on the left verge. For the next 5.2 kilometres the road traverses several tight bends some of which are very tight and difficult to negotiate at speed. There are advisory speed warning signs on some, but not all the bends.
- 5.6.2 After this winding section of road the geometric alignment eases considerably and Brindabella Road passes through intersections of streets leading into the reconstructed Uriarra Village. As Brindabella Road approaches the village the speed limit is signposted at 80 km/h.
- 5.6.3 Travelling in the opposite direction at the end of the 80 km/h zone past Uriarra Village, the speed limit is signed 100 km/h. There are no other speed limit signs until Paddys River Road is reached.
- 5.6.4 The existing speed limit signage on this road indicates significantly different speed limits in opposite directions. Although AS1742.4 identifies some circumstances where

different limits can sensibly apply in opposite directions, this location does not possess any such characteristics.

- 5.6.5 The current TCD Inventory for this section of road identifies that the signed speed limit in the direction towards Uriarra Road is 60 km/h from Paddys River Road. In addition the inventory shows a 40 km/h speed limit sign approximately a quarter of the way to Uriarra Road. This low speed limit zone is not ended on the inventory in that north bound direction although in the opposite direction the TCD inventory shows a 40 km/h speed limit sign approximately 500 metres from the sign facing the northbound direction implying that the 40 km/h zone is 500 metres long.
- 5.6.6 The TCD Inventory does not have any speed limit identified for the direction towards Paddys River Road from the intersection with Uriarra Road until the 40 km/h speed limit sign mentioned above.
- 5.6.7 Given that there are no 40 km/h signs in place there appears to be a significant difference between the TCD Inventory and the signs in the field.
- 5.6.8 Given the anomaly even in the TCD Inventory for the different directions there is a need to establish an appropriate speed limit regime for this section of road.
- 5.6.9 In the first instance the current Guidelines and Australian Standard suggest that it is inappropriate to signpost a reduced speed limit for isolated geometric deficiencies. On that basis the short length of 40 km/h zone on the TCD Inventory should not be retained.
- 5.6.10 This road is an urban arterial road in a sparsely built up area or farmland. Generally then Table 2.1 in AS1742.4 suggests that the speed limit might normally be in the range of 80 to 100 km/h but potentially subject to adjustment based on road characteristics.
- 5.6.11 The Austroads Guide to Road Safety Part 3 identifies factors that might need to be taken into account in this consideration. In this case these are, primarily, crash history and current operating performance.
- 5.6.12 The crash history highlights a problem with this road. In a five year period to October 2008, there were 16 mid-block accidents on this road. Of these 13 involved single vehicles out of control and 7 of the accidents involved injury.
- 5.6.13 Anecdotally the road is popular with motor bike riders. This is an issue in the operating performance of the road since there appear to be risks associated with the use made of the road by some road users. On the other hand the general risks associated with use of this rural road are low. Traffic volumes are not high, there are not generally pedestrians present and there are no intersections. Added to this is that the twisty alignment is obvious to drivers unfamiliar with the road.
- 5.6.14 Both the Austroads Guide and the Australian Standard touch on the issue of reduced standard of alignment. The Austroads Guide suggests that alignment should be taken into account when assessing speed limits although adds that short sections (undefined) of road with an adverse alignment should be treated with advisory speed signs. This is consistent with the Australian Standard. However neither guide clearly addresses the case of a road in a rural environment where the reduced standard of alignment continues for several kilometres and comfortable travel speeds are well below the general range of speed limits for rural arterial roads.

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- 5.6.15 Travelling along this section of road at speeds greater than 60 km/h is possible but requires more than normal levels of concentration and effort.
- 5.6.16 Under the circumstances the options available under the guides and standards are to signpost a higher limit and supplement these with speed warning signs on most corners. Alternatively the limit might be set lower, at 60 km/h (assessed as the generally comfortable travel speed), and supplement this with advisory speed warning signs on only those corners where the advisory speed is assessed as less than 60 km/h.
- 5.6.17 The complication of setting a higher limit is the potential that the signposted speed limit might be taken as an indication of an appropriate speed of travel which is clearly not the case for this road. Although speed limits are not intended to be taken in all cases as an indication of appropriate speed of travel it becomes difficult to explain the logic of particular speed limits on particular sections of road.
- 5.6.18 For example travelling at 100 km/h on many roads covered by the generic 100 km/h rural default speed limit might be quite inappropriate.
- 5.6.19 Nevertheless there is a tendency for drivers to presume that signposted speed limits indicate an acceptable speed.
- 5.6.20 On balance, in the case of this section of Brindabella Road between Uriarra Settlement and Paddys River Road, we **recommend** that the limit be set at 60 km/h. This choice does not infringe any of the general principles associated with setting speed limits and is unlikely to be considered by the majority of road users to be so low that a significant number of drivers would not be able to understand the reason for it and hence tend not to observe it.
- 5.6.21 Note that this recommendation does not support the posting of a 40 km/h limit over any section of this road and that it rectifies the existing anomaly in the approved TCD plans.

5.7 Mugga Lane between Narrabundah Lane and Long Gully Road

- 5.7.1 GTM5 and AS1742.4 describe Mugga Lane south of Narrabundah as a rural arterial road. The adjacent land use can be classified (for the purposes of AS1742.4 Table 2.1) as farmland. The assessed speed limit for this road then without other extenuating factors would be the normal rural default speed limit of 100 km/h.
- 5.7.2 Generally the geometric alignment along the length of Mugga Lane is not to a standard that is appropriate at 100 km/h. With the default rural roads limit, the intention is that drivers will travel at a speed which is appropriate rather than use the speed limit as an indication of an acceptable speed. However Mugga Lane is arguably a special case given its limited design standard and the traffic volume it carries.
- 5.7.3 For some time the limit has been set at 80 km/h. No speed data is available for this road but, even with this posted limit, there is evidence of inappropriately high travel speeds.
- 5.7.4 This is evidenced in the collision statistics for the road. In the five year period to October 2008, 51 collisions are recorded for this road. Of these, 32 were single vehicle collisions and 5 involved injuries.

- 5.7.5 This road also has a significant proportion of heavy vehicles as it provides access to the Mugga Tip. The frequency of fully laden waste removal vehicles travelling at speed on this road is a concern and the general issue of travel speeds on this road has also been raised in the context of the safe access of driveways.
- 5.7.6 This suggests that there is a case to reduce the speed limit further and it is recommended that the limit be reduced to 70 km/h between Narrabundah Lane and Long Gully Road.

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6 FINDINGS AND RECOMMENDATIONS SIGNAGE CHANGES

6.19 Existing Speed Limits

- 6.2.1 As a general rule the large majority of arterial roads in the ACT have been assessed as already having appropriate speed limits signposted.
- 6.2.2 This probably reflects that much of the Canberra road network has been constructed since the importance of a clearly apparent hierarchy of roads has been established. Consequently most of the ACT's urban arterial roads have been designed without direct access to adjacent roadside developments and with geometric characteristics (alignment, lane widths, intersection configurations) for which an 80 km/h speed limit is generally the appropriate limit.
- 6.2.3 There are however some exceptions to this and these are identified in this report.

6.20 General considerations

- 6.2.4 We propose that consideration be given to each of the speed limit changes **recommended** in Chapters 4 and 5.
- 6.2.5 Attachment 1 lists all arterial roads and identifies the basis for the speed limit on each. It also identifies those arterial roads where this report recommends changes to the existing limits as well as those sections of road where no change is recommended.
- 6.2.6 We further **recommend** that the signage alterations be undertaken as detailed at Attachments 1 and 2. Note that those attachments assume the recommendations in other parts of this report have been adopted.

6.21 Signage Alterations

- 6.3.1 As mentioned earlier in this report there are many locations where signage changes are recommended.
- 6.3.2 In some instances this is to meet signage requirements or recommended arrangements as per AS1742.4. In other cases it is to modify existing speed limits on particular roads.
- 6.3.3 Attachment 2 tabulates all locations where we **recommend** signage changes.
- 6.3.4 Attachment 3 provides Preliminary Sketch Plans detailing the locations of these changes.

6.22 Locational Issues

- 6.4.1 Generally speed limit signage on arterial roads was found to meet the requirements of the Australian Standards in relation to lateral position, visibility and longitudinal placement.
- 6.4.2 One notable exception was the collocation of other signs on the same post as speed limit signs. This has been done in a number of locations involving on road bicycle facilities signage.
- 6.4.3 These locations have been detailed in Attachment 2 and Attachment 3.

6.23 Estimated Costs

- 6.5.1 A total of approximately 700 signs have been recommended for installation. These signs are in many locations throughout the ACT.

- 6.5.2 It is not feasible to provide a precise estimate of these works. On the other hand most locations require that a sign post be provided and installed and fitted with a B size sign. On that basis it is reasonable to assume that an average cost per sign is \$250.
- 6.5.3 Using that estimate, the estimated cost to implement these signage changes is \$175,000 inclusive of GST.

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ATTACHMENT 1. SUMMARY TABLE OF ARTERIAL ROAD SPEED LIMITS

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ACT ARTERIAL ROADS SPEED LIMIT SUMMARY					
Road	From Rd	To Rd	Existing Speed Limit	Proposed Speed Limit	Basis of Speed Limit*
Adelaide Ave	Cotter Rd	State Circle	80	80	A
Aikman Dr	Eastern Valley Way	Ginninderra Dr	60	70	D
Antill St	Federal Hwy	Health Services Hostel	80	80	A
Antill St	Health Services Hostel	Northnourne Av	60	60	C,D
Anzac Pde	Parkes Way	Limestone	60	60	A
Ashley Dr	Johnson	Erindale	80	80	A
Ashley Dr	Erindale	Sternberg	60	60	A
Athllon Dr	Hindmarsh	Melrose	60	60	B,D
Athllon Dr	Melrose	Anketell	80	80	A
Athllon Dr	Anketell	Drakeford Dr	60	60	A
Baldwin Dr	William Slim	200m south of Maribyrnong Av	80	80	A
Baldwin Dr	200m south of Maribyrnong Av	130m west of Chuculba St	60	60	C
Baldwin Dr	130m west of Chuculba St	William Slim	80	80	A
Barry Dr	Fairfax St	East of Clunies Ross	80	80	A
Barry Dr	East of Clunies Ross	Northbourne Av	60	60	B,D
Barton Hwy	Northbourne Av	130m west of Bellenden St	80	80	A
Barton Hwy	130m west of Bellenden St	750m east of William Slim Dr	100	100	A
Barton Hwy	750m east of William Slim Dr	Victoria St	80	80	C
Barton Hwy	Victoria Street	NSW Border	100	100	A
Belconnen Way	Kingsford Smith	Coulter Dr	60	60	B
Belconnen Way	Coulter Dr	Fairfax St	80	80	A
Bindubi St	Belconnen Way	Redfern St	60	60	C,D
Bindubi St	Redfern St	William Hovell Dr	80	80	A
Brindabella Road	Uriarra Settlement	Paddys River Road	100	80	C
Boboyan Rd	Top Naas Rd	NSW Border	100	100	A
Bowen Dr	King Edward Tce	Kings Av overpass	60	60	C,D
Bowen Dr	Kings Av overpass	Brisbane Av	70	70	C

ACT ARTERIAL ROADS SPEED LIMIT SUMMARY					
Road	From Rd	To Rd	Existing Speed Limit	Proposed Speed Limit	Basis of Speed Limit*
Brisbane Av	Bowen Dr	State Cir	60	60	B,D
Canberra Av	State Cir	Hume Pl	60	60	B,D
Canberra Av	Hume Pl	Tom Price St	80	80	A
Canberra Av	Tom Price St	Harman Entry	90 eastbound 100 west bound	90/100	C
Capital Circle	Adelaide Av	Commonwealth Av	80	80	A
Capital Circle	Commonwealth	Adelaide Av	80	80	A
Clarrie Hermies	Gungahlin	Kellway	80	80	A
College St	Eastern Valley Way	Haydon Dr	60	60	B,D
Commonwealth Av	Capital Circle	Parkes Way	70	70	B
Commonwealth Av	Parkes Way	London Cct	60	60	C
Constitution Av	London Cct	Northcott Dr	60	60	B,D
Coppins Crossing	Uriarra Rd	sth approach to crossing	80	80	A
Coppins Crossing	sth approach to crossing	nth approach to crossing	60	60	C
Coppins Crossing	nth approach to crossing	William Hovell Dr	80	80	A
Cotter Rd	Adelaide Av	350m west of Streeton Dr	80	80	A
Cotter Rd	350m west of Streeton Dr	650m west of Streeton Dr	60	80	E, F
Cotter Rd	650m west of Streeton Dr	600 m west of Eucumbene Dr	80	80	A
Cotter Rd	East of Mt Stromlo turnoff	West of Mt Stromlo turnoff	60	80	E, F
Cotter Rd	West of Mt Stromlo turnoff	Approach to Cotter Rd	80	80	C
Cotter Rd	Approach to Cotter Rd	Cotter crossing	60	60	C
Cotter Rd	Cotter Crossing	Cotter Crossing	40	40	C, D
Coulter Dr	Ginninderra	William Hovell Dr	80	80	A
Drake Brockman	Kingsford Smith	Spofforth	80	80	A
Drakeford Dr	Tharwa Dr	Sulwood Dr	80	80	A
Eastern Valley Way	Emu Bank	Hennessy	70	70	C, D
Eastern Valley Way	Hennessy	Belconnen Way	70	change 70 to 60	E

ACT ARTERIAL ROADS SPEED LIMIT SUMMARY					
Road	From Rd	To Rd	Existing Speed Limit	Proposed Speed Limit	Basis of Speed Limit*
Ellenborough St	Barton Hwy	Ginninderra Dr	60	60	A
Erindale Dr	Drakeford Dr	Julia Flynn Sth	80	80	A
Fairbairn	Anzac Pde	Treloar	60	60	C, D
Fairbairn	Treloar	Robert Campbell	60	Change 60 to 70	C
Fairbairn	Robert Campbell	Pialligo Av	80	80	A
Flemington Rd	Federal Hwy	North of Lysaght	80	60	C, E
Flemington Rd	Lysaght St	Mapleton Av	80	80	A
Flemington Rd	Mapleton	Kate Crace	60	60	B, D
Florey Dr	Southern Cross	Lhotsky St	60	60	B, D
Ginninderra Dr	Kerrigan	Ellenborough St	80	80	A
Gundaroo Dr	Horse Park Dr	Mirrabei Dr	60	60	B, D
Gundaroo Dr	Mirrabei Dr	Barton Hwy	80	80	A, C, D
Gungahlin Drive	Glenlock Interchange	Sanford St	80	Change 80 to 90	C
Gungahlin Drive	Sanford St	Horse Pk Dr	80	80	A
Haydon Dr	Belconnen Way	Ginninderra Dr	80	80	A
Hindmarsh Dr	Eucumbene Dr	80 m east of Darwinia Terrace	60	60	C
Hindmarsh Dr	80 m east of Darwinia Terrace	Canberra Av	80	80	A
Horse Park Dr	Katherine	Federal Hwy	80	80	B, C, D
Isabella Dr	Drakeford Dr	Monaro Hwy	80	80	A
Johnson Dr	Drakeford	Monaro Hwy	80	80	A
Kings Av	Parliament Drive	Bowen Dr	60	60	B, C, D
Kings Av	Bowen Dr	Pakes Way	80	80	A
Kingsford Smith	Drake Brockman	Ginninderra Dr	80	80	A
Kingsford Smith	Ginninderra Dr	Kuringa Dr	70	70	C, D
Kuringa Dr	Barton Hwy	Owen Dixon	80	80	A
Kuringa Dr	Owen Dixon	400m from Tilyard Dr	70	70	C
Kuringa Dr	400m from Tilyard Dr	Tilyard Dr	60	60	C
Limestone Av	Anzac Pde	Wakefield Av	60	60	B, D
Long Gully	Erindale	Mugga Lane	80	80	A
Macarthur Av	Barry Dr	180m east of Dryandra Street	80	80	A

ACT ARTERIAL ROADS SPEED LIMIT SUMMARY					
Road	From Rd	To Rd	Existing Speed Limit	Proposed Speed Limit	Basis of Speed Limit*
Macarthur Av	180m east of Dryandra Street	Northbourne Av	60	60	B, D
Majura Rd	Federal Hwy	Mt Majura Rd	80	80	C
Majura Rd	Mt Majura Rd	Mustang Av	90	90	C
Majura Rd	Mustang Av	Fairbairn Av	60	60	Subject to review with particular reference to B, C, D
Melrose Dr	Athllon Dr	Hindmarsh Dr	60	60	B, D
Melrose Dr	Hindmarsh	Yarra Glen	70	70	B, D
Mirrabei Dr	Gundaroo	Len Waters	80	80	A
Monaro Hwy	NSW Border	3km north of Johnson Dr	100	100	A
Monaro Hwy	3km north of Johnson Dr	North of Prison entrance	80	80	B, D
Monaro Hwy	North of Prison Entrance	Hindmarsh Dr	100	100	A
Monaro Hwy	Hindmarsh Drive	Newcastle St	80	80	C
Monaro Hwy	Newcastle St	Pialligo Road	80	90	C
Morshead Dr	Fairbairn Av	Kings Av	80	80	A
Mugga Lane	Hindmarsh Drive	Narrabundah Lane	60	60	B, C
Mugga Lane	Narrabundah Lane	Long Gully Rd	80	70	C
Mugga lane	Long Gully Rd	Monaro Hwy	80	80	C
NAAS Rd	Tharwa town limit	Smith Rd	80	80	C
NAAS Rd	Smith Rd	southbound	100	100	A
Northbourne Av	London Cct	Antill St	60	60	B, D
Northbourne Av	Antill St	250m north of Antill St	60	60	B, D
Northbourne Av	250m north of Antill St	Barton Hwy	80	80	A
Northcott Drive	Fairbairn Av	300m north of Constitution Av	60	60	C
Northcott Drive	300m north of Constitution Av	Constitution Av	40	change 40 to 60	E, F
Paddys River Rd	Cotter Crossing	Vanity's Crossing Rd	100	60	B, C, D
Paddys River/Tidbinbilla	approaching Tharwa	400m before town limit	60	100 / 50 Ahead	G

ACT ARTERIAL ROADS SPEED LIMIT SUMMARY					
Road	From Rd	To Rd	Existing Speed Limit	Proposed Speed Limit	Basis of Speed Limit*
Paddys River/Tidbinbilla	at Tharwa town limit	Tharwa Dr	60	50	A
Paddys River/Tidbinbilla	At Tharwa town limit	northbound	60	change 60 buffer to 100	A
Parkes Way	Parkes Way after Glenlock Int	Liversidge St tunnel	90	90	C, D
Parkes Way	Liversidge St tunnel	Kings Av	80	80	C, D
Randwick Rd	Barton Hwy	Flemington Rd	60	60	B, D
SmithRoad	NAAS RD	Angle Crossing	100	end 80	H
Southern Cross Dr	Spofforth St	Kingsford Smith	60	60	B, C
Southern Cross Dr	Kingsford Smith	Coulter Dr	80	80	A
State Circle	Adelaide Av	Adelaide Av	70	70	B, C
Streeton Dr	Cotter	Hindmarsh	80	80	A
Sulwood Dr	Erindale	Kambah Pool Rd	80	80	A
Taverner	Drakeford	Forlonge	60	change 60 to 80	E, F
Taverner	Forlonge	Erindale	80	80	A
Tharwa Dr	Monaro Hwy	Drakeford Dr	80	80	A
Tharwa Dr	Drakeford Dr	Pocket Av	80	80	A
Tharwa Dr	Pocket Av	Tharwa Br approach	100	100	A
Tharwa Dr	Tharwa Br approach	Tharwa Br	Transition	Changed	G
Tuggeranong Parkway	350m north of Sulwood Dr	Lakeside Interchange	100	100	A
Tuggeranong Parkway	Lakeside Interchange	GDE	80	90	C
Uriarra Rd	Cotter	Coppins Crossing	80	80	C
Uriarra Rd	Coppins Crossing	Uriarra Picnic Gnd	100	100	A
Uriarra Rd	Uriarra Picnic Gnd	Uriarra crossing approach east	80	80	C
Uriarra Rd	Uriarra Crossing approach east	Uriarra crossing	60	60	C, D
Uriarra Rd	Fairlight	Brindabella	100	100	A
Wentworth Av	Brisbane Av	Hume PI	60	60	B, D
William Hovell	Drake Brockman	500m east of Bindubi St	90	90	C

ACT ARTERIAL ROADS SPEED LIMIT SUMMARY					
Road	From Rd	To Rd	Existing Speed Limit	Proposed Speed Limit	Basis of Speed Limit*
William Hovell	500m east of Bindubi St	Parkes Way after Glenlock Int	80	80	C
Woodcock Dr	Drakeford Dr	Jim Pike Avenue	80	80	A
Woodcock Dr	Jim Pike Avenue	Tharwa Dr	60 and part 80	60	B, D
Yamba Dr	Long Gully Rd	Yarra Glen	80	80	A
Yarra Glen Adelaide Av	Melrose	State Cir	80	80	A

Basis of Speed Limit	
A	Speed limit assessed based on GTM5 and AS 1742.4 Table 2.1
B	Speed limit assessed based on GTM5 and AS 1742.4 Table 2.1 but reduced primarily due to considerations of roadside development
C	Speed limit assessed based on GTM5 and AS 1742.4 Table 2.1 but reduced primarily due to considerations of road characteristics including crash history
D	Speed limit assessed based on GTM5 and AS 1742.4 Table 2.1 but reduced primarily due to considerations of traffic characteristics
E	Existing speed limit does not meet minimum length requirement for speed zones
F	AS 1742.4 Appendix 3.3 and GTM5 s5.2 specify that speed limits should not be reduced for single intersections
G	Buffer Zone modifications generally to apply consistent application of "Speed Zone AHEAD"
H	Use of "End 80 km/h" rather than 100 km/h at the start of a rural default zone where immediate road characteristics are unsuitable for 100 km/h limit

ATTACHMENT 2. SUMMARY TABLE OF PROPOSED SIGNAGE CHANGES

DRAFT

Legend Used in the Following Table

1. Add a single sign usually to achieve gated signs
2. Add a single sign usually to achieve gated signs on a 2 Way road
3. Add gated (2 No.) signs to notify speed limit
4. Add gated (2 No.) signs to notify speed limit
5. Relocate a sign
6. Replace an existing sign

DRAFT

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Aikman Dr	N	Eastern Valley Way	Emu Bank	change 60 to 70	Add gated 70B	3
Aikman Dr		Emu Bank	Townsend Pl	change 60 to 70	replace 60B with gated 70B	6
Aikman Dr		Townsend	Joy Cummins	change 60 to 70	Add gated 70B on 2 way road	4
Aikman Dr	S	Ginninderra	Joy Cummins	change 60 to 70	Add gated 70B	3
Aikman Dr				change 60 to 70	remove existing 60A from ped crossing sign	5
Aikman Dr		Townsend	Emu Bank	change 60 to 70	Replace existing 60A with gated 70B	6
Aikman Dr		Emu Bank	Eastern Valley Way	change 60 to 70	Replace existing 60A with 70A	6
Aikman Dr						
Antill St	S	Federal Hwy	Aspinall	80	Add second gating 80B on 2 way road	2
Antill St		Aspinall	South	80	Add gated 80B on 2 way road	4
Antill St						
Anzac Pde	N	Parkes Way	Constitution	60	Add second gating 60B in median	1
Anzac Pde		Constitution	Currong	60	Add gated 60B	3
Anzac Pde		Currong	Limestone	60	Add gated 60B	3
Anzac Pde	S	Limestone	Blamey	60	Add gated 60B	3
Anzac Pde		Blamey	Constitution	60	Add gated 60B	3
Anzac Pde						
Ashley Dr	N	Johnson	Ellerston	80	Add second gating 80B on 2 way road	2
Ashley Dr		Ellerston	Clift	80	Add second gating 80B on 2 way road	2
Ashley Dr		Clift	Isabella	80	Add second gating 80B on 2 way road	2
Ashley Dr		Isabella	Barraclough	80	Add second gating 80B on 2 way road	2
Ashley Dr		Barraclough	Bugden	80	Add second gating 80B on 2 way road	2
Ashley Dr		Bugden	Clive Steele	80	Add second gating 80B on 2 way road	2
Ashley Dr		Statton	Erindale	80	Add gated 80B on 2 way road	4
Ashley Dr		Erindale	McBryde	60	Add second gating 60B in median	1
Ashley Dr		McBryde	Lansell	60	Add gated 60B	3
Ashley Dr	S	Sternberg	Lansell	60	Add gated 60B	3
Ashley Dr		Erindale	Statton	80	Add second gating 80B on 2 way road	2
Ashley Dr		Clive Steele	Bugden	80	Add gated 60B 2 way road	4
Ashley Dr		Bugden	Barracloughg	80	Add second gating 80B on 2 way road	2
Ashley Dr		Isabella	clift	80	Add second gating 80B on 2 way road	2

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Ashley Dr		Clift	Ellerston	80	Add second gating 80B on 2 way road	2
Ashley Dr		Ellerston	Johnson	80	Add gated 80B on 2 way road	4
Ashley Dr						
Athllon Dr	S	Hindmarsh	Shea	60	Add second gating 60B on 2 way road	2
Athllon Dr		Shea	Parramatta	60	Add gated 60B 2 way road	4
Athllon Dr		Melrose	Mawson Dr	80	Add repeater 80B on left	1
Athllon Dr		Mawson	Beasley	80	Add second gating 80B in median	1
Athllon Dr		Beasley	Sulwood	80	Add second gating 80B in median	1
Athllon Dr		Sulwood	Atkins	80	Add second gating 80B on 2 way road	2
Athllon Dr		Atkins	Vosper	80	Add gated 80B on 2 way road	4
Athllon Dr		Vosper	Fincham	80	Relocate hidden 80B from left to median	5
Athllon Dr		Fincham	Drakeford Dr	80	Add gated 80B	3
Athllon Dr		Drakeford Dr	Florence Taylor	80	Add gated 80B	3
Athllon Dr		Learmonth	Florence Taylor	80	Add gated 80B	3
Athllon Dr		Ankatell	Cowlshaw	60	Add gated 60B	3
Athllon Dr		Pitman	Reed St N	60	Add gated 60B	3
Athllon Dr		Reed St S	Scollay	60	Add gated 60B	3
Athllon Dr		Scollay	Ankatell	60	Add gated 60B 2 way road	4
Athllon Dr		Ankatell	Drakeford Dr	60	Add gated 60B	3
Athllon Dr	N	Drakeford Dr	Ankatell	60	Add second gating 60B in median	1
Athllon Dr		Ankatell	Barr Smith	60	Add gated 60B	3
Athllon Dr		Barr Smith	Scollay	60	Add gated 60B	3
Athllon Dr		Rowland Rees	Reed St S	60	Add gated 60B	3
Athllon Dr		Reed St S	Soward	60	Add second gating 60B in median	1
Athllon Dr		Reed St N	Rowland Rees	60	Add gated 60B	3
Athllon Dr		Cowlshaw	Ankatell	60	Add gated 60B	3
Athllon Dr		Learmonth	Florence Taylor	80	Add second gating 80B in median	1
Athllon Dr		Florence Taylor	Drakeford Dr	80	Add second gating 80B in median	1
Athllon Dr		Drakeford Dr	Fincham	80	Add gated 80B	3
Athllon Dr		Vosper	Atkins	80	Add second gating 80B in median	1
Athllon Dr		Atkins	Sulwood	80	Add second gating 80B on 2 way road	2
Athllon Dr		Sulwood	Depot Entrance	80	Add gated 80B	3
Athllon Dr		Beasley	Beasley	80	Add second gating 80B in median	1

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Athllon Dr		Beasley	Melrose	80	Add second gating 80B in median	1
Athllon Dr		Melrose	Parramatta	60	Add second gating 60B in median	1
Athllon Dr		Shea	Hindmarsh	60	Add gated 60B	3
Athllon Dr						
Baldwin Dr	E to S	William Slim	Gunn	80	Add second gating 80B on 2 way road	2
Baldwin Dr		Gunn	Maribryngong	60	Add gated 60B 2 way road	4
Baldwin Dr		Maribryngong	Maribryngong	60	Add second gating 60B on 2 way road	2
Baldwin Dr	N to W	Maribryngong	Maribryngong	60	Add second gating 60B on 2 way road	2
Baldwin Dr		Maribryngong	Gunn	60	Add second gating 60B on 2 way road	2
Baldwin Dr		Gunn	William Slim	60	Add second gating 60B on 2 way road	2
Baldwin Dr						
Barry Dr	S	Fairfax St	Dryandra St	80	Add second gating 80B in median	1
Barry Dr		McCaughey	Watson	60	Add gated 60B	3
Barry Dr		Moore St	Northbourne Av	60	Add gated 60B	3
Barry Dr		Northbourne Av	Mort St	60	Add second gating 60B in median	1
Barry Dr	N	Northbourne Av	Moore St	60	Add gated 60B	3
Barry Dr		Kingsley	North Rd	60	Add gated 60B	3
Barry Dr		North Rd	Clunies Ross	60	Add gated 60B	3
Barry Dr		Firth Rd	Fairfax St	80	Add gated 80B	3
Barry Dr						
Barton Hwy	W	Northbourne Av	Randwick Rd	80	Add second gating 80B in median	1
Barton Hwy		GDE	Bellenden St	80	Add gated 80B	3
Barton Hwy		Bellenden	William Slim	80	add single 80B reminder on left	1
Barton Hwy		William Slim	Victoria St	retain at 80 but could change to 90	Note this road has speed cameras both directions requiring several signage changes if limit changes	
Barton Hwy		Walleroo	NSW border	100	Add second gating 100B in median after Hall turnoff	1
Barton Hwy	E	NSW Border	Hall exit	100	Add gated 100B after 50 unless otherwise signposted	3
Barton Hwy		Walleroo	Victoria St	100	Add second gating 100B in median	1

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Barton Hwy		Victoria Street	William Slim Dr	retain at 80 but could change to 90	Note this road has speed cameras both directions requiring several signage changes if limit changes	
Barton Hwy		Ellenborough	Randwick Rd	80	Add gated 80B	3
Barton Hwy		Randwick	Northbourne	80	Add gated 80B	3
Barton Hwy						
Belconnen Way	E	Chewings	Beetaloo	60	Add second gating 60B in median	1
Belconnen Way		Beetaloo	Springvale	60	Add second gating 60B in median	1
Belconnen Way		Springvale	Schumack	60	Add second gating 60B in median	1
Belconnen Way		Schumack	Pettard	60	Add gated 60B	3
Belconnen Way		Coulter	Lathlain	80	Relocate Bike lane sign from feft speed limit sign	5
Belconnen Way		Lathlain	Benjamon Way	80	Relocate Bike lane sign from feft speed limit sign	5
Belconnen Way		Benjamin Way	Eastern Valley Way	80	Replace missing left 80B	6
Belconnen Way		Eastern Valley Way	Haydon Dr	80	Add second gating 80B in median	1
Belconnen Way		Haydon	GDE	80	Relocate Bike lane sign from feft speed limit sign	5
Belconnen Way		GDE	Macarthur Av	80	Relocate Bike lane sign from feft speed limit sign	5
Belconnen Way	W	Macarthur	GDE	80	Add gated 80B	3
Belconnen Way		Caswell	Haydon Dr	80	Add gated 80B	3
Belconnen Way		Benjamin Way	Lathlain	80	Add second gating 80B in median	1
Belconnen Way		Coulter	Pettard	60	Relocate signs (neighbourhood watch and direction) on both speed limit signs	5
Belconnen Way						
Belconnen Way		Schumack	Springvale	60	Add second gating 60B in median	1
Belconnen Way						
Bindubi St	S	Belconnen Way	Bindel	60	Add second gating 60B in median	1
Bindubi St		Bindel	Banjalong	80	Relocate Bike Lane sign from left of gated 80B	5
Bindubi St		Banjalong	William Hovell	80	Add gated 80B on 2 way road	2
Bindubi St					Relocate Bike Lane sign from left of gated 80B	5
Bindubi St	N	William Hovell	Lyttleton	80	Add gated 80B on 2 way road	4
Bindubi St		Lyttleton	Redfern	80	Add second gating 80B in median	1
Bindubi St		Redfern	Belconnen Way	60	Add second gating 60B in median	1

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Bindubi St						
Bowen Dr	S	King Edward Tce	Kings Av overpass	60	Add gated 60B	3
Bowen Dr						
Brisbane Av	E	National Cct	Macquarie St	60	Add gated 60B	3
Brisbane Av	W	Wentworth Av	Young St	60	Add gated 60B	3
Brisbane Av		National Cct	John McEwan	60	Add gated 60B	3
Brisbane Av						
Canberra Av	S	Mildura	Ipswich	80	Add second gating 80B in median	1
Canberra Av		Ipswich	Geelong	80	Add second gating 80B in median	1
Canberra Av		Geelong	Wyalla	80	Add second gating 80B in median	1
Canberra Av		Newcastle St	Tom Price St	80	Add gated 80B	3
Canberra Av		Harman Entry	NSW Border	80	Add gated 80B	3
Canberra Av	N	NSW Border	Harman Entry	80	Add second 80C on left	1
Canberra Av		Harman Entry	Tom Price St	100	Add second 100B in median	1
Canberra Av				80	Relocate traffic signal warning sign from same post as 80 limit sign	5
Canberra Av		Tom Price St	Hindmarsh Dr	80	Relocate traffic signal warning sign from same post as 80 limit sign	5
Canberra Av		Wyalla	Faulding	80	Add gated 80B	3
Canberra Av		Geelong	Monaro Hwy	80	Add second gating 80B in median	1
Canberra Av		Monaro Hwy	Mildura St	80	Add second gating 80B in median	1
Canberra Av		Nyrang	McMillan Cr	80	Add second gating 80B in median	1
Canberra Av		Lockyer	Lefroy	60	Add second gating 60B in median	1
Canberra Av		Manuka Cir	Empire Cct	60	Add gated 60B	3
Canberra Av		National Cct	Statew Circ	60	Add gated 60B	3
Canberra Av						
Capital Circle	E	Adelaide Av	Commonwealth Av	80	Add second gating 80B in median	1
Capital Circle	S	Commonwealth	Canberra Av	80	Add second gating 80B in median	1
Capital Circle		Canberra Av	Adelaide Av	80	Add gated 60B	3
Capital Circle						
Clarrie Hermies	W	Gungahlin	Kellway	80	Add gated 80B on 2 way road	4
Clarrie Hermies	E	Kellway	Gungahlin	80	Add gated 80B on 2 way road	4
Clarrie Hermies						

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
College St	E	Eastern Valley Way	Whelan	60	Add second gating 60B in median	1
College St					relocate sign from left speed limit sign	5
College St		Cooinda	Haydon Dr	60	Add second gating 60B on 2 way road	2
College St	W	School entrance	UC entrance	60	remove 60A in median and replace with gated 60B	6
College St		Whelan	Eastern Valley Way	60	Add gated 60B	3
College St						
Commonwealth Av	N	Coronation Dr	Flynn Pl	70	Add second gating 70B in median	1
Commonwealth Av	S	London Cct	Parkes Way	60	Add gated 60B	3
Commonwealth Av		King Edward	Queen Victoria	70	Add second gating 70B in median	1
Commonwealth Av		Queen Victoria	Capital Circle	80	Add second gating 80B in median	1
Commonwealth Av						
Constitution Av	W	Sellheim	Reg Saunders Wy	60	Add second gating 60B on 2 way road	2
Constitution Av		Reg Saunders Wy	Russell Dr	60	Add gated 60B 2 way road	4
Constitution Av		Russell Dr	Creswell	60	Add second gating 60B on 2 way road	2
Constitution Av		Anzac Park West	Car park	60	Add gated 60B 2 way road	4
Constitution Av		Coranderrk	Allara	60	Add gated 60B 2 way road	4
Constitution Av	E	London Circuit	Allara	60	Add gated 60B 2 way road	4
Constitution Av		Coranderrk	Anzac Park	60	Add gated 60B 2 way road	4
Constitution Av		Creswell	Blamey	60	Add gated 60B 2 way road	4
Constitution Av		Blamey	Reg Saunders Wy	60	Add gated 60B 2 way road	4
Constitution Av		Reg Saunders Wy	Sellheim	60	Add gated 60B 2 way road	4
Constitution Av						
Coppins Crossing	N	Uriarra Rd	northbound	80	Add second gating 80B on 2 way road	2
Coppins Crossing		approach to crossing	northbound	60	Add second gating 60B on 2 way road	2
Coppins Crossing		coppins crossing	northbound	80	Add second gating 80B on 2 way road	2
Coppins Crossing	S	William Hovell	southbound	80	Add second gating 80B on 2 way road	2
Coppins Crossing		crossing	southbound	80	Add second gating 80B on 2 way road	2
Coppins Crossing						

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Cotter Rd	W	Dunnrossil	Lady Denman	80	Add second gating 80B in median	1
Cotter Rd		McCulloch	Horse Holding paddock	80	Add second gating 80B on 2 way road	2
Cotter Rd		Tuggeranong Pkwy	Kirkpatrick	80	Add second gating 80B in median	1
Cotter Rd		Streeton	Uriarra	80	Add second gating 80B in median	1
Cotter Rd		Streeton	At depot	change 60 to 80	Remove 60B and replace with appropriate warning signs	6
Cotter Rd		Eucumbene	Cotter	80	Add gated 80B on 2 way road	4
Cotter Rd	E	Uriarra	Settlement	80	Add gated 80B on 2 way road	4
Cotter Rd		Settlement	Depot	change 60 to 80	Remove 60B and replace with appropriate warning signs	6
Cotter Rd		Streeton	Kirkpatrick	80	Add gated 80B	3
Cotter Rd		Tuggeranong Pkwy	Horse Paddock	80	Add second gating 80B on 2 way road	2
Cotter Rd		Lady Denman	Dunnrossil	80	Add second gating 80B in median	1
Cotter Rd		Dudley	Adelaide	80	Add second gating 80B in median	1
Cotter Rd						
Cotter Rd west of Eucumbene	W	Eucumbene	westbound	80	Add second gating 80B on 2 way road	2
Cotter Rd west of Eucumbene		before Mt Stromlo Rd	westbound	change 60 to 80	remove 60B and replace with appropriate warning signs for intersection	6
Cotter Rd west of Eucumbene		Mt Stromlo Rd	westbound	80	add second gating 80A on 2 way rd	2
Cotter Rd west of Eucumbene	S	Cotter River crossing	Pierces Ck Rd	60	Add second 100B on left side on 2 way road	2
Cotter Rd west of Eucumbene	N	On approach to Pierces Ck Rd		100 to 60	Add second 60B on 2 way road	2
Cotter Rd west of Eucumbene	E	before Mt Stromlo Rd	eastbound	change 60 to 80	remove 60B and replace with appropriate warning signs for intersection	6
Cotter Rd west of Eucumbene		Mt Stromlo Rd	eastbound	80	Add second gating 80B on 2 way road	2

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Cotter Rd west of Eucumbene						
Coulter Dr	S	Ginninderra	John Clelland	80	Add gated 80B	3
Coulter Dr		John Clelland	Joynton Smith	80	Add gated 80B	3
Coulter Dr		Lathlain busway	Southern Cross	80	Add second gating 80B in median	1
Coulter Dr		Southern Cross	Nettlefold	80	Add second gating 80B in median	1
Coulter Dr		Nettlefold	Belconnen Way	80	Add second gating 80B in median	1
Coulter Dr		Belconnen Way	Lachlan	80	Add second gating 80B on 2 way road	2
Coulter Dr		Lachlan	Springvale	80	Add second gating 80B on 2 way road	2
Coulter Dr		Springvale	William Hovell	80	Add second gating 80B in median	1
Coulter Dr	N	William Hovell	Springvale	80	Add second gating 80B in median	1
Coulter Dr		Springvale	Schumack	80	Add second gating 80B in median	1
Coulter Dr		Schumack	Belconnen Way	80	Add second gating 80B on 2 way road	2
Coulter Dr		Belconnen Way	Ogilby	80	Add second gating 80B in median	1
Coulter Dr					Relocate warning sign from left speed limit sign	5
Coulter Dr		Ogilby	Southern Cross	80	Add gated 80B	3
Coulter Dr		Southern Cross	Joynton Smith	80	Add second gating 80B in median	1
Coulter Dr		Joynton Smith	John McLelland	80	Add gated 80B	3
Coulter Dr						
Drake Brockman	W	Kingsford Smith	Kinsella	80	Add second gating 80B in median	1
Drake Brockman		Kinsella	Cussen	80	Add gated 80B	3
Drake Brockman		McNaughton	Trickett	60	Add gated 60B 2 way road	4
Drake Brockman		Trickett	Spofforth	60	Add gated 60B 2 way road	4
Drake Brockman	E	Spofforth	Trickett	60	Add gated 60B 2 way road	4
Drake Brockman		Trickett	McNaughton	60	Add gated 60B 2 way road	4
Drake Brockman		Cussen	Kinsella	80	Add second gating 80B on 2 way road	2
Drake Brockman		Kinsella	Kingsford Smith	80	Add gated 80B on 2 way road	4
Drake Brockman						
Drakeford Dr	N	Tharwa Dr	Woodcock	80	Add second gating 80B in median	1
Drakeford Dr		Athllon	Soward	80	Add gated 80B	3
Drakeford Dr		Soward Way	Mortimer Lewis	80	Add second gating 80B in median	1
Drakeford Dr		Mortimer Lewis	Athllon Dr	80	Add second gating 80B in median	1
Drakeford Dr		Athllon	Ohalloran	80	Add second gating 80B in median	1

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Drakeford Dr		Ohalloran	Ohalloran	80	Add second gating 80B in median	1
Drakeford Dr		Ohalloran	Boddington	80	Add second gating 80B in median	1
Drakeford Dr		Boddington	Sulwood	80	Add second gating 80B in median	1
Drakeford Dr		Sulwood	Hindmarsh	100	Add second gating 100B on 2 way road	4
Drakeford Dr	S	Sulwood	Marconi	80	Add second gating 80B in median	1
Drakeford Dr		Marconi	Summerland	80	Add second gating 80B in median	1
Drakeford Dr		Summerland	Summerland	80	Add second gating 80B in median	1
Drakeford Dr		Summerland	Athllon Dr	80	Add second gating 80B in median	1
Drakeford Dr		Athllon	Taverner	80	Add second gating 80B in median	1
Drakeford Dr		Erindale	Isabella	80	Add second gating 80B in median	1
Drakeford Dr		Isabella	Narooma	80	Add second gating 80B in median	1
Drakeford Dr		Narooma	Hurley	80	Add gated 80B	3
Drakeford Dr		Johnson	Tharwa	80	Add gated 80B	3
Drakeford Dr						
Eastern Valley Way	S	Emu Bank	Aikman	70	Remove existing 60B and replace with gated 70B	6
Eastern Valley Way		Aikman	College	70	Add gated 70B	3
Eastern Valley Way		College	Crisp	70	Add second gating 70B in median	1
Eastern Valley Way		Crisp	Hennessy	70	Add second gating 70B in median	1
Eastern Valley Way		Hennessy	Belconnen Way	change 70 to 60	Remove existing 70B and replace with gated 60B	6
Eastern Valley Way	N	Belconnen Way	Hennessy	70	Add second gating 70B in median	1
Eastern Valley Way		College	Aikman	60	Add second gating 60B in median	1
Eastern Valley Way						
Ellenborough St	N	Northbourne Av	Brigalow	60	replace existing 60A with gated 60B	6
Ellenborough St		Ginninderra	Crossington Smith	60	Add gated 60B	3
Ellenborough St		Barton Hwy	GDE	60	Add second gating 60B in median	1
Ellenborough St	S	Barton Hwy	Crossington Smith	60	Add second gating 60B on 2 way road	2
Ellenborough St		Ginninderra Dr	Brigalow	60	Add gated 60B	3
Ellenborough St						
Erindale Dr	E and N	Drakeford Dr	Charleston	80	Add second gating 80B on 2 way road	2
Erindale Dr		Charleston	Sudkins	80	Add gated 80B on 2 way road	4
Erindale Dr		Taverner	Amsink	80	Add second gating 80B on 2 way road	2
Erindale Dr		Amsink	Ashley	80	Add second gating 80B on 2 way road	2
Erindale Dr		Ashley	Sternberg	80	Add second gating 80B on 2 way road	2

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Erindale Dr		Sulwood	Long Gully	80	Add second gating 80B in median	1
Erindale Dr		Long Gully	Julia Flynn	80	Add second gating 80B in median	1
Erindale Dr	S and W	Long Gully	Sulwood	80	Add second gating 80B in median	1
Erindale Dr		Taverner	Sudkins	80	Add gated 80B on 2 way road	4
Erindale Dr		Sudkin	Charleston	80	Add gated 80B on 2 way road	4
Erindale Dr		Charleston	Drakeford Dr	80	Add gated 80B on 2 way road	4
Erindale Dr						
Fairbairn	E and S	Anzac Pde	Treloar	Change 60 to 70	Add gated 70B	3
Fairbairn		Treloar	Mt Ainslie Dr	Change 60 to 70	Add gated 70B on 2 way road	4
Fairbairn		Mt Ainslie Dr	Truscott St	Change 60 to 70	Replace existing 60B signs with gated 70B	6
Fairbairn		Northcott Dr	Robert Campbell	Change 60 to 70	Replace existing 60B signs with gated 70B	6
Fairbairn		Robert Campbell	Morshead Dr	80	Add gated 80B on 2 way road	4
Fairbairn		Morshead	Majura Rd	80	Add gated 80B	3
Fairbairn		Majura Rd	Pialligo	80	Add gated 80B	3
Fairbairn	N and W	Pialligo	Majura Rd	80	Add gated 80B	3
Fairbairn		Majura Rd	Morshead Dr	80	Add gated 80B	3
Fairbairn		Morshead	Addison	80	Add gated 80B	3
Fairbairn				Change 60 to 70	After "50 unless otherwise signposted" replace 60B with 70B	6
Fairbairn				Change 60 to 70	Move "50 unless otherwise signposted" to within 100m of new 70B sign	5
Fairbairn		Robert Campbell	Northcott Dr	Change 60 to 70	Replace existing 60B with gated 70B on 2 way road	6
Fairbairn		Northcott Dr	Truscott	Change 60 to 70	Replace gated 60B with Gated 70B and relocate Bike Path sign	6
Fairbairn		Truscott	Mt Ainslie	Change 60 to 70	Replace existing 60B with gated 70 B	6
Fairbairn		Mt Ainslie	Treloar	Change 60 to 70	Replace existing 60B with gated 70 B	6
Fairbairn		Treloar	Anzac Pde	Change 60 to 70	Add gated 70B	3
Fairbairn						
Fairbairn						
Flemington Rd	NW to N	Federal Hwy	Randwick	60	Add second gating 60B in median	1
Flemington Rd		Randwick	Sandford St	80	Add gated 80B north of EPIC entrance to make 80K zone correct min length	3

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Flemington Rd		Lysaght	Nullabor	60	Add second gating 60B on kerb	1
Flemington Rd		Tip entrance	Nullabor	80	Add gated 80B immediately north of tip entrance	3
Flemington Rd		Nullabor	Mapleton	80	Add second gating 80B in median	1
Flemington Rd		Mapleton	Sapling	60	Add second gating 60B on 2 way road	2
Flemington Rd	S	Sapling	Mapleton	80	Add second gating 80B on 2 way road	2
Flemington Rd		Mapleton	Nullabor	80	Add second gating 80B on 2 way road	2
Flemington Rd		Nullabor	tip entrance	80	Remove existing 80A and provide gated 80B close to Nullabor	6
Flemington Rd		Tip entrance	southbound	60	Replace existing 60B with gated 60C	6
Flemington Rd		Sandford	Randwick	80	Remove 60A on left	5
Flemington Rd		Randwick	EPIC entrance	Change Start 60	Add gated 60B	3
Flemington Rd						
Florey Dr	N	Southern Cross	Osborne	60	Add gated 60B 2 way road	4
Florey Dr		Osborn	Osborne	60	Add second gating 60B on 2 way road	2
Florey Dr		Osborn	Handcock	60	Add gated 60B 2 way road	4
Florey Dr		Handcock	Ginninderra	60	Add gated 60B 2 way road	4
Florey Dr	S	Ginninderra	Herron	60	Add second gating 60B on 2 way road	2
Florey Dr		Handcock	Herron	60	Add gated 60B 2 way road	4
Florey Dr		Osborn	Osborne	60	Add second gating 60B on 2 way road	2
Florey Dr		Osborn	Southern Cross	60	Add second gating 60B on 2 way road	2
Florey Dr						
Ginninderra Dr	E	Kerrigan	Archdall	80	Add second gating 80B on 2 way road	2
Ginninderra Dr		Archdall	Lance Hill	80	Add second gating 80B on 2 way road	2
Ginninderra Dr					raise existing 80B on left to provide 2m from ground	5
Ginninderra Dr		Lance Hill	Florey Dr	80	Add gated 80B	3
Ginninderra Dr		Florey	Tilyard	80	Add second gating 80B in median	1
Ginninderra Dr		Tilyard	Companion	80	Add second gating 80B in median	1
Ginninderra Dr		Companion	Kingsford Smith	80	Add second gating 80B in median	1
Ginninderra Dr		Kingsford Smith	Copland	80	Add second gating 80B in median	1
Ginninderra Dr		Coulter	William Webb	80	Add second gating 80B in median	1
Ginninderra Dr		William Webb	William Slim	80	Add second gating 80B in median	1
Ginninderra Dr		William Slim	Aikman	80	Add second gating 80B in median	1

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Ginninderra Dr		Aikman	Baldwin	80	Add gated 80B	3
Ginninderra Dr		Baldwin	Braybrooke	80	Add second gating 80B in median	1
Ginninderra Dr		Braybrooke	GDE	80	Add second gating 80B in median	1
Ginninderra Dr	W	Braybrooke	Haydon	80	Add second gating 80B in median	1
Ginninderra Dr		UC entrance	Aikman	80	Add second gating 80B in median	1
Ginninderra Dr		Aikman	William Slim	80	Add gated 80B	3
Ginninderra Dr		William Slim	William Webb	80	Add gated 80B	3
Ginninderra Dr		William Webb	Coulter	80	Add second gating 80B in median	1
Ginninderra Dr		Coulter	Copland	80	Add second gating 80B in median	1
Ginninderra Dr		Copland	Kingsford Smith	80	Add second gating 80B in median	1
Ginninderra Dr		Companionm	Tilyard	80	Add second gating 80B in median	1
Ginninderra Dr		Tilyard	Florey Dr	80	Add gated 80B	3
Ginninderra Dr		Florey	Lance Hill	80	Add second gating 80B on 2 way road	2
Ginninderra Dr						
Gundaroo Dr	N	First roundabout	Nudurr	80	Add gated 80B on 2 way road	4
Gundaroo Dr		Nudurr	Burrows	80	Replace existing 80A with gated 80B on 2 way road	6
Gundaroo Dr		Ibis	Gungahlin Dr	80	Add second gating 80B in median	1
Gundaroo Dr		Gungahlin Dr	Narri	80	Add gated 80B on 2 way road	4
Gundaroo Dr					Relocate Form 1 Land from speed limit sign	5
Gundaroo Dr		Mirrabei	James Kirk	60	Add gated 60B 2 way road	4
Gundaroo Dr		James Kirk	Nellie Hamilton	60	Add second gating 60B in median	1
Gundaroo Dr		Nellie Hamilton	Hollingsworth	60	Add second gating 60B in median	1
Gundaroo Dr	S	Horse Park Dr	Pallin	60	Add second gating 60B in median	1
Gundaroo Dr		Pallin	Gungahlin Pl	60	Add second gating 60B in median	1
Gundaroo Dr		Gozzard	Anthony Rolfe	60	Add gated 60B	3
Gundaroo Dr		Anthony Rolfe	Ginn	80	Add second gating 80B on 2 way road	2
Gundaroo Dr		Ginn	Gungahlin Dr	80	Add second gating 80B on 2 way road	2
Gundaroo Dr		Burrows	Nudurr	80	Add second gating 80B in median	1
Gundaroo Dr		Nudurr	new roundabout	80	Add second gating 80B on 2 way road	2
Gundaroo Dr		New roundabout	Barton Hwy	80	Add gated 80B on 2 way road	4
Gundaroo Dr						

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Gungahlin Drive	N & W	Glenlock Interchange	Barton Highway	Change 80 to 90	Provide appropriate signage on ramps as well as through road	
Gungahlin Drive		Barton Hwy	Sanford St	80	Add second gating 80B in median	
Gungahlin Drive		Gundaroo	Lexcen	80	Add second gating 80B in median	
Gungahlin Drive		Lexcen	Kelleway	80	Add gated 80B	
Gungahlin Drive		Kelleway	Horse Park Dr	80	Add second gating 80B on 2 way road	
Gungahlin Drive	E & S	Horse Park Dr	Wanganeen	80	Add second gating 80B on 2 way road	
Gungahlin Drive		Lexcen	Gundaroo	80	Add second gating 80B on 2 way road	
Gungahlin Drive		Gundaroo	The Valley Av	80	Add second gating 80B in median	
Gungahlin Drive		Barton Hwy	Glenlock Interchange	Change 80 to 90	Provide appropriate signage on ramps as well as through road	
Gungahlin Drive						
Haydon Dr	N	Belconnen Way	Mary Potter	80	Add second gating 80B in median	1
Haydon Dr		Mary Potter Nth	Purdie	80	Add second gating 80B in median	1
Haydon Dr		Battye	College	80	Add gated 80B	3
Haydon Dr		College	Eardley	80	Add second gating 80B in median	1
Haydon Dr	S	Ginninderra	Eardley	80	Add second gating 80B in median	1
Haydon Dr		College	Battye	80	Add gated 80B	3
Haydon Dr		Purdie	Mary Potter Nth	80	Add gated 80B	3
Haydon Dr						
Hindmarsh Dr	E	Darwinia	Wyangala	80	Replace 80A with gated 80B on 2 way road	6
Hindmarsh Dr		Wyangala	Bangalay	80	Add gated 80B on 2 way road	4
Hindmarsh Dr		Dixon Dr	Williamson	80	Add gated 80B on 2 way road	4
Hindmarsh Dr		Streeton	Brierly	80	Add second gating 80B in median	1
Hindmarsh Dr		Brierly	Namatjira	80	Add gated 80B	3
Hindmarsh Dr		Namatjira	McInnes	80	Add second gating 80B in median	1
Hindmarsh Dr		McInnes	Badimara	80	Add gated 80B	3
Hindmarsh Dr		Tuggeranong Pkwy	Launceston	80	Add gated 80B	3
Hindmarsh Dr		Launceston	Eggleston	80	Add gated 80B	3
Hindmarsh Dr		Eggleston	Melrose	80	Add second gating 80B in median	1
Hindmarsh Dr		Ainsworth	Yamba	80	Add second gating 80B in median	1
Hindmarsh Dr		Yamba	Palmer	80	Add second gating 80B in median	1

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Hindmarsh Dr		Tyagarra	Mugga Way	80	Add second gating 80B in median	1
Hindmarsh Dr		Monaro Hwy	Canberra Av	80	Add gated 80B	3
Hindmarsh Dr	W	Monaro Hwy	Jerrabomberra	80	Add second gating 80B in median	1
Hindmarsh Dr		Jerrabomberra	Mugga Lane	80	Add second gating 80B in median	1
Hindmarsh Dr		Mugga Lane	Mugga Way	80	Add gated 80B	3
Hindmarsh Dr		Palmer	Yamba	80	Add second gating 80B in median	1
Hindmarsh Dr		Yamba	Butters	80	Add gated 80B	3
Hindmarsh Dr		Melrose	Eggleston	80	Add second gating 80B in median	1
Hindmarsh Dr		Launceston	Tugg Pkwy	80	Add gated 80B	3
Hindmarsh Dr		Badimara	Larrakia	80	Add second gating 80B in median	1
Hindmarsh Dr		Mclnnes	Namatjira	80	Add second gating 80B in median	1
Hindmarsh Dr		Namatjira	Brierly	80	Add second gating 80B in median	1
Hindmarsh Dr		Streeton	Williamson	80	Add second gating 80B on 2 way road	2
Hindmarsh Dr		Carbeen	Dixon	80	Add gated 80B on 2 way road	4
Hindmarsh Dr		Bangalay	Wyangala	80	Add gated 80B on 2 way road	4
Hindmarsh Dr						
Horse Park Dr	N	Gungahlin	Newlop	80	Add second gating 80B on 2 way road	2
Horse Park Dr	S	Newlop	Gungahlin	80	Add second gating 80B on 2 way road	2
Horse Park Dr						
Horse Park Dr	E	Mornington	Katherine	80	Add second gating 80B on 2 way road	2
Horse Park Dr		Francis Forde	Gundaroo	80	replace 80A with gated 80B on a 2 way road	6
Horse Park Dr		Gundaroo	Anthony Rolfe	80	Add second gating 80B on 2 way road	2
Horse Park Dr		Anthony Rolfe	Mapleton	80	Add second gating 80B on 2 way road	2
Horse Park Dr		Mapleton	Federal Hwy	80	Add second gating 80B on 2 way road	2
Horse Park Dr	W	Federal Hwy	Mapleton	80	Add second gating 80B on 2 way road	2
Horse Park Dr		Mapleton	Anthony Rolfe	80	Add second gating 80B on 2 way road	2
Horse Park Dr		Anthony Rolfe	Gundaroo	80	Add second gating 80B on 2 way road	2
Horse Park Dr		Gundaroo	Francis Forde	80	Add second gating 80B on 2 way road	2
Horse Park Dr		Francis Forde	Katherine	80	Add second gating 80B on 2 way road	2
Horse Park Dr						
Isabella Dr	E	Drakeford Dr	Clive Steele	80	Add second gating 80B on 2 way road	2
Isabella Dr		Clive Steele	Cockcroft	80	Add gated 80B on 2 way road	4
Isabella Dr		Ashley	Kellett	80	Add second gating 80B on 2 way road	2

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Isabella Dr		Kellett	Coyne	80	Add second gating 80B on 2 way road	2
Isabella Dr		Coyne	Monaro Hwy	80	Add gated 80B	3
Isabella Dr	W	Monaro Hwy	Rose Cottage access	80	Add gated 80B	3
Isabella Dr		Benham	Goldstein	80	Add gated 80B	3
Isabella Dr		Goldstein	Ashley	80	Add gated 80B	3
Isabella Dr		Ashley	Cockcroft	80	Add gated 80B on 2 way road	4
Isabella Dr		Cockcroft	Drumston	80	Add gated 80B on 2 way road	4
Isabella Dr		Drumston	Drakeford	80	Add second gating 80B on 2 way road	2
Isabella Dr						
Johnson Dr	E	Johnson	Ellerston	80	Add gated 80B	3
Johnson Dr		Ellerston	Ashley	80	Add second gating 80B on 2 way road	2
Johnson Dr		Ashley	Were	80	Add second gating 80B on 2 way road	2
Johnson Dr		Were	Clift	80	Add gated 80B on 2 way road	4
Johnson Dr		Clift	Tharwa	80	Add gated 80B on 2 way road	4
Johnson Dr	W	Tharwa	Clift	80	Add gated 80B on 2 way road	4
Johnson Dr		Clift	Were	80	Add gated 80B on 2 way road	4
Johnson Dr		Were	Ashley	80	Add second gating 80B on 2 way road	2
Johnson Dr		Ashley	Outrim	80	Add second gating 80B on 2 way road	2
Johnson Dr		Outrim	Drakeford	80	Add second gating 80B on 2 way road	2
Johnson Dr						
Kings Av	N	State Circle	National Circuit	60	Add gated 60B	3
Kings Av		Macquarie St	Blackall St	60	Add gated 60B	3
Kings Av		Kings Av rndabout	Russell Dr	60	Add second gating 60B in median	1
Kings Av	S	Russell Dr	Kings Av Roundabt	60	Add gated 60B	3
Kings Av		Kings Av Roundabt	Blackall St	80	Relocate 80B signs to close to roundabout exit	5
Kings Av		National Circuit	State Circle	60	Add gated 60B	3
Kings Av						
Kingsford Smith	N	Drake Brockman	Belconnen Way	80	Add second gating 80B in median	1
Kingsford Smith		Belconnen Way	Findlay	80	Add gated 80B	3
Kingsford Smith		Findlay	Wirraway	80	Add second gating 80B in median	1

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Kingsford Smith		Castleau	Southern Cross	80	Add gated 80B	3
Kingsford Smith		Southern Cross	Oloughlin	80	Add gated 80B	3
Kingsford Smith		Oloughlin	Kreft	80	Add gated 80B	3
Kingsford Smith		Kreft	Ginninderra	80	Add gated 80B	3
Kingsford Smith		Companion	Verbruggen	70	Add gated 70B	3
Kingsford Smith		Dolling	Chinner	70	Add gated 70B	3
Kingsford Smith		Alfred Hill	Spalding	70	Add gated 70B	3
Kingsford Smith		Alpen	Bainton	70	Add second gating 70B on 2 way road	2
Kingsford Smith		Magrath	Magrath	70	Add second gating 70B on 2 way road	2
Kingsford Smith	S	Kuringa	Clarey	70	Add second gating 70B on 2 way road	2
Kingsford Smith		Oneill	Baddley	70	Add gated 70B on 2 way road	4
Kingsford Smith		Baddley	Bainton	70	Add gated 70B on 2 way road	4
Kingsford Smith		Alpen	LeGallienne	70	Add gated 70B on 2 way road	4
Kingsford Smith		Alfred Hill	Chinner	70	Add gated 70B	3
Kingsford Smith		Verbruggen	Companion	70	Add second gating 70B in median	1
Kingsford Smith		Companion	Ginninderra	80	Add second gating 80B in median	1
Kingsford Smith		Ginninderra	Kreft	80	Add gated 80B	3
Kingsford Smith		Kreft	Oloughlin	80	Add second gating 80B in median	1
Kingsford Smith		Oloughlin	Southern Cross	80	Add gated 80B	3
Kingsford Smith		Southern Cross	Wirraway	80	Add gated 80B	3
Kingsford Smith		Wirraway	Findlay	80	Add second gating 80B in median	1
Kingsford Smith		Findlay	Belconnen Way	80	Add second gating 80B in median	1
Kingsford Smith						
Kuringa Dr	S	Barton Hwy	Owen Dixon	80	Add second gating 80B in median	1
Kuringa Dr				70	Add second gating 70B on 2 way road	2
Kuringa Dr	W	Kingsford Smith	westbound	70	Add second gating 70B on 2 way road	2
Kuringa Dr					Relocate advisory speed sign from speed limit sign	5
Kuringa Dr	E	Western end	Kingsford Smith	70	Add second gating 70B on 2 way road	2
Kuringa Dr		Kingsford Smith	Owen Dixon	70	Relocate existing 70B away from intersection	5
Kuringa Dr					Add second gating 70B on 2 way road	2
Kuringa Dr		Owen Dixon	Barton Hwy	80	Add second gating 80B on 2 way road	2
Kuringa Dr						
Limestone Av	N	Anzac Pde	Euree	60	Add second gating 80B in median	1

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Limestone Av		Ainslie	Batman	60	Add gated 60B	3
Limestone Av		Donaldson	Elder	60	Add gated 60B	3
Limestone Av		Girrahween	Henty	60	Add gated 60B	3
Limestone Av		Ipima	Ijong	60	Add gated 60B	3
Limestone Av	S	Wakefield	Ijong	60	Add second gating 60B in median	1
Limestone Av		Cowper	Hargraves	60	Add gated 60B	3
Limestone Av		Grimes	Higgins	60	Add gated 60B	3
Limestone Av		Chisholm	Alt	60	Add gated 60B	3
Limestone Av		Ainslie	Allambee	60	Add gated 60B	3
Limestone Av		Treloar	Anzac	60	Add second gating 60B in median	1
Limestone Av						
Limestone Av						
Long Gully	E	Erindale	Mugga Lane	80	Add second gating 80B on 2 way road	2
Long Gully					relocate warning sign from speed limit sign	5
Long Gully		Mugga Lane	Tip access	80	Add gated 80B on 2 way road	4
Long Gully	W	Monaro Hwy	Tip access	80	Add second gating 80B in median	1
Long Gully		Tip access	Mugga Lane	80	Add gated 80B on 2 way road	4
Long Gully		Mugga Lane	Erindale	80	Add second gating 80B on 2 way road	2
Long Gully						
Macarthur Av	E	Barry Dr	Dryandra Street	80	Add 80B repeater on left	1
Macarthur Av				60	Relocate advisory speed sign from speed limit sign	5
Macarthur Av		Dryandra	Miller	60	Add second gating 60A in median	1
Macarthur Av		Miller	Wonga	60	Add gated 60B	3
Macarthur Av		Hovea	Wattle	60	Add gated 60B	3
Macarthur Av	W	David	Macpherson	60	Add gated 60B	3
Macarthur Av		Macpherson	Peel	60	Add second gating 60B in median	1
Macarthur Av		Miller	Dryandra Street	60	Add gated 60B	3
Macarthur Av						
Melrose Dr	N	Athllon	Hodgeson	change 60 to 70	replace existing 60B with gated 70B	6
Melrose Dr		Hodgeson	Parramatta	change 60 to 70	replace 60B on left with 70B	6
Melrose Dr		Parramatta	Eggleston	change 60 to 70	replace existing 60B with gated 70B	6
Melrose Dr		Botany	Hoindmarsh	change 60 to 70	Add gated 70B	3
Melrose Dr		Launceston	Yarra Glen	change 60 to 70	Add second gating 70B in median	

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Melrose Dr	S	Hindmarsh	Botany	60	Add second gating 60B in median	1
Melrose Dr		Egglestone	Parramatta	60	Add second gating 60B in median	1
Melrose Dr		Hodgeson	Athllon	60	Add gated 60B	3
Melrose Dr						
Mirrabei Dr	W	Gundaroo	Paul Coe	80	Add second gating 80B on 2 way road	2
Mirrabei Dr					Relocate Form 1 Lane sign from speed limit sign	5
Mirrabei Dr		Paul Coe	Paul coe	80	Add second gating 80B on 2 way road	2
Mirrabei Dr		Paul Coe	Wangareen	80	Add second gating 80B on 2 way road	2
Mirrabei Dr		Wangareen	Len Waters	80	Add second gating 80B on 2 way road	2
Mirrabei Dr	S	Len Waters	Wangareen	80	Add second gating 80B on 2 way road	2
Mirrabei Dr		Wangareen	Shoalhaven	80	Add second gating 80B on 2 way road	2
Mirrabei Dr		Paul Coe	Gundaroo	80	Add second gating 80B on 2 way road	2
Mirrabei Dr						
Monaro Hwy	N	Johnson Dr	Isabella Dr	100 then 80	Relocate start of 100 zone to just north of Johnson Dr	5
Monaro Hwy		Johnson Dr	Isabella Dr	in advance of 80	Replace existing gated R4-1 sign with AHEAD plate beneath with gated G9-79 signs	6
Monaro Hwy		Isabella Dr	Lanyon Dr	retain at 80 but could change to 90	Note this road has speed cameras both directions requiring several signage changes if limit changes	
Monaro Hwy		Lanyon Dr	Prison entrance	100	Add gated 100B	3
Monaro Hwy		approach to prison entrance		change 80 to 100	Remove 80B signs and replace with appropriate warning signs	6
Monaro Hwy		Prison Rd	Hindmarsh Dr	change start of 80 zone	Remove existing 80B so 80 zone does not start until after Hindmarsh Drive	5
Monaro Hwy		Monaro exit ramp	Hindmarsh Dr	80	Add gated 80C	3
Monaro Hwy		Hindmarsh Drive	Pialligo Road	change 80 to 90	Remove 80B signs and replace with gated 90B signs	1
Monaro Hwy	S	Pialligo Road	Hindmarsh Dr	change 80 to 90	Remove 80B signs and replace with gated 90B signs	1
Monaro Hwy		Pialligo lights	Dairy Rd	80	Add 80B reminder on left	1
Monaro Hwy		Monaro exit ramp	Newcastle St	60	Add gated 60B	3
Monaro Hwy		Hindmarsh	Monaro on ramp	100	Add gated 100B	3

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Monaro Hwy		Hindmarsh	Prison Rd	100	Replace missing left 100B	6
Monaro Hwy		approach to prison entrance		change 80 to 100	Remove 80B signs and replace with appropriate warning signs	6
Monaro Hwy		Prison Rd	Lanyon Dr	start 80	Relocate gated 80C to closer to Lanyon Drive intersection	5
Monaro Hwy		Lanyon Dr	Isabella Dr	retain at 80 but could change to 90	Note this road has speed cameras both directions requiring several signage changes if limit changes	
Monaro Hwy						
Monaro Hwy	N	Before Angle Crossing	northbound	80	Add second gating 80B on 2 way road	2
Monaro Hwy		After Williamsdale Rd	northbound	100	Add second gating 100B on 2 way road	2
Monaro Hwy		Royalla Rd	Old Cooma	100	Add second gating 100B on 2 way road	2
Monaro Hwy		Old Cooma Rd	northbound	100	Add second gating 100B on 2 way road	2
Monaro Hwy		Old Cooma Rd	Johnson Dr	80/100	move 80 Ahead signs 100 metres earlier	5
Monaro Hwy	S	Johnson Dr	southbound	100	Add second gating 100B on 2 way road	2
Monaro Hwy		Old Cooma Rd	southbound	100	Add second gating 100B on 2 way road	2
Monaro Hwy		Royalla Rd	southbound	100	Add second gating 100B on 2 way road	2
Monaro Hwy		Before Williamsdale Dr	southbound	80	Add second gating 80B on 2 way road	2
Monaro Hwy		Angle Crossing Rd	southbound	100	Add second gating 100B on 2 way road	2
Monaro Hwy						
Morshead Dr	W	Fairbairn Av	Pialligo	80	Add gated 80B	3
Morshead Dr		Pialligo Av	Monaro Hwy	80	Add gated 80B	3
Morshead Dr		Monaro Hwy	Duntroon entrance	80	Add gated 80B	3
Morshead Dr		Russell Dr	Kings Av	80	Add gated 80B	3
Morshead Dr	E	Kings Hwy	Russell Dr	80	Add gated 80B	3
Morshead Dr		Russell Dr	Duntroon entrance	80	Add gated 80B	3
Morshead Dr		Duntroon entrance	Monaro Hwy	80	Add gated 80B	3
Morshead Dr		Monaro Hwy	Pialligo Av	80	Add gated 80B	3

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Morshead Dr						
Mugga lane	N	Long Gully Rd	Tip entrance	80	Add second gating 80B on 2 way road	2
Mugga lane		Tip entrance	northbound	80	Add gated 80B on 2 way road	4
Mugga lane						
NAAS Rd	S	Tharwa town limit	southbound	80	Add second gating 80B on 2 way road	2
NAAS Rd		South of Namadgi Park entry	southbound	100	Add second gating 100B on 2 way road	2
NAAS Rd	N	South of Namadgi Park entry	northbound	80	Add second gating 80B on 2 way road	2
NAAS Rd		Tharwa town limit	northbound	60	Add second gating 60B on 2 way road	2
Northbourne Av	N	London Cct	Alinga	60	Add gated 60B	3
Northbourne Av		Rudd	Barry Dr	60	Add gated 60B	3
Northbourne Av		Barry Dr	McKay	60	Add second gating 60B in median	1
Northbourne Av		Masson	Greenway	60	Add second gating 60B in median	1
Northbourne Av		Condamine	Macarthur	60	Relocate Cycle Lane sign from left speed limit sign	5
Northbourne Av		Macarthur	Murdoch	60	Relocate Cycle Lane sign from left speed limit sign	5
Northbourne Av		Murdoch	Moat	60	Add second gating 60B in median	1
Northbourne Av	S	Barton Hwy	Swinden St	60	Relocate Cycle Lane sign from left speed limit sign	5
Northbourne Av		Swinden	Antill	60	Relocate Cycle Lane sign from left speed limit sign	5
Northbourne Av		Antill	Morphett	60	Relocate Cycle Lane sign from left speed limit sign	5
Northbourne Av		Morphett	Wakefield	60	Add second gating 60B in median	1
Northbourne Av					Relocate Cycle Lane sign from left speed limit sign	5
Northbourne Av		Wakefield	Ipima	60	Relocate Cycle Lane sign from left speed limit sign	5
Northbourne Av		Girrahween	Eloura	60	Add second gating 60B in median	1
Northbourne Av					Relocate left speed limit sign from parking limit sign	5
Northbourne Av		Cooyong	Bunda	60	Add gated 60B	3
Northbourne Av						
Northcott Drive	S	Fairbairn Av	ADFA entrance	60	Add second gating 60B on 2 way road	2
Northcott Drive		ADFA entrance	Sellheim	60	Add gated 60B 2 way road	4
Northcott Drive				change 40 to 60	Remove 40 speed limit and replace with curve warning signs	6

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Northcott Drive	N	Sellheim	ADFA entrance	change 40 to 60	Remove 40 speed limit and replace with curve warning signs	6
Northcott Drive				60	Add second gating 60A on 2 way road	2
Northcott Drive						
Paddys River/Tidbinbilla	S	approaching Tharwa	400m before town limit	100	Add gated 50 Ahead sign	3
Paddys River/Tidbinbilla		at Tharwa town limit		change 60 buffer to 50 Ahead	Remove gated 60B and replace with gated 50B	6
Paddys River/Tidbinbilla	N	At Tharwa town limit	northbound	change 60 buffer to 100	Remove 60B and provide gated 100B	6
Paddys River/Tidbinbilla		approaching Laure Camp Road	northbound	100	Remove 60B and provide appropriate intersection warning signs	6
Paddys River/Tidbinbilla						
Parkes Way	E	Commonwealth Av	Corranderrk	80	replace missing 80B on left	6
Parkes Way		Corranderrk	Anzac Pde	80	Add gated 80B	3
Parkes Way	W	Anzac Pde	Corranderrk	80	Add gated 80B	3
Parkes Way		Lady Denman Dr off ramp		60	Add gated 60B	3
Randwick Rd	N	Barton Hwy	Flemington Rd	60	Replace existing 60A with gated 60B	6
Randwick Rd	S	Flemington Rd	Barton Hwy	60	Add gated 60B	3
Randwick Rd						
SmithRoad	S	NAAS RD	Angle Crossing	RD	Add gated end 80 km/h (rather than 100 default)	4
SmithRoad						
Southern Cross Dr	W	Ratcliffe	Chewings	80	Add gated 80B	3
Southern Cross Dr		Chewings	Ratcliffe	80	Add gated 80B	3
Southern Cross Dr		Ross Smith	Kingsford Smith	80	Add second gating 80B in median	1
Southern Cross Dr					Relocate Bike Lane sign from speed limit sign	5
Southern Cross Dr		Starke	Chave	60	Add gated 60B	3
Southern Cross Dr		Florey	Starke	60	Add gated 60B 2 way road	4
Southern Cross Dr		Starke	Beaurepaire	60	Add gated 60B 2 way road	4
Southern Cross Dr		Beaurepaire	Oreilly	60	Add gated 60B 2 way road	4

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Southern Cross Dr		Oreilly	Spofforth	60	Add gated 60B 2 way road	4
Southern Cross Dr	E	end	Spofforth	60	Add gated 60B 2 way road	4
Southern Cross Dr		Spofforth	Oreilly	60	Add gated 60B 2 way road	4
Southern Cross Dr		Oreilly	Beaurepaire	60	Add gated 60B 2 way road	4
Southern Cross Dr		Beaurepaire	Starke	60	Add gated 60B 2 way road	4
Southern Cross Dr		Floreay	Moyes	60	Add gated 60B	3
Southern Cross Dr		Chave	Oloughlin	60	Add gated 60B	3
Southern Cross Dr		oloughlin	Kingsford Smith	60	Add gated 60B	3
Southern Cross Dr		Kingsford Smith	Ross Smith	80	Add second gating 80B in median	1
Southern Cross Dr		Ross Smith	Ratcliffe	80	Add gated 80B	3
Southern Cross Dr		Chewings	Ratcliffe	80	Add gated 80B	3
Southern Cross Dr		Ratcliffe	Coulter	80	Add second gating 80B in median	1
Southern Cross Dr						
State Circle	Clockwise	Flynn	Commonwealth Av	70	Add second gating 70A in median	1
State Circle		Commonwealth Av	Kings Av	70	Add gated 70A	3
State Circle		Kings Av	Brisbane Av	70	Add gated 70A	3
State Circle		Brisbane Av	Sydney Av	70	Add second gating 70A in median	1
State Circle		Canberra Av	Hobart Av	70	Add second gating 70A in median	1
State Circle		Melbourne Av	Adelaide Av	70	Add second gating 70A in median	1
State Circle	anticlockwise	Melbourne Av	Hobart Av	70	Add second gating 70A in median	1
State Circle		Canberra Av	Sydney Av	70	Add second gating 70A in median	1
State Circle		Sydney Av	Brisbane Av	70	Add second gating 70A in median	1
State Circle		Brisbane Av	Kings Av	70	Add second gating 70B in median	1
State Circle		Kings Av	Flynn Dr	70	Add second gating 70A in median	1
State Circle		Flynn Dr	Perth Av	70	Add gated 70A	3
State Circle		Perth Av	Adelaide Av	70	Add gated 70A	3
State Circle						
Streeton Dr	S	Cotter	Unwin	80	Add second gating 80B in median	1
Streeton Dr		Heyson	Hilder	80	Add second gating 80B in median	1
Streeton Dr		Mulley	Namatjira	80	Add second gating 80B in median	1
Streeton Dr	N	Namatjira	Mulley	80	Add second gating 80B in median	1
Streeton Dr		Hilder	Heyson	80	Add second gating 80B in median	1

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Streeton Dr		Unwin	Cotter	80	Add second gating 80B in median	1
Streeton Dr						
Sulwood Dr	W	Erindale	Gaunson	80	Add second gating 80B in median	1
Sulwood Dr		Gaunson	Sainsbury	80	Add second gating 80B on 2 way road	2
Sulwood Dr		Sainsbury	Athllon	80	Add second gating 80B on 2 way road	2
Sulwood Dr		Athllon	Livingston	80	Add gated 80B on 2 way road	4
Sulwood Dr		Livingston	Mannheim	80	Add gated 80B on 2 way road	4
Sulwood Dr		Inkster	Colquhoun	80	Add second gating 80B on 2 way road	2
Sulwood Dr		Tuggeranong Pkw	Kambah Pool Rd	80	Add gated 80B on 2 way road	4
Sulwood Dr		Kambah Pool	Kapunda	80	Add second gating 80B on 2 way road	2
Sulwood Dr	E	Kambah Pool	Tuggeranong Pkwy	80	Add gated 80B on 2 way road	4
Sulwood Dr		Tuggeranong Pkw	Colquhoun	80	Add second gating 80B in median	1
Sulwood Dr		Colquhoun	Inkster	80	Add gated 80B on 2 way road	4
Sulwood Dr		Inkster	Mannheim	80	Replace 80A with gated 80B on 2 way road	6
Sulwood Dr		Mannheim	Livingston	80	Replace 80A with gated 80B on 2 way road	6
Sulwood Dr		Livingston	Athllon	80	Replace 80A with gated 80B on 2 way road	6
Sulwood Dr		Athllon	Sainsbury	80	Add gated 80B on 2 way road	4
Sulwood Dr		Sainsbury	Gaunson	80	Add gated 80B on 2 way road	4
Sulwood Dr		Gaunson	Erindale	80	Add second gating 80B on 2 way road	2
Sulwood Dr						
Taverner	SE	Drakeford	Forolonge	change 60 to 80	replace gated 60B with gated 80B	6
Taverner		Forlonge	Laurence	80	Add second gating 80B in median	1
Taverner		Laurence	Erindale	80	Add second gating 80B in median	1
Taverner	NW	Erindale	Laurence	80	Add second gating 80B in median	1
Taverner		Laurence	Newman Morris	80	Add second gating 80B in median	1
Taverner				change 60 to 80	remove gated 60A before intersection	6
Taverner		Newman Morris	Drakeford	80	Add second gating 80B in median	1
Taverner						
Tharwa Dr	S	Drakeford Dr	Mentone View	80	Add second gating 80B in median	1
Tharwa Dr		Mentone View	Box Hill	80	Add second gating 80B in median	1
Tharwa Dr		Norman Lindsay St	Box Hill Sth	80	Add gated 80B on 2 way road	4

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Tharwa Dr		Box Hill Sth	Pocket Av	80	Add second gating 80B on 2 way road	2
Tharwa Dr		Pocket Av	Tharwa Br	Changed	Approach to Tharwa Bridge is not signed consistent with AS1742.2 see Report	Special
Tharwa Dr	N	Tharwa Br	Pocket Av	Changed	Departure from Tharwa Bridge not signed consistent with AS1742.4 see Report	Special
Tharwa Dr		Tharwa Br	Pocket Av	80	Install 80B 70m after "50 limit unless signposted otherwise" sign	1
Tharwa Dr		Pocket Av	Box Hill Sth	80	Add gated 80B on 2 way road	4
Tharwa Dr		Box Hill Sth	Norman Lindsay	80	Add second gating 80B on 2 way road	2
Tharwa Dr		Box Hill Nth	Mentone View	80	Add second gating 80B in median	1
Tharwa Dr		Mentone View	Drakeford Dr	80	Add gated 80B on 2 way road	4
Tharwa Dr						
Tharwa Dr	E	Drakeford Dr	Duggan		Add gated 80B on 2 way road	4
Tharwa Dr		Duggan	Lawrence Wackett	80	Add gated 80B on 2 way road	4
Tharwa Dr		Lawrence Wackett	Were	80	Add second gating 80B on 2 way road	2
Tharwa Dr		Were	Johnson	80	Add gated 80B	3
Tharwa Dr	W	Johnson	Lawrence Wackett	80	Replace 80A with gated 80B on 2 way road	6
Tharwa Dr		Lawrence Wackett	Lawrence Wackett	80	Add second gating 80B on 2 way road	2
Tharwa Dr		Lawrence Wackett	Duggan	80	Add second gating 80B on 2 way road	2
Tharwa Dr		Duggan	Drakeford	80	Add gated 80B on 2 way road	4
Tharwa Dr						
Tuggeranong Parkway	N	Sulwood	Hindmarsh	100	Add gated 100C immediately north of Sulwood	3
Tuggeranong Parkway		Hindmarsh	Cotter Rd	100	Add second gating 100B on ramp	1
Tuggeranong Parkway		Ramp Pkway	Cotter Rd	80	Add second gating 80B in median	1
Tuggeranong Parkway		Ramp Cotter	Pkway	100	Add second gating 100B	1
Tuggeranong Parkway		Lakeside interchange		90	replace existing gated 90B with 90C	6
Tuggeranong Parkway	S	William Hovell ramp		change 60 to 80	replace gated 60B on ramp with appropriate warning signs	6

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Tuggeranong Parkway		Parkes Way merge		90	Add confirming 90B on left	1
Tuggeranong Parkway		Ramp Pkwy	Cotter Rd	80	Add second gating 80B in median	1
Tuggeranong Parkway		Cotter to Pkwy	southbound	100	Add second gating 100B	1
Tuggeranong Parkway		Hindmarsh to Pkwy	southbound	100	Add second gating 100B	1
Tuggeranong Parkway		Hindmarsh	Sulwood	80	Replace existing 80B with gated 80C	6
Tuggeranong Parkway						
Uriarra Rd	NW and S	Cotter	Coppins Crossing	80	Add gated 80B	3
Uriarra Rd		Coppins Crossing	westbound	RD	add second gating 100B on 2 way road	2
Uriarra Rd		Coppins Crossing	Uriarra crossing east	80	Add second gating 80B on 2 way road	2
Uriarra Rd		Uriarra Crossing east	Uriarra crossing	60	Add second gating 60B on 2 way road	2
Uriarra Rd		Fairlight	Mountain creek	RD	add second gating 100B on 2 way road	2
Uriarra Rd	N and SE	Mountain Creek	Fairlight	80	Add second gating 80B on 2 way road	2
Uriarra Rd		Fairlight	Uriarra crossing	60	Add second gating 60B on 2 way road	2
Uriarra Rd		Uriarra Crossing east	Coppins Crossing	RD	Add second gating 100B on 2 way road	2
Uriarra Rd		Uriarra Crossing east	Approach to Coppins Crossing	80	Add second gating 80B on 2 way road	2
Uriarra Rd						
Wentworth Av	S	Eastlake Pde	Giles St	60	Add gated 60B	3
Wentworth Av		Dawes	Cunningham	60	Add gated 60B	3
Wentworth Av		Mildura	Canberra Av	60	Add gated 60B	3
Wentworth Av	N	Hely	Mildura	60	Add gated 60B	3
Wentworth Av		Cunningham	Dawes	60	Add gated 60B	3
Wentworth Av		Giles St	Telopea Pk	60	Add gated 60B	3
Wentworth Av						
William Hovell	E	Drake Brockman	south and east	Could change to 100 but leave as 90	Add second gating 90C in median	1
William Hovell		Coulter Dr	Bindubi St	90	add second gating 90B in median	1

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
William Hovell	W	Glenlock	Bindubi St	90	add second gating 90B in median	1
William Hovell		Bindubi St	Coulter Dr	90	add second gating 90B in median	1
William Hovell		1km after Coulter	Drake Brockman	90	add reminder 90B on left	1
William Hovell						
William Slim	N	Ginninderra	Dumas	80	Add second gating 80B on 2 way road	2
William Slim		Dumas	Baldwin	80	Add gated 80B on 2 way road	4
William Slim		Baldwin	Owen Dixon	80	Add second gating 80B on 2 way road	2
William Slim					Relocate Form 1 Lane sign from speed limit sign	5
William Slim		Chuculba	Barton Hwy	60	Add second gating 60B in median	1
William Slim	S	Chuculba	Owen Dixon	60	Add second gating 60B on 2 way road	2
William Slim					Replace existing 80B on left with 60B on left	6
William Slim		Owen Dixon	Baldwin	60	Add gated 60B	3
William Slim		Baldwin	Dumas	80	Replace existing 80A with gated 80B on 2 way road	6
William Slim		Dumas	Ginninderra	80	Add gated 80B on 2 way road	4
William Slim						
Woodcock Dr	W and S	Drakeford Dr	Clare Dennis	80	Add gated 80B before start of school zone	3
Woodcock Dr		Carslake Loop	Preddy Way	80	Add second gating 80B on 2 way road	2
Woodcock Dr		Preddy Way	Jim Pike	80	Add gated 80B	3
Woodcock Dr		Jim Pike	Lewis Luxton	60	Add gated 60B	3
Woodcock Dr		Lewis Luxton	Lewis Luxton	60	Add gated 60B	3
Woodcock Dr	N and E	Tharwa Dr	Knoke Av	60	Add gated 60B	3
Woodcock Dr		Lewis Luxton Cr	Gaylard Pl	60	Add gated 60B	3
Woodcock Dr		Jim Pike	Carslake Loop	80	Add second gating 80B in median	1
Woodcock Dr		Clarke Dennis	Drakeford Dr	80	Add gated 80B on 2 way road	4
Woodcock Dr						
Yamba Dr	N	Long Gully Rd	Julia Flynn	80	Add second gating 80B in median	1
Yamba Dr		Dookie	Dorsch	80	Add second gating 80B in median	1
Yamba Dr		Beasley	Julia Flynn	80	Add gated 80B	3
Yamba Dr		Mawson	Numeralla	80	Add gated 80B	3
Yamba Dr		Colbeck	Hindmarsh	80	Add second gating 80B in median	1
Yamba Dr		Hindmarsh	Hospital entry	80	Add second gating 80B in median	1
Yamba Dr		Kitchener	Justinian	80	Add second gating 80B in median	1

SPEED LIMIT SIGNAGE CHANGES						
Road	travel dir'n	from Rd	to Rd	speed limit	comment	Sign type (see legend below)
Yamba Dr		Launceston	Yarra Glen	80	Add second gating 80B in median	1
Yamba Dr	S	Yarra Glen	Launceston	80	Add second gating 80B in median	1
Yamba Dr		Wisdom	Justinian	80	Add second gating 80B in median	1
Yamba Dr		Kitchener	Hospital entry	80	Add gated 80B	3
Yamba Dr		Hindmarsh	Colbeck	80	Add second gating 80B in median	1
Yamba Dr		Numeralla	Mawson	80	Add gated 80B	3
Yamba Dr		Julia Flynn	Beasley	80	Add gated 80B	3
Yamba Dr		Dorsch	Dookie	80	Add gated 80B	3
Yamba Dr		Julia Flynn	Long Gully	80	Add second gating 80B in median	1
Yamba Dr						
Yarra Glen Adelaide Av	N	Melrose	Carruthers	80	Add second gating 80B in median	1
Yarra Glen Adelaide Av		Carruthers	Cotter Rd	80	Add second gating 80B in median	1
Yarra Glen Adelaide Av	E	Cotter Rd	Novar	80	Add second gating 80B in median	1
Yarra Glen Adelaide Av		Novar	Hopetoun	80	Add second gating 80B in median	1
Yarra Glen Adelaide Av		Empire Cct	State Circ	80	Add gated 80B	3
Yarra Glen Adelaide Av	W	National Cct	Hopetoun	80	Add second gating 80B in median	1
Yarra Glen Adelaide Av		Hopetoun	Novar	80	Add gated 80B	3
Yarra Glen Adelaide Av	S	Cotter Rd	Carruthers	80	Add 80B on left	3
Yarra Glen Adelaide Av		Carruthers	Yamba	80	Add gated 80B	3
Yarra Glen Adelaide Av						

Sign Types Legend	
1	Add a single sign usually to achieve gated signs
2	Add a single sign usually to achieve gated signs on a 2 Way road
3	Add gated (2 No.) signs to notify speed limit
4	Add gated (2 No.) signs to notify speed limit on 2 Way road
5	Relocate a sign
6	Replace an existing sign

ATTACHMENT 3. PRELIMINARY SKETCH PLANS DETAILING THE PROPOSED SIGNAGE CHANGES

DRAFT

Bruan, Nicole

From: Exton, Lauren
Sent: Thursday, 25 February 2021 5:38 PM
To: Potapowicz, Pawel; Vikneson, Jayanthi; Adhikari, Amrit; Pincombe, Neil; Wilson, Adam
Subject: RE: Folded Speed Sign Review - Meeting 2
Attachments: Rural Roads Speed Signage - 2nd Meeting Notes 25 Feb 2021.docx

OFFICIAL

Hi all

Attached are the notes from today's discussion. Please let me know if there's anything that may have been missed.

Thanks
Lauren

-----Original Appointment-----

From: Exton, Lauren
Sent: Tuesday, 23 February 2021 5:12 PM
To: Exton, Lauren; Potapowicz, Pawel; Vikneson, Jayanthi; Adhikari, Amrit; Pincombe, Neil; Wilson, Adam
Subject: Folded Speed Sign Review - Meeting 2
When: Thursday, 25 February 2021 9:30 AM-11:30 AM (UTC+10:00) Canberra, Melbourne, Sydney.
Where: Collaboration Space Level 3

Rural Roads Speed Signage – 2nd Meeting

Thursday, 25 February 2021

9:30-11:30AM

Neil, Amrit, Pawel, Jayanthi, Adam, Lauren

Summary of proposed actions:

BRINDABELLA ROAD

- Remove the trucks crossing/entering warning sign from the grid (missing on site, not required).
- Install a new 60 sign just north of the first bend after the intersection with Cotter Road.
- Install new 60 repeaters in alignment, facing in both northbound and southbound directions, approximately 1km after the new posted 60.
- After the first curve past the Cotter Catchment Lookout Track entrance, install (in alignment):
 - a new 60 with a 60 AHEAD 300m in advance on the southbound verge, and
 - a new 100 on the northbound verge.
- Note: checked and confirmed during the meeting that no warning signs within the extended 60 zone have advisory supplementary plates that need to be removed or changed.

URIARRA VILLAGE

- Keep the 80 limit through the village as is – no changes required to existing signage. Note separate ongoing project for speed limit changes here.

URIARRA ROAD – PRIOR TO THE RIVER CROSSING

- Reinstate the missing curve warning sign with 55 advisory plate (RM Fix My Street).
- Remove existing 80 just after the curve warning sign.
- Install a new 60 sign with a 60 AHEAD at least 300m on the northbound, before the curve warning sign that's to be reinstated.
- Relocate existing 100 sign on site (southbound) to be in alignment with the new 60.
- Relocate existing 60 on the northbound that's combined with a flood warning sign approx. 120m to the north on a new post.
- Check with RM re. the flashing 'Floodway Sign' that is appearing on the grid but isn't on site.
- Remove the 80 opposite the floodway sign from the grid (missing on site, not required).
- Reinstate the 60 on the southbound as per the grid (missing on site), just before the Fairlight Road intersection.

FAIRLIGHT ROAD INTERSECTION/RIVER CROSSING

- Remove the existing 60 on Fairlight Road that's right at the intersection.
- Leave the existing 60 at the top of the flood depth indicator just before the crossing – moving this to a new post would likely obstruct the line of sight due to the nearby flashing light flood sign.



URIARRA ROAD – AFTER THE RIVER CROSSING

- Replace and relocate the faded 80 sign on the eastbound verge, to be in alignment with the existing 60 on the westbound verge.



- Just after the Uriarra East picnic ground entrance, remove the existing 80 sign and install a new 60 sign on the westbound, in alignment to the existing 100 on the eastbound. Install a 60 AHEAD at least 300m in advance of the new 60.

URIARRA ROAD - ENTRY TO CANBERRA

- Where the speed limit first slows to 80, remove both the existing 80 and 100 signs. Replace the 80 on the eastbound verge with a new 60 AHEAD.
- Install a new 100 on the westbound verge and a new 60 on the eastbound verge (in alignment) 300m east of the new 60 AHEAD.
- Remove any supplementary plates within the new extended 60 zone that no longer apply.
- Remove any 80 repeaters within the new extended zone and replace with 60's.
- Install one new 60 repeater on the westbound verge prior to Intersection 2 in the grid, to capture motorists turning right out of the newly developed area.
- As required, upgrade any existing 60 repeaters on site from size A's to size B's to reinforce the speed limit.
Example below:



Bruan, Nicole

From: Exton, Lauren
Sent: Thursday, 25 February 2021 11:47 AM
To: Exton, Lauren

2nd Folded Speed limit signage meeting

Brindabella Road

Remove the 60 from the grid that's gated

Remove trucks crossing/entering from the grid (W5-55)

Install 60 sign just after where the trucks sign is

Install 60 repeaters (gated in opposite directions)

After the last curve, install at 60 with 60 aheads

Install a new 100 opposite the 60 at the same location

Checked and confirmed no warning signs within the 60 zone have advisory's that need to be changed

Uriarra Village

Keep at 80 through the village. (Signs as is at the start)

Seperate project ongoing for speed limit

Uriarra Road

Reinstate missing curve warning sign with 55 plate - fix my street

Install new 60 sign with a 60 ahead, before the curve warning sign

Relocate existing 60 from the flood warning sign, relocate to where the 80 is on the other side

Remove 80 at the same location from the grid (not in the field)

Remove 80 on the southbound and replace with a 60

Check with RM re the flashing flood sign - on grid but not in the field

Fairlight Road/River Crossing

Remove existing 60 that's right at the intersection

Leave 60 at the top of the flood depth indicator

Uriarra Road

Replace faded 80 sign eastbound and relocate to be level with the other speed sign

Change limit to 60 - check with Amrit

Entry to Canberra (Denman) -

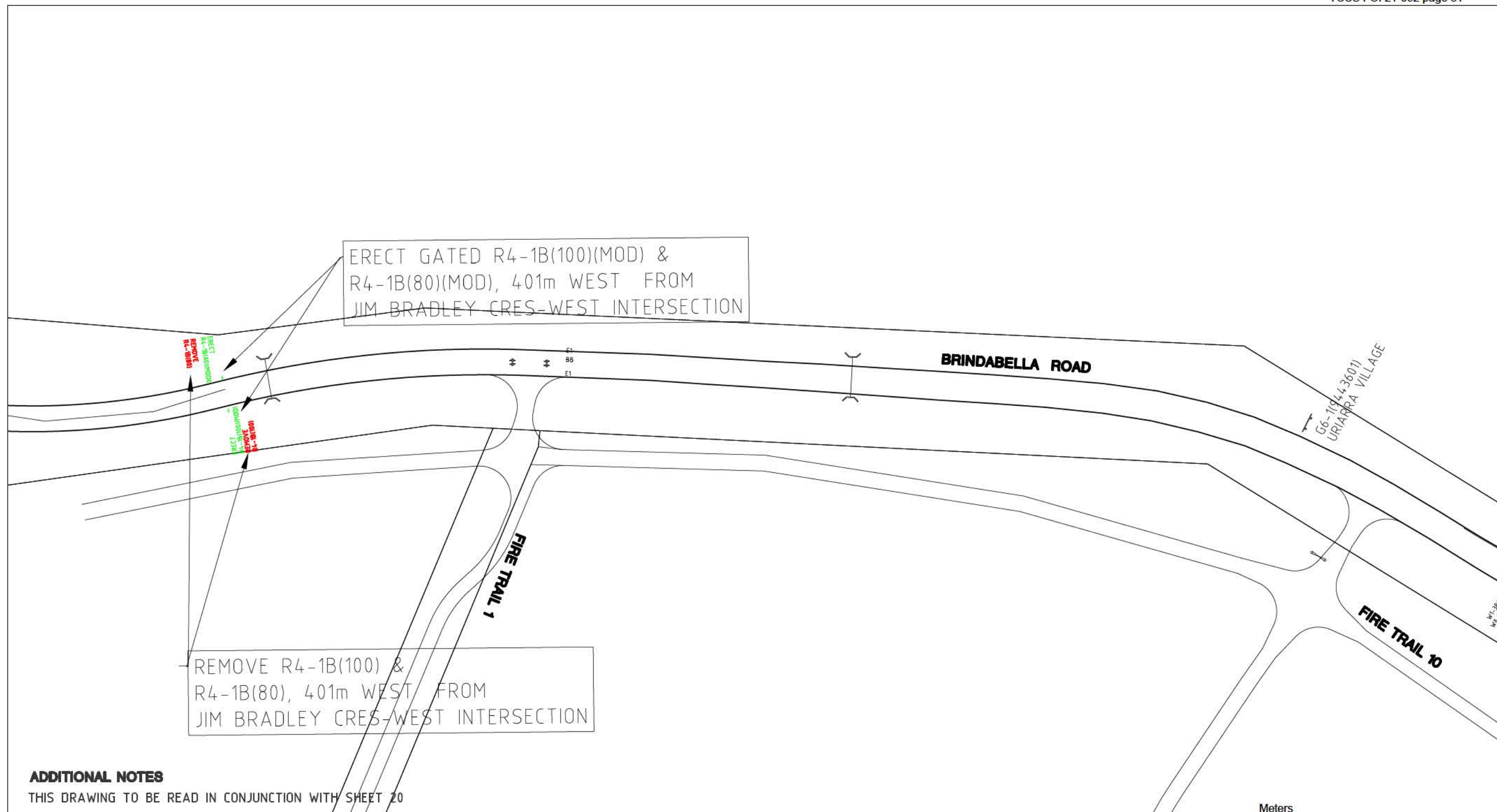
Remove 100 sign - replace the 80 with a 60 ahead

Place a 60 300m ahead of that

Upgrade existing 60 repeaters from A's to B's

Install 60 repeaters after every intersection if not installed already

Get [Outlook for iOS](#)



ADDITIONAL NOTES

THIS DRAWING TO BE READ IN CONJUNCTION WITH SHEET 20

NOTE

ALL PAVEMENT MARKINGS AND SIGN POSTING TO BE IN ACCORDANCE WITH AUSTRALIAN STANDARD AS1742 EXCEPT WHERE MODIFIED BY TERRITORY AND MUNICIPAL SERVICES DESIGN STANDARD FOR URBAN INFRASTRUCTURE D509-TRAFFIC CONTROL DEVICES. FOR A COPY PLEASE VISIT [HTTPS://WWW.TCCS.ACT.GOV.AU/...DATA/ASSETS/PDF_FILE/0006/397257/TAMS_REFERENCE_DOCUMENT_11.PDF](https://www.tccs.act.gov.au/...DATA/ASSETS/PDF_FILE/0006/397257/TAMS_REFERENCE_DOCUMENT_11.PDF). ALL SIGNAGE INSTALLED ON ELP'S TO BE POSITIONED TO AVOID COVERING THE ELP ASSET NUMBER. ALL LINEMARKING TO BE WATERBORNE PAINT UNLESS NOTED OTHERWISE. LLM DENOTES LONG LIFE MATERIAL SUCH AS THERMOPLASTIC; COLD APPLIED PLASTIC (CEMENT BASED PRODUCTS CAPABLE OF HAVING QUARTZ APPLIED). ALL REDUNDANT AND/OR CONFLICTING LINEMARKING TO BE ERADICATED.

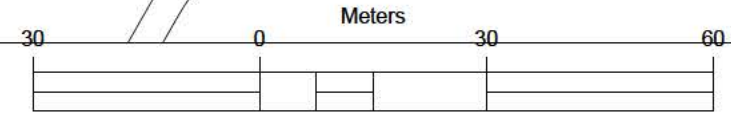
LEGEND

	ERADICATE LINEMARKING, SIGNS AND REMOVE KERB/CONCRETE.
	EXISTING LINEMARKING, SIGNS KERB AND CONCRETE.
	APPLY NEW LINEMARKING
	INSTALL NEW KERB, CONCRETE
	ERECT NEW SIGN



BRINDABELLA ROAD FOLDED SPEED SIGNS

NO	AMENDMENTS	APPROVED DATE	SIGNS TO BE ERECTED	HAND	SIZE	NO. OF	
			R4-1B(80)(MOD) SPEED RESTRICTION 80 KM/HR MODIFIED (FOLDED SPEED)	B	1		
			R4-1B(100)(MOD) SPEED RESTRICTION 100 KM/HR MODIFIED (FOLDED SPEED)	B	1		
SIGNS TO BE REMOVED OR RELOCATED							
			R4-1B(80) SPEED RESTRICTION 80 KM/HR	B	1		
			R4-1B(100) SPEED RESTRICTION 100 KM/HR	B	1		
			SIGN	DESCRIPTION	HAND	SIZE	NO. OF



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ACT GOVERNMENT

Authorised pursuant to Part 5 of Road Transport (Safety and Traffic Management) ACT 1999



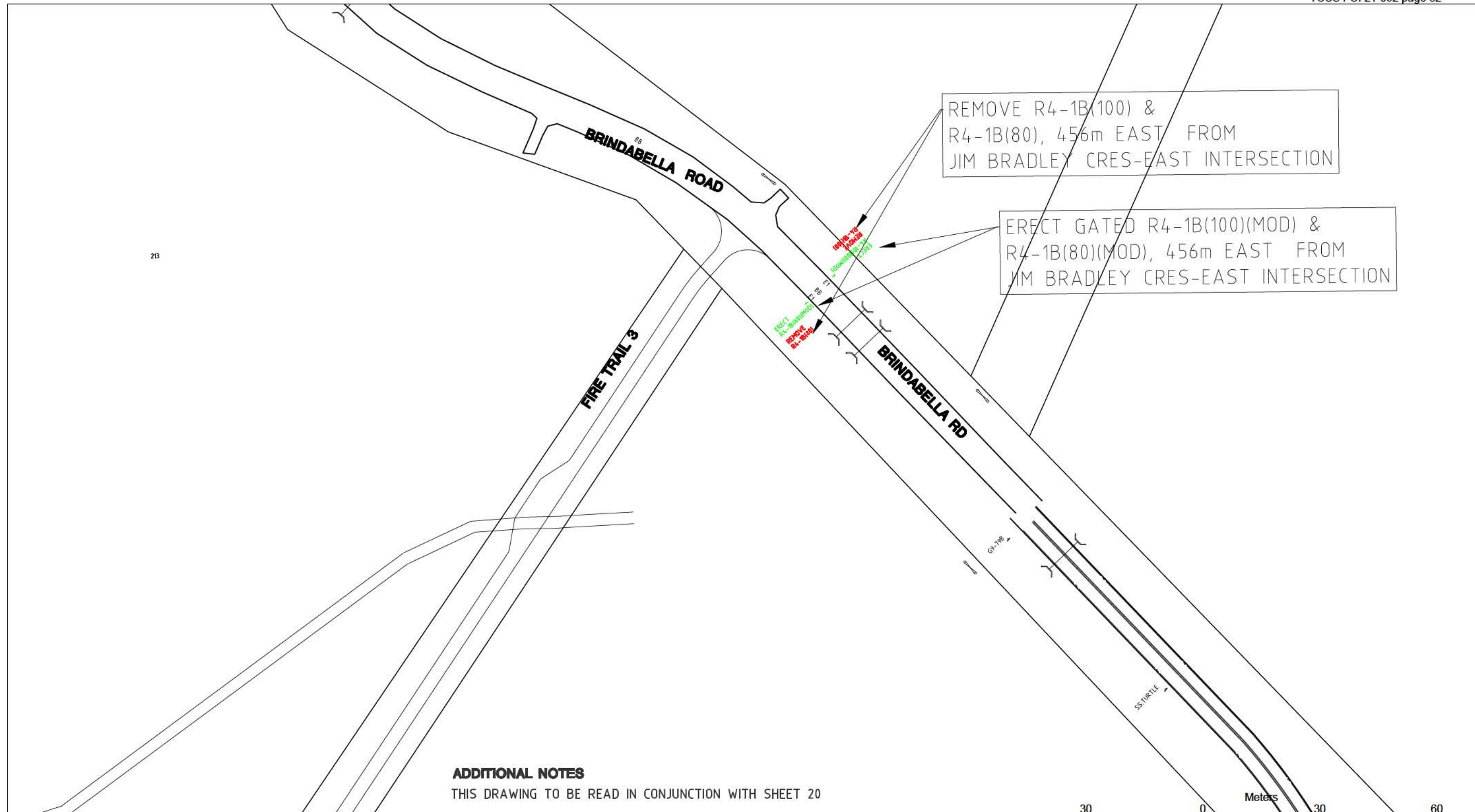
ACT
Government

Transport Canberra and City Services

RURAL ROADS
FOLDED SPEED SIGN
Traffic Control Devices

GRID NUMBER	R1
MINI NUMBER	1088515
DOCUMENT STATUS	APPROVED
PROJECT OFFICER	NP
PHONE NO	
SIGNATURE	
DRAFTED	AA
ACTION DATE	14-04-2021
DATE PLOTTED	09-03-2021
SCALE	1:1000
DOCUMENT NUMBER	TC-732077
SHEET NO	21/54
REVISION	

213



ADDITIONAL NOTES
THIS DRAWING TO BE READ IN CONJUNCTION WITH SHEET 20

30 0 30 60 Meters

NOTE

ALL PAVEMENT MARKINGS AND SIGN POSTING TO BE IN ACCORDANCE WITH AUSTRALIAN STANDARD AS1742 EXCEPT WHERE MODIFIED BY TERRITORY AND MUNICIPAL SERVICES DESIGN STANDARD FOR URBAN INFRASTRUCTURE D509-TRAFFIC CONTROL DEVICES. FOR A COPY PLEASE VISIT [HTTPS://WWW.TCCS.ACT.GOV.AU/.../DATA/ASSETS/PDF_FILE/0006/397257/TAMS_REFERENCE_DOCUMENT_11.PDF](https://www.tccs.act.gov.au/.../DATA/ASSETS/PDF_FILE/0006/397257/TAMS_REFERENCE_DOCUMENT_11.PDF). ALL SIGNAGE INSTALLED ON ELP'S TO BE POSITIONED TO AVOID COVERING THE ELP ASSET NUMBER. ALL LINEMARKING TO BE WATERBORNE PAINT UNLESS NOTED OTHERWISE. LLM DENOTES LONG LIFE MATERIAL SUCH AS THERMOPLASTIC; COLD APPLIED PLASTIC (CEMENT BASED PRODUCTS CAPABLE OF HAVING QUARTZ APPLIED). ALL REDUNDANT AND/OR CONFLICTING LINEMARKING TO BE ERADICATED.

LEGEND

	ERADICATE LINEMARKING, SIGNS AND REMOVE KERB/CONCRETE.
	EXISTING LINEMARKING, SIGNS KERB AND CONCRETE.
	APPLY NEW LINEMARKING
	INSTALL NEW KERB, CONCRETE
	ERECT NEW SIGN



BRINDABELLA ROAD FOLDED SPEED SIGNS

NO	AMENDMENTS	APPROVED DATE	SIGNS TO BE ERECTED							
			R4-1B(80)(MOD) SPEED RESTRICTION 80 KM/HR MODIFIED (FOLDED SPEED)	B	1					
			R4-1B(100)(MOD) SPEED RESTRICTION 100 KM/HR MODIFIED (FOLDED SPEED)	B	1					
			SIGNS TO BE REMOVED OR RELOCATED							
			R4-1B(80) SPEED RESTRICTION 80 KM/HR	B	1					
			R4-1B(100) SPEED RESTRICTION 100 KM/HR	B	1					
			SIGN	DESCRIPTION	HAND	SIZE	NO. OF			

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GRID NUMBER	R1
MINI NUMBER	1088515
DOCUMENT STATUS	APPROVED
PROJECT OFFICER	NP
PHONE NO	
SIGNATURE	
DRAFTED	AA
ACTION DATE	14-04-2021
DATE PLOTTED	09-03-2021
SCALE	1:1000
DOCUMENT NUMBER	TC-732077
SHEET NO	22/54
REVISION	

ACT GOVERNMENT

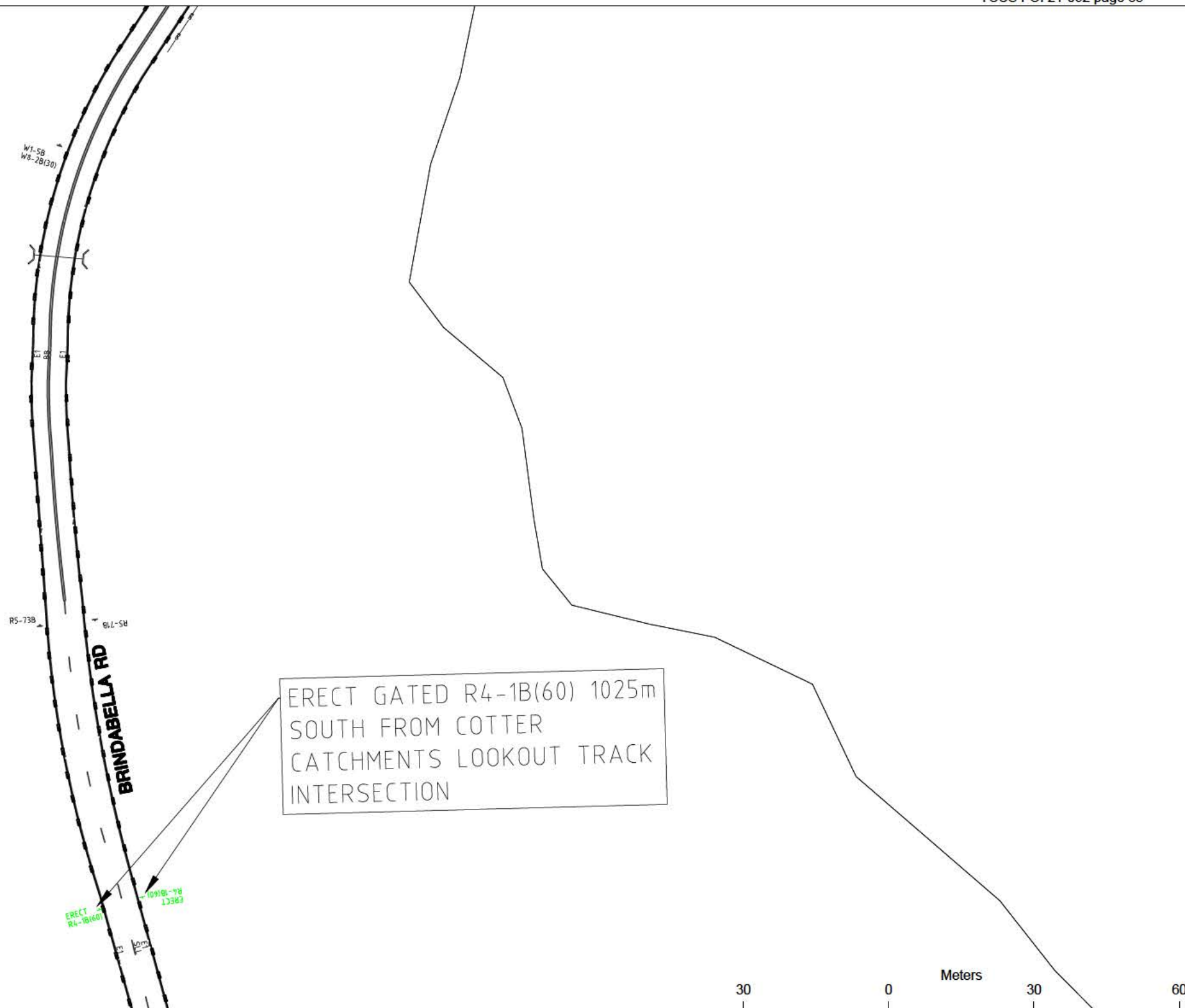
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Government

Transport Canberra and City Services

RURAL ROADS
FOLDED SPEED SIGN
Traffic Control Devices



ADDITIONAL NOTES

THIS DRAWING TO BE READ IN CONJUNCTION WITH SHEET 23

NOTE

ALL PAVEMENT MARKINGS AND SIGN POSTING TO BE IN ACCORDANCE WITH AUSTRALIAN STANDARD AS1742 EXCEPT WHERE MODIFIED BY TERRITORY AND MUNICIPAL SERVICES DESIGN STANDARD FOR URBAN INFRASTRUCTURE D509-TRAFFIC CONTROL DEVICES. FOR A COPY PLEASE VISIT [HTTPS://WWW.TCCS.ACT.GOV.AU/...DATA/ASSETS/PDF_FILE/0006/397257/TAMS_REFERENCE_DOCUMENT_11.PDF](https://www.tccs.act.gov.au/...DATA/ASSETS/PDF_FILE/0006/397257/TAMS_REFERENCE_DOCUMENT_11.PDF). ALL SIGNAGE INSTALLED ON ELP'S TO BE POSITIONED TO AVOID COVERING THE ELP ASSET NUMBER. ALL LINEMARKING TO BE WATERBORNE PAINT UNLESS NOTED OTHERWISE. LLM DENOTES LONG LIFE MATERIAL SUCH AS THERMOPLASTIC; COLD APPLIED PLASTIC (CEMENT BASED PRODUCTS CAPABLE OF HAVING QUARTZ APPLIED). ALL REDUNDANT AND/OR CONFLICTING LINEMARKING TO BE ERADICATED.

LEGEND

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	EXISTING LINEMARKING, SIGNS KERB AND CONCRETE.
	APPLY NEW LINEMARKING
	INSTALL NEW KERB, CONCRETE
	ERECT NEW SIGN



BRINDABELLA ROAD FOLDED SPEED SIGNS

NO	AMENDMENTS	APPROVED DATE	SIGNS TO BE ERECTED				GRID NUMBER	MIN NUMBER
			R4-1B(60) SPEED RESTRICTION 60 KM/HR		B	2	R3	1088515
							DOCUMENT STATUS	APPROVED
							PROJECT OFFICER	NP
							PHONE NO	SIGNATURE
							DRAFTED	AA
							ACTION DATE	14-04-2021
							DATE PLOTTED	09-03-2021
							SCALE	1:1000
							DOCUMENT NUMBER	TC-732077
							SHEET NO	25/54
							REVISION	
			SIGN	DESCRIPTION	HAND	SIZE	NO. OF	

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ACT GOVERNMENT



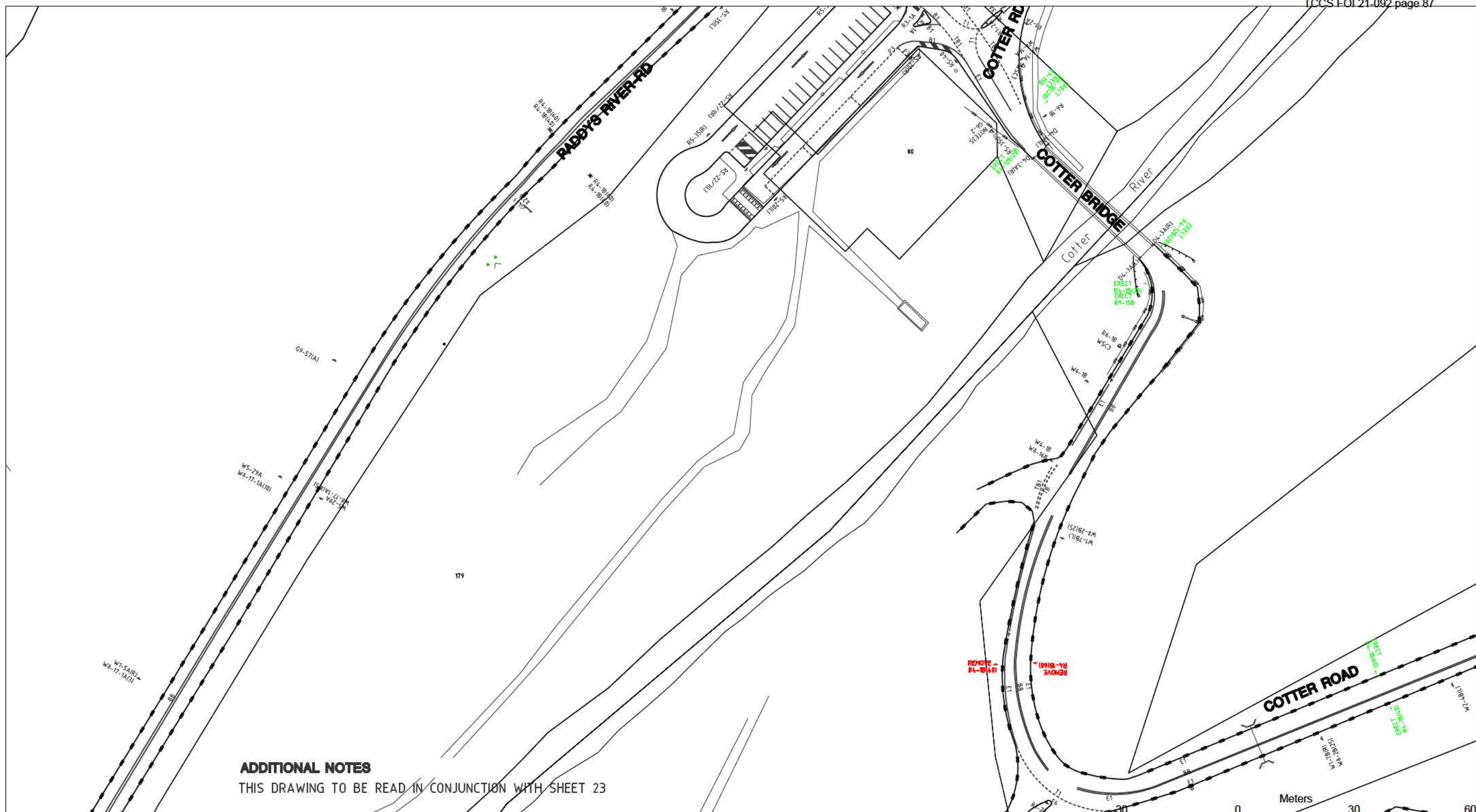
ACT Government

Authorised pursuant to Part 5 of Road Transport Safety and Traffic Management ACT 1999

Authorising Signature

Transport Canberra and City Services

RURAL ROADS
FOLDED SPEED SIGN
Traffic Control Devices



ADDITIONAL NOTES
THIS DRAWING TO BE READ IN CONJUNCTION WITH SHEET 23

NOTE

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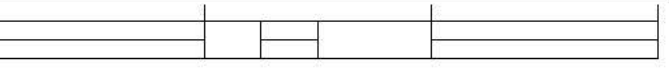
LEGEND

	ERADICATE LINEMARKING, SIGNS AND REMOVE KERB/CONCRETE.
	EXISTING LINEMARKING, SIGNS KERB AND CONCRETE.
	APPLY NEW LINEMARKING
	INSTALL NEW KERB, CONCRETE
	ERECT NEW SIGN



COTTER ROAD FOLDED SPEED SIGNS

NO	AMENDMENTS	APPROVED DATE	SIGNS TO BE ERECTED	HAND	SIZE	NO. OF
			R4-1B(60) SPEED RESTRICTION 60 KM/HR	B	1	
			R4-1B(40) SPEED RESTRICTION 40 KM/HR	B	1	
			R4-1B(20) SPEED RESTRICTION 20 KM/HR	B	2	
			R9-15B ON BRIDGE- PLATE	B	2	
			R4-12B(20) END SPEED LIMIT 20 KM/HR	B	2	
			SIGNS TO BE REMOVED OR RELOCATED			
			R4-1B(60) SPEED RESTRICTION 60 KM/HR	B	1	
			R4-1B(40) SPEED RESTRICTION 40 KM/HR	B	1	
			SIGN DESCRIPTION	HAND	SIZE	NO. OF



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ACT GOVERNMENT



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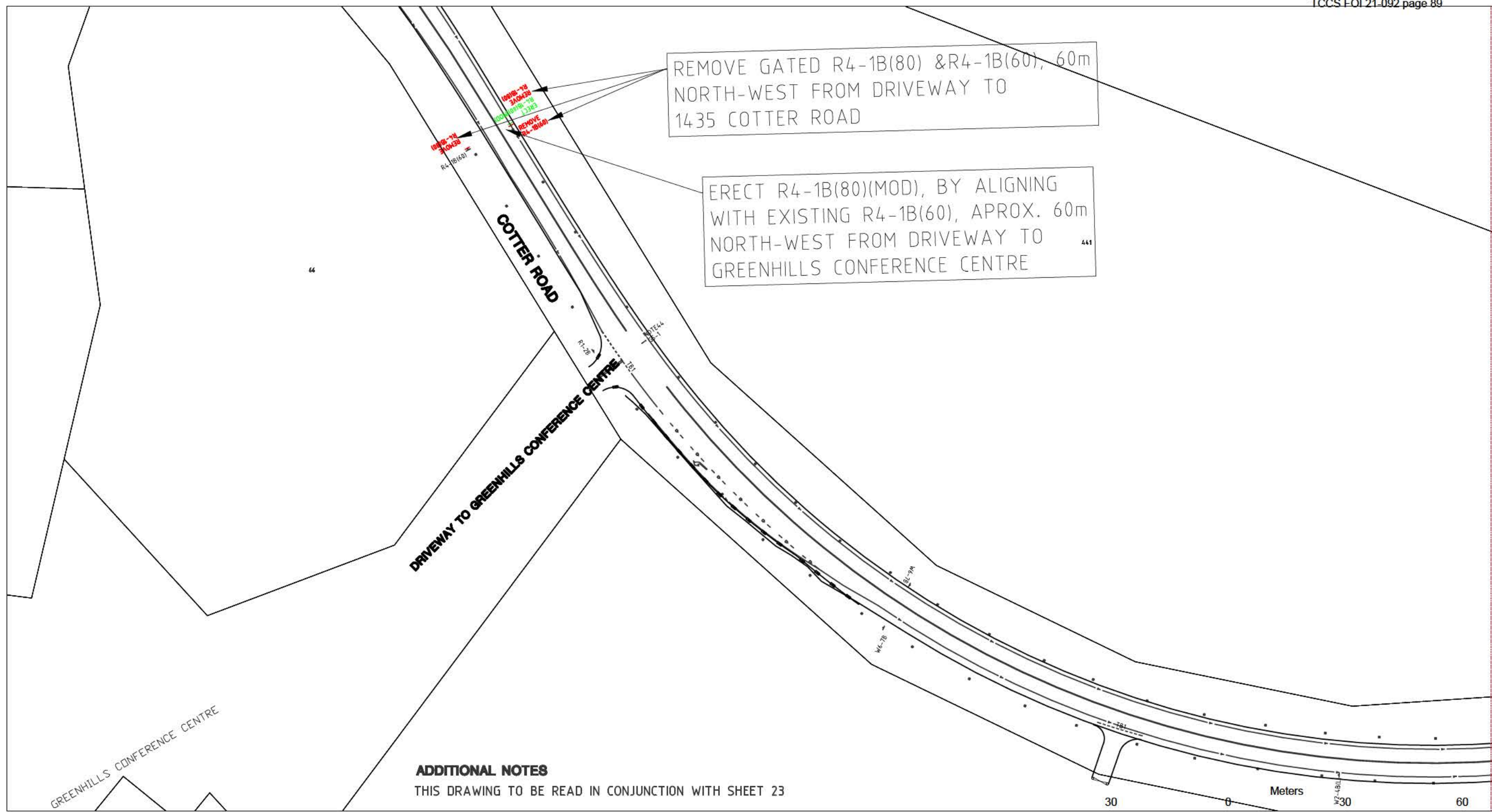
Authorising Signature

ACT Government

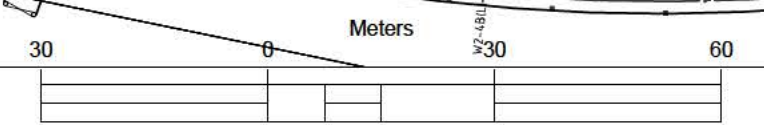
Transport Canberra and City Services

RURAL ROADS
FOLDED SPEED SIGN
Traffic Control Devices

DRAFTED	AA
ACTION DATE	14-04-2021
DATE PLOTTED	09-03-2021
SCALE	1:1000
DOCUMENT NUMBER	TC-732077
SHEET NO	27/54
REVISION	



ADDITIONAL NOTES
THIS DRAWING TO BE READ IN CONJUNCTION WITH SHEET 23



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NOTE

ALL PAVEMENT MARKINGS AND SIGN POSTING TO BE IN ACCORDANCE WITH AUSTRALIAN STANDARD AS1742 EXCEPT WHERE MODIFIED BY TERRITORY AND MUNICIPAL SERVICES DESIGN STANDARD FOR URBAN INFRASTRUCTURE D509-TRAFFIC CONTROL DEVICES. FOR A COPY PLEASE VISIT [HTTPS://WWW.TCCS.ACT.GOV.AU/_DATA/ASSETS/PDF_FILE/0006/397257/TAMS_REFERENCE_DOCUMENT_11.PDF](https://www.tccs.act.gov.au/_data/assets/pdf_file/0006/397257/TAMS_REFERENCE_DOCUMENT_11.PDF). ALL SIGNAGE INSTALLED ON ELP'S TO BE POSITIONED TO AVOID COVERING THE ELP ASSET NUMBER.
ALL LINEMARKING TO BE WATERBORNE PAINT UNLESS NOTED OTHERWISE. LLM DENOTES LONG LIFE MATERIAL SUCH AS THERMOPLASTIC; COLD APPLIED PLASTIC CEMENT BASED PRODUCTS CAPABLE OF HAVING QUARTZ APPLIED.
ALL REDUNDANT AND/OR CONFLICTING LINEMARKING TO BE ERADICATED.

LEGEND

- ERADICATE LINEMARKING, SIGNS AND REMOVE KERB/CONCRETE.
- EXISTING LINEMARKING, SIGNS KERB AND CONCRETE.
- APPLY NEW LINEMARKING
- INSTALL NEW KERB, CONCRETE
- ERECT NEW SIGN



COTTER ROAD FOLDED SPEED SIGNS

NO	AMENDMENTS	APPROVED DATE	SIGNS TO BE ERECTED				GRID NUMBER	HWY NUMBER
			R4-1B(80)(MOD) SPEED RESTRICTION 80 KM/HR MODIFIED (FOLDED SPEED)	B	1		R3	1088515
SIGNS TO BE REMOVED OR RELOCATED								
	R4-1B(80)		SPEED RESTRICTION 80 KM/HR	B	2			
	R4-1B(60)		SPEED RESTRICTION 60 KM/HR	B	1			
	SIGN		DESCRIPTION	HAND	SIZE	NO. OF	REVISION	
							29/54	

ACT GOVERNMENT

ACT Government
Transport Canberra and City Services

RURAL ROADS
FOLDED SPEED SIGN
Traffic Control Devices

Defects discovered during Folded Speed Signage investigation – rural ACT

Tharwa Drive

OTHER

- The pavement and line markings on Tharwa Drive northbound, just prior to the bridge entrance near the intersection with Bridge Street, are of poor quality. RM may consider a reseal/patch and refresh of the line marking. See photos in zip file.

Naas Road

MISSING

- Special water course sign WSC3 near bridge. [Special sign](#).
- 'Bridge Load Limit' sign R6-3B (northbound) – may have been removed when bridge has been upgraded. RM may be able to confirm. [Regulatory sign](#).
- 'Winding Road' warning sign W1-5B(L) and supplementary plate W8-17-1B(3), just south of Namadgi main entrance. [Warning sign](#).

Tidbinbilla Road

MISSING/INCORRECT

- Right curve warning sign W1-3B(R) and advisory speed supplementary plate W8-2B (75). [Warning sign](#).
- G4-1 and R5_NOTE3. [Guide sign](#).
- Missing 'Unless Otherwise Signposted' plate R5_NOTE19 from 100 speed limit sign. [Guide sign](#).
- 'Steep Descent' blade from top of 'Trucks Use Low Gear' sign. The TCD grid states this should be a 'Steep Ascent' however this is incorrect and does not match the geometry of the road. [Warning sign](#).
- Curve warning sign W1-3B with supplementary plate W8-2B (85). [Warning sign](#).
- Kangaroo warning sign W5-29A, approx. 300m east of Birrigai. [Warning sign](#).
- 'Turning Traffic' sign on top of the Birrigai guide sign. [Warning sign](#).
- W1-3B (R) installed but should be W1-3B (L). [Warning sign](#).
- Kangaroo warning sign W5-29B. [Warning sign](#).

OTHER

- Redundant post supports near the Point Hut Rd intersection.
- R4-1B (100) and R5_NOTE19 signage – old system, needs to be updated.

Point Hut Road

MISSING

- Guide sign G3-5 8419. [Guide sign](#).
- Side road intersection warning sign W2-4B. [Warning sign](#).
- Kangaroo warning sign W5-29B. [Warning sign](#).
- Curve right warning sign W1-3B (L) and supplementary plate W8-2B (55). [Warning sign](#).

Paddy's River Road

MISSING/INCORRECT

- Curve warning sign W1-3B (R) just north of the Tidbinbilla River crossing. [Warning sign](#).
- Tourist drive route marker G-8-9 (5) just south of Discovery Drive. [Guide sign](#).
- Gated Kangaroo Warning signs with 'Next 7.5km' plates. [Warning sign](#).
- Curve warning sign W1-3B (L). [Warning sign](#).

- Slippery when wet warning sign. **Warning sign.**
- Different advisory speeds for the same bend – one is 45 and the other 55. **Warning signs.**
- Various missing chevron alignment markers on bends. **Hazard markers.**
- Steep descent warning sign – grid shows it on the incorrect side of the road. **Warning sign.**
- Winding road sign missing W1-5 (R). **Warning sign.**
- Supplementary plate W8-2B (55) missing from reverse curve warning sign. **Warning sign.**
- Trucks entering/crossing W5-22B warning sign northbound. **Warning sign.**
- 60 speed limit sign R4-1B (60). **Regulatory sign.**
- Side road intersection warning sign W2-4B (L). **Warning sign.**
- 100 speed limit sign R4-1B (100). **Regulatory sign.**
- Dual sided guide sign (2 poster). **Guide sign.**
- Trucks entering/crossing W5-22B warning sign southbound. **Warning sign.**
- Guide sign G4-1 8216. **Guide sign.**
- R4-1B (20) near the Cotter Reserve. **Regulatory sign.**
- R3-1A near the Cotter Reserve. **Regulatory sign.**

Brindabella Road

MISSING

- 60 speed limit sign R4-1B (60). **Regulatory sign.**
- No stopping area entry sign R5-71B. **Regulatory sign.**
- Trucks crossing/entering W5-22B MOD. **Warning sign.**
- No stopping area internal sign R5-72B. **Regulatory sign.**
- No stopping area internal sign R5-72B. **Regulatory sign.**
- No stopping area entry sign R5-71B. **Regulatory sign.**
- Hairpin bend warning sign W1-7B (R) and supplementary plate WB-2B (30). **Warning sign.**
- Various missing chevron alignment markers on bends. **Hazard markers.**
- Trucks crossing/entering W5-22B. **Warning sign.**
- Give way sign R1-2A. **Regulatory sign.**
- Trucks crossing/entering W5-22B. **Warning sign.**
- Wombat warning sign W5-48B. **Warning sign.**
- Winding road W1-5B with 'for next 1.5km' supplementary plate W8-17-1B (1.5). **Warning sign.**
- Kangaroo warning sign W5-29B. **Warning sign.**
- Winding road W1-5B with 'for next 1.5km' supplementary plate W8-17-1B (1.5). **Warning sign.**
- Turtles special sign SS: TURTLE. **Special sign.**
- Curve to the left W1-3B (L) with supplementary plate W8-2B (65). **Warning sign.**
- Turtles special sign SS: TURTLE. **Special sign.**
- Give way sign R1-2B. **Regulatory sign.**

Cotter Road

MISSING

- Guide sign G6-2 and NOTE35. **Guide sign.**
- Guide sign G2-1 8085 and NOTE37 G8-9-2. **Guide sign.**
- Side road intersection warning sign. **Warning sign.**
- Two missing width markers on approach to bridge. **2 x Hazard markers.**
- Bicycle warning sign. **Warning sign.**
- Side road intersection warning sign. **Warning sign.**
- 2 x Watch for Bicycles signs G9-57. **2 x Warning sign.**
- Bicycle warning sign. **Warning sign.**
- Side road intersection sign. **Warning sign.**

- Side road intersection sign. [Warning sign.](#)
- Side road intersection sign. [Warning sign.](#)
- W1-3B (R) and W8-2B (65). [Warning sign.](#)
- W1-3B (R) and W8-2B (65). [Warning sign.](#)
- W1-5B 9L) and W8-2B (65). [Warning sign.](#)
- 2 x W4-3B. [Warning sign x 2.](#)
- Warning sign (CROSSING AHEAD plate still intact). [Warning sign.](#)
- Warning sign (CROSSING AHEAD plate still intact). [Warning sign.](#)

DAMAGED

- Damaged/misplaced keep left directional – see photo IMG_0611. The sign sitting against the hill on the side of the road. [Regulatory sign.](#)
- Damaged trucks entering sign, potential for collapse. IMG_0676. [Warning sign.](#)
- Damaged Mt Stromlo guide sign – 3 posts. Potential for collapse, see photo IMG_0647. [Guide sign.](#)

OTHER

- Several faded warning signs on Cotter Road in both directions, including Watch for Bicycles, Bicycle warning, intersection warning, curve warnings and supplementary plates. Various example photos.

Uriarra Road

MISSING

- 100 repeater R4-1A. [Regulatory sign.](#)
- Watch for cyclists G9-57A. [Guide sign.](#)
- Curve warning sign (right) W1-3B(R) and advisory speed plate W8-2B (55). [Warning sign.](#)
- 80 repeater R4-1B(80). [Regulatory sign.](#)
- Floodway signage missing – RM to confirm if still required. [Special sign.](#)
- 60 repeater R4-1B(60). [Regulatory sign.](#)
- Unidirectional hazard marker D4-1-1A(L). [Hazard markers.](#)
- Stop sign R1-1B. [Regulatory sign.](#)
- Slippery when wet (marked as proposed on TCD grid) – W8-8B and W5-20B. [Warning sign.](#)
- Cyclist warning sign (old standard) W6-V11. [Warning sign.](#)
- Watch for bicycles G9-57A. [Guide sign.](#)
- 2 x 75 advisory speed limit blades W8-2B (75). [Warning sign x 2.](#)
- Reverse curve warning sign W1-4B (R) and plate W8-2B (65). [Warning sign.](#)
- Curve warning sign W1-3B (R) and advisory plate W8-2B (85). [Warning sign.](#)
- Curve warning sign W1-3B (L) and advisory plate W8-2B (85). [Warning sign.](#)
- Advisory plate W8-2B (85). [Warning sign.](#)
- Curve warning sign W1-3B(L) and advisory plate W8-2B (75). [Warning sign.](#)
- 2 x cyclist signs (old standard) missing W6-V11. [Warning sign x 2.](#)
- 3 x Advisory plate W8-2B (85). [Warning sign x 3.](#)
- Advisory plate W8-2B (75). [Warning sign.](#)
- Side road intersection warning sign W2-4C (L). [Warning sign.](#)
- Bicycle lane end R7-1-4. [Regulatory sign.](#)

DAMAGED

- Reverse curve sign facing the wrong way – IMG_1238. [Warning sign.](#)
- Damaged guide sign for the Uriarra East Reserve – IMG_0978. [Guide sign.](#)
- Tilted warning sign – IMG_1231. [Warning sign.](#)
- Damaged curve warning sign (supplementary plate is intact) – IMG_1247. [Warning sign.](#)
- Damaged/knocked over warning sign – IMG_1254. [Warning sign.](#)

OTHER

- Redundant post supports – various.

SUMMARY

NOTE: Missing warning signs and supplementary plates on the same column have been counted as 1 missing sign rather than 2.

Road Name	Total Number of Missing or Incorrect Signs	Number of Damaged Signs
Tharwa Drive	0	0
Naas Road	3	0
Tidbinbilla Road	9	0
Point Hut Road	4	0
Paddy's River Road	18 + various alignment markers	0
Brindabella Road	18 + various alignment markers	0
Cotter Road	20	3
Uriarra Road	26	5
TOTAL	98 + various alignment markers	8

Breakdown of Missing Signs

Road Name/s	Missing Regulatory Signs	Missing Warning Signs	Missing Guide Signs	Missing Hazard Markers	Missing Special Signs	Total Number of Missing Signs
Tharwa Drive	0	0	0	0	0	0
Naas Road	1	1	0	0	1	3
Tidbinbilla Road	0	7	2	0	0	9
Point Hut Road	0	3	1	0	0	4
Paddy's River Road	4	11	3	Various	0	18 + various alignment markers
Brindabella Road	7	9	0	Various	2	18 + various alignment markers
Cotter Road	0	16	2	2	0	20
Uriarra Road	5	17	2	1	1	26
TOTAL	17	64	10	3 + various	4	98 + various alignment markers

Breakdown of Damaged Signs

Road Name/s	Damaged Regulatory Signs	Damaged Warning Signs	Damaged Guide Signs	Damaged Hazard Markers	Damaged Special Signs	Total Number of Damaged Signs
Tharwa Drive	0	0	0	0	0	0
Naas Road	0	0	0	0	0	0
Tidbinbilla Road	0	0	0	0	0	0
Point Hut Road	0	0	0	0	0	0
Paddy's River Road	0	0	0	0	0	0
Brindabella Road	0	0	0	0	0	0
Cotter Road	1	1	1	0	0	3 + various faded signs
Uriarra Road	0	4	1	0	0	5
TOTAL	1	5	2	0	0	8 + various faded signs on Cotter Road



damaged directional



damaged
guide sign

MT STROMLO
STROMLO DE BENEVOLENTIA



damaged sign



TRUCKS ENTERING



damaged
guide sign



Urlarra



tilted
warning
sign







damaged curve
warning sign

85

damaged sign

A red arrow originates from the handwritten text 'damaged sign' and points to a small, weathered signpost located on the left shoulder of the road, partially obscured by tall grass.

Rural Roads Speed Signage – 3rd Meeting

Monday, 29 March 2021

11:00AM-12:00PM

Ben, Amrit, Adam, Lauren, Neil, Maddie, Jayanthi, Gilbert, Mark, Pawel

Summary of discussions:

- Amrit gave an overview of how he has prepared the drawings.
- There were discussions about the best way forward re. locating the signs. Options discussed included:
 - TMS Rep to meet with contractor on site and agree on locations,
 - Use GPS coordinates to locate new signs, or
 - Use distances from landmarks, intersections or existing signs.
- Mark will share the inventory of folded signs already purchased with Amrit. Shane may be able to provide further information re. keys/padlocks.
- Regular limits will be on the folded down arrangement, TTM speed limits will fold up.



- Keys will be provided to Pedal Power and other event organisers. Roads ACT to also hold keys.
- Responsibility for the changing of signs will lie with the event coordinators and/or their authorised TTM contractors.
- If we hear of any signs not changed back after events, Roads ACT may need to make good and issue a warning.
- Gilbert advised of subdivisions/upcoming developments on the blocks north of the Tharwa Bridge – new buffer speed limit arrangement will assist with this.
- We can place in the tender conditions that the contractor must provide GPS coordinates for all new signs installed. Another option is for a TMS rep to attend site post-implementation to grab GPS coordinates for Assetic/data integration team.
- Use of satellite imagery for location purposes was discussed but there have been difficulties in the past with file sizes, time needed etc.
- Amrit to include distances for new signage from existing signage on the drawings, as well as distances from major landmarks or intersections.
- Changes to the speed limit in/around Uriarra Village is a separate project.
- A joint inspection between TMS and the contractor is highly recommended for areas where warning signage already exists, due to likelihood of discrepancies in locations between TCD grid and what is on site.
- It was recommended that Shane's vehicle be used for this inspection to increase visibility when stopped etc. due to curvature of the road and high-speed environment.
- Ben will talk to Shelly and/or Jennie about prioritising the installation of missed signs with RM and timing with this project, as it was agreed it would be ideal to have the missing signs actioned at or around the same time as the installation of the new signs.
- The list of missing/damaged signage should also be provided to the ADI team for future reference to update TCD grid (particularly for signage that is of old standards).

- Media release – potential to engage Jeff to prepare a media release for the changes.
- Adam/Shahidul to conduct final check of drawings prepared by Amrit and provide any comments.
- Aim is to focus on a procurement under \$25k, focusing on installation of the 29 folded signs and 59 new speed signs, as well as keys and locks.

Details of Traffic Signs to be Erected														Total	Remarks
S.No	Road Name	Number of Signs 20km/hr	Number of Signs 40km/hr	Number of Signs 50Km/hr		Number of Signs 60Km/hr		Number of Signs 80Km/hr	Number of Signs 100Km/hr	Speed ahead	On bridge	End Speed Limit	SIDE RD INTERSECTION		
		Size B(600*800)	Size B(600*800)	Size B(600*800)	Size C(900*1200)	Size B(600*800)	Size C(900*1200)	Size B(600*800)	Size B(600*800)	G9-79 B(60)	R9-15B	R4-12B	W2-4B		
1	Uriarra Rd					11	3			3				17	From Oppermen Ave Roundabout
2	Brindabella Rd					3	1			1				5	
3	Cotter Rd	4	1			2					4	4		15	Upto Swallotail Rd
4	Paddy River Rd						1			1			1	3	
5	Tidbinbilla Reserv Rd														
6	Corin Rd														
7	Tidbinbilla Rd			1	1					1				3	
8	Nass Rd			2	1					1				4	
9	Apollo Rd														
10	Boboyan Rd														
11	Orroral Rd														
12	Point Hut Rd							1						1	
13	Tharwa Dr			1	1				1	1	2	2		8	
All Total													56		

Number of Folded Speed Signs to be Erected						
S.No	Road Name	Number of Signs 70km/hr MOD	Number of Signs 80Km/hr MOD	Number of Signs 100Km/hr MOD	Total	Remarks
		Size B(600*800)	Size B(600*800)	Size B(600*800)		
1	Uriarra Rd			3	3	From roundabout-Oppermen Ave
2	Brindabella Rd		2	3	5	
3	Cotter Rd	4	2		6	Upto Swallotail Rd
4	Paddy River Rd			1	1	
5	Tidbinbilla Reserv Rd					
6	Corin Rd		1		1	
7	Tidbinbilla Rd			3	3	
8	Nass Rd		6	4	10	
9	Apollo Rd					
10	Boboyan Rd					
11	Orroral Rd					
Total					29	

Bruan, Nicole

From: Dehelean, Adrian
Sent: Thursday, 23 September 2021 3:03 PM
To: Ludvigson, Paula
Cc: Dimitrovska, Snezana
Subject: Brindabella Road speed zone request
Attachments: Brindabella speed zone.pdf

OFFICIAL: Sensitive

Hi Paula

I have attached a PDF map of the section of road that we talked about earlier today.

Below a the table which shows when the speed limit was created: (from our IAMS database)

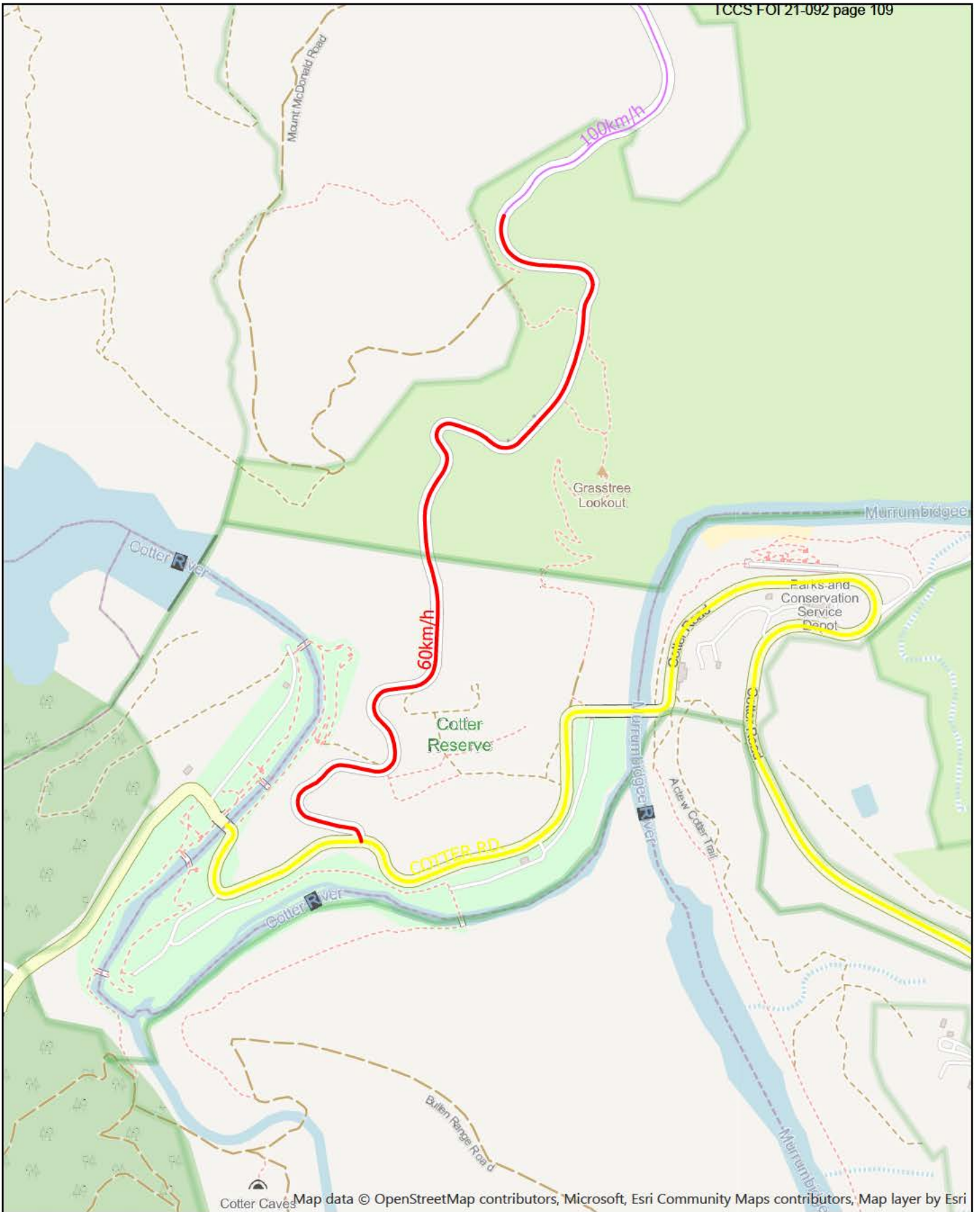
I hope this helps with your enquiry.

Let me know if there is anymore you need regarding this request.

START DATE	SPEED ZONE	Length m
7/9/2010	60	2126

Regards

Adrian Dehelean | Spatial Data and Information Officer | Geospatial and Assets | Asset and Data Integration
 PH (02) 6207 0772 | Email: ADRIAN.DEHELEAN@act.gov.au
 Asset and Data Integration | Transport Canberra and City Services Directorate | ACT Government
 Level 4 – Casuarina location, 480 Northbourne Ave, Dickson | GPO Box 158 Canberra ACT 2601



Map data © OpenStreetMap contributors, Microsoft, Esri Community Maps contributors, Map layer by Esri

Brindabella road speed zone enquiry

Brindabella Speed Zone

- 60km/h
- 80km/h
- 100km/h

0 50 100 200
Metres
Scale: 1:10,021 when printed at A3

Map Grid of Australia 1994
Geocentric Datum Australia

Prepared by:
Assets and Data Integration
City Operations
PO Box 158 Canberra ACT 2601
Date Created: 23/09/2021



Transport Canberra & City Services

Disclaimer
While all care is taken to ensure accuracy, the ACT Government does not warrant that the map is free from errors.

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Government

Transport Canberra and
City Services

RECEIVED
DATE 14.3.19 BY JK

Advisory Note Cover Sheet

SUBJECT: Brindabella/Uriarra Road - cycling safety and burnouts
TRIM NUMBER: AN19/35
MINISTER: Steel, Chris MLA
CRITICAL DATE:
CRITICAL REASON:
CONTACT OFFICER: Geoffroy Davidson

COMMENTS:

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ADVISORY NOTE

Minister for Roads

Subject	Brindabella/Uriarra Road – cycling safety and burnouts	
Critical Date	In the normal course of business	
Director-General		12/3/19
Deputy Director-General, City Services	Jc	8/3/19
Executive Group Manager, City Operations	BM	7/3/19
Executive Branch Manager, Place Coordination and Planning	GD	6/3/19
Executive Branch Manager, Roads ACT	KM	21/2/19

Minister's question/s:

You requested TCCS to work with Pedal Power regarding awareness and safety education for cycling on Brindabella/Uriarra Road. You also asked for advice on infrastructure treatments to deter burnouts and separate cyclists from motor vehicle traffic.

TCCS Response:

Pedal Power suggestions on awareness and safety:

Pedal Power provided the below preliminary advice in January 2019:

- Signage Improve 'passing distance' signage to ensure drivers are aware that cyclists may be ahead, and to remind drivers of the minimum passing distance required.
- Enforcement Increase police enforcement at locations where speeding and dangerous driving have been reported.
- Speed Reduction Review the 100km/h speed limit on Uriarra Road with a view to dropping the speed limit to 80km/h which Pedal Power consider would be more appropriate having regard to the topography and road curvature that obscure vision of the road ahead.
- Awareness Campaign A letterbox campaign about minimum passing distances with a focus on Uriarra Village. Please see draft letter at [Attachment B](#). Advice from Pedal Power is that some Uriarra Village residents are known to the cycling community for their aggressive driving and close overtaking.

Pedal Power provided follow up, formal advice on 8 February 2019, which also called for a safety audit and sealing of shoulders on Brindabella/Uriarra Road and development of policy that would require shoulders to be sealed as part of road upgrades. Please see the the formal Pedal Power advice at [Attachment A](#).

TCCS comments on Pedal Power suggestions:

Passing distance signage

The Justice and Community Safety (JACS) Directorate (Road Safety) are currently undertaking research into signage and other measures to encourage safe passing. TCCS will work closely with JACS and consider any findings arising from this study in relation to how they can be used on Uriarra and Brindabella Roads.

Enforcement

The Policing Arrangement between the ACT Government and Australian Federal Police allows the Minister for Police and Emergency Services to provide general ministerial directions to ACT Policing. A current ministerial direction is for ACT Policing to “improve road safety through particular emphasis on vulnerable road users and combating anti-social and dangerous behaviours, including speeding, driving while impaired or distracted”.

Each year, ACT Policing and JACS negotiate a road safety calendar which provides for monthly targeted enforcement and complementary media and communications activities. The 2018-19 calendar includes ‘protecting vulnerable road users’ as the focus for March. JACS have asked ACT Policing to consider additional enforcement on Brindabella/Uriarra Road during March and JACS will arrange for a portable Variable Message Sign (VMS) to be placed on location. The VMS will be used to display messages promoting both minimum passing laws and share the road messaging aimed at both motorists and cyclists.

Speed reduction

Speed limit reductions have been implemented on Brindabella/Uriarra Road as part of previous Black Spot projects and in response to growth of the urban fringe. TCCS will be undertaking a review the 100km/h speed limits that apply to sections of Uriarra Road – particularly at locations where there is a narrow shoulder and lots of cyclists. Any proposed changes to the speed limits will be consulted prior to them being delivered.

Awareness campaign

Awareness and education is also critical in addressing both driver and cyclist behaviour on all rural roads. TCCS will work with Pedal Power and JACS to identify the most appropriate methods of communications to all road users.

Burnouts at the intersection of Brindabella Rd/Cotter Dam

TCCS is aware of community concerns regarding burnouts at the intersection of Brindabella Road/Cotter Dam. TCCS will investigate using tactile line marking applied to the road surface to make burnouts uncomfortable and difficult for drivers at this location. A letter is attached for you to send to residents of Uriarra Village informing them of this.

Audible tactile line marking could also be investigated as a ‘proxy’ to physical separation of cyclists and motorists. Tactile edgeline marking was previously trialled as proxy physical separation at urban locations in the ACT but it was not supported by the cycling and motorcyclist

UNCLASSIFIED

community because of safety concerns associated with colliding with, or attempting to cross, the raised markings. This may be less of an issue on ACT rural roads because cyclists wouldn't need to cross the line marking as much – with fewer intersections than on urban roads. One issue is that the road is narrow and there is insufficient space to provide for cyclists to legally ride two abreast within the edgeline of the road. TCCS will seek views on this from Pedal Power and the ACT Motorcycle Riders Association and provide further advice to you.

Next steps

TCCS will work with JACS and Pedal Power to implement the VMS during March and to further consider options on signage, speed limit reduction and audible tactile line markings. You will be provided with follow up advisory notes on any updates.



Noted / Please Discuss

Chris Steel MLA
Minister for Roads

13./5/14