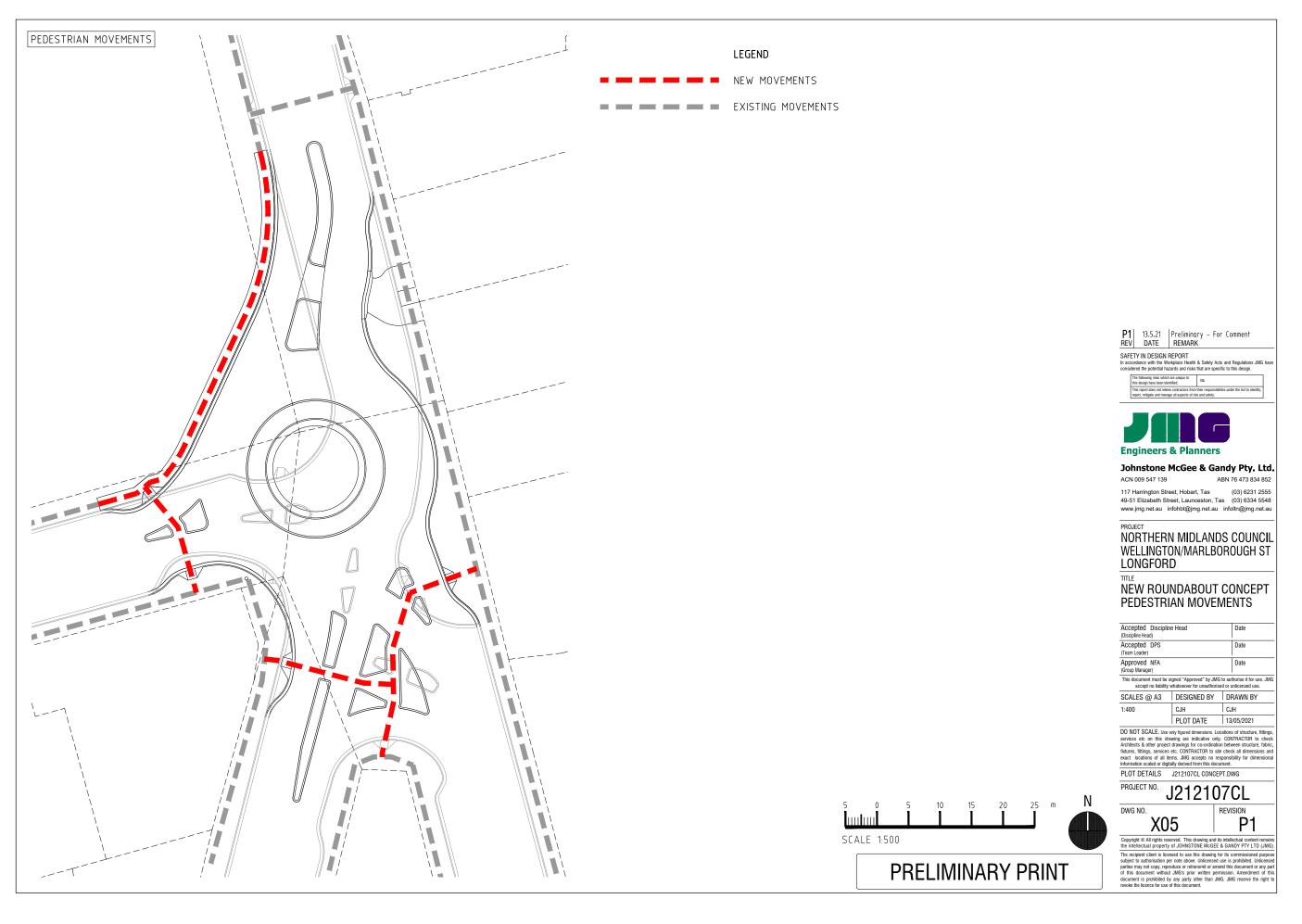
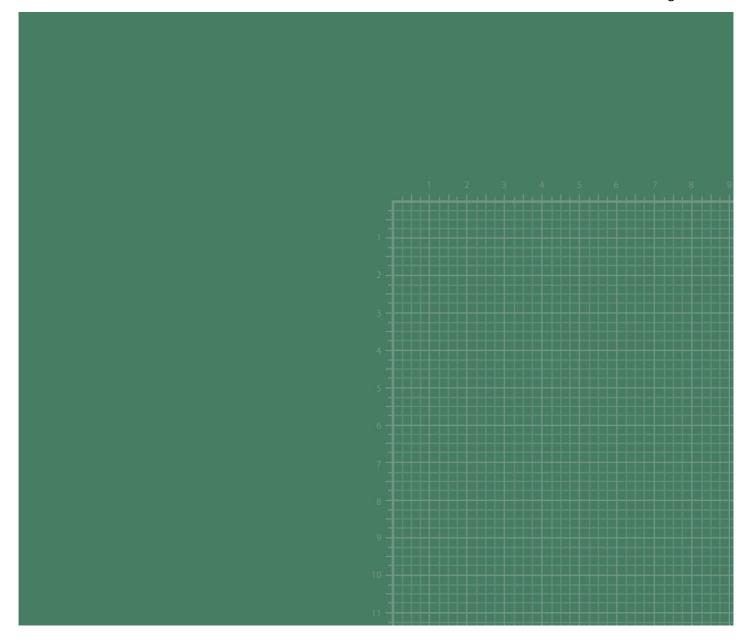
APPENDIX D

New Roundabout Concept Pedestrian Movements







Johnstone McGee & Gandy Pty Ltd

ARN 76 473 834 852 ACN 009 547 139

www.jmg.net.au

HOBART OFFICE 117 Harrington Street
Hobart TAS 7000
Phone (03) 6231 2555
Infolbt@img.net.au

Launceston TAS 7250
Phone (03) 6334 5548
Infolbt@img.net.au

Infolbt@img.net.au infohbt@jmg.net.au

LAUNCESTON OFFICE infoltn@jmg.net.au



Mr Des Jennings General Manager Northern Midlands Council Smith Street Longford 7301.

16th Feb. 2023

Dear Des,



Heritage Corner.

Attached please find my documents in response to the concern surrounding the installation of traffic barriers at Heritage Corner.

You will see from the documents that there are obvious issues, that I believe, weren't considered at the last Council meeting — but which need now to be addressed.

In as much as there seems to be a general lack of enthusiasm from both Heritage Tasmania and State Growth (even though, they refrain from **rigorously** stating such), the real legal hitch appears to the fact that both the NMC and JMG Engineering have officially stated that the concrete objects are 'bollards'.

In the case of JMG Engineering they go as far as calling them Mass Concrete Block Bollards.

Having identified the objects as 'bollards' they are clearly intended to be used for traffic intervention and as such, therefore, fall under the testing and certification requirements, as stated in Vicroads guidelines, to which State Growth adhere.

I don't have to tell you of the legal implications, if my assumptions are correct. Council has installed bollards the have not followed the regulations regarding manufacture, testing and certification.

This issue of Heritage Corner will not go away, and I sincerely ask of yourself, and the Council, for a in depth review of the issue, with the suitable solution being the removal of the 'bollards' and their possible replacement of the objects, something like the clever bollard structure Council has created at a Campbell Town intersection.

The Campbell Town solution covers both the Heritage and public safety problems, such as children and pedestrian safety and the issue of what the Mass Concrete Block Bollards could potentially do to errant vehicle-passengers and the structure of the Sticky Beaks building itself.

Trusting that you can guide Council towards a sound and acceptable outcome.

Sincerely,

John.

44 Wellington Street Longford 7301



Heritage Corner with white bollards, 100 years ago (1922).

A plea to restore our Heritage Corner.

Document Set ID: 1285215 Version: 1, Version Date: 24/02/2023

Mr Des Jennings General Manager Northern Midlands Council Smith Street Longford, 7301 Tasmania.

13th February 2023.

Dear Mr Jennings, Mayor and Councillors.

Re: Review of concrete box installation Heritage Corner.

The original submission I made to NMC objecting to the installation of 'traffic barriers', in the form of concrete boxes, centred around their inappropriate intrusion and visual corruption of one of Tasmania's most important historical sites.

Further research has suggested that the above installation also may be, not only 'not fit for purpose' but, in my opinion, actually increase the danger to the fabric and safety of the building (Sticky Beaks, Heritage Corner) and the hapless people in its vicinity.

It has also, in my opinion, created a more dangerous traffic situation at the Wellington/Marlborough street intersection, than that which existed, before the concrete-box installation.

As well, there are serious questions, as to whether the JMG Engineering design actually complies with VicRoads 'Road Barrier Guidelines', which is the standard used for Tasmanian State Growth/ TasRoads requirements.

At an on-site meeting on Friday the 3rd of February 2023 with Mr Garry Hills, Principal Analyst Traffic Engineering, State Growth, attended by Robert Henley and myself; nearly all the issues and concerns we raised were verbally confirmed by Mr Hills, with a follow up letter. (see attached documents).

In general, these concerns and issues include:

Whether the concrete box installation conformed with best practice?

Whether the barriers (and design concept) have been tested, and certified?

Whether the installation 'height' 1300mm above road level, actually created an extreme hazard for motorists being able to see children, or children, indeed, being able to see oncoming vehicles?

Whether the installation 'height' of 1300mm has impaired motorists and/or pedestrian vision, of oncoming traffic?

We were also advised by Mr Hills, during our meeting, that in reality such a traffic barrier concept was not necessary, nor recommended, under State Growth Guidelines. (see attached documents).

During our on-site examination with Mr Hills, of the old Longford Antiques building, across Marlborough Street, and on the corner of William Street, which has also suffered a errant vehicle penetration, he did not suggest nor recommend any traffic barrier protection for the William Street corner.

In deciding to proceed with "the least expensive" option offered by JMG, (Option 3.), Council appears to have failed to examine, or act upon the root cause of the three Heritage corner accidents that have occurred in the past decade.

In other words Council appears to have decided to spend \$76,000 to protect a private building, rather than address the problem of why the traffic accidents were actually occurring in the first place.

As stated in the two JMG Engineering documents, *Traffic Roundabout Concept*, May 2021, and *Traffic Study*, 6.3 *Barrier Protection Sticky Beaks Building*, after the installation of the concrete boxes:

"The possibility of two-vehicle conflicts will remain".

It would seem prudent, if not a regulatory requirement for a roadway intersection of this category, that instead of 'GIVE WAY' signage for south Wellington Street traffic entering the intersection, and form William Street, that STOP signage be installed.

The problem appears to be that vehicles **did not drive** into the Sticky Beaks and Longford Antiques buildings—they **ricochet** as a result of a two vehicle collisions, after failing to stop at the Wellington Street South/Marlborough Street intersection.

This, I believe, is the result of the following factors:

- 1. There should be a **STOP** signs instead of a **GIVE WAY** signs.
- 2. On approach, there are 7 **SEVEN** traffic movement points for an approaching motorist to consider.
- 3. The **GIVE WAY** broken white line, is never properly maintained, and the loose gravel at the intersections are not removed to avoid the grinding away of the broken white lines.
- 4. Parking bays, just past the Sticky Beaks verandah, **obscure** traffic moving along Marlborough Street towards Wellington Street.

(more)

- 5. The massive increase in traffic movements at the intersection over the past few years.
- 6. The tendency for some motorists to 'creep and sneak' at the intersection (slalom through is a regular occurance).

In relation to the use of the 1300mm by 1300mm cement boxes, which appear to be 'civil works risers' or adapted 'inspection pit items' from Hudson Civil; there does not appear to be any provision for this type of barrier in either AustRoad, VicRoads or TasRoads recommendations or specifications.

I can find no evidence that the above boxes have been tested by authorised bodies, nor whether they are built to Australian Standards, as traffic barriers.

Mr. Garry Hills from State Growth also advises that:

"In terms of accepted barrier products the Department {StateGrowth} is guided by the VIC DoT Road design note 06 04."

He further states:

"As planter boxes are not considered a 'safety barrier' they cannot be assessed for compliance under the above mentioned 'barrier standard'."

When asked whether the Heritage Corner installation has been issued with a Certificate of Compliance, he stated:

"I'm not able to confirm either way. The Department only require a Compliance Certificate under barriers installed under the above mentioned specifications."

Mr. Hills also stated, when asked whether the Hudson concrete boxes had been checked and tested by the Austroads Safety Barrier Assessment Panel he stated:

"No, not aware of any assessment under ASBAP."

When Mr Hills was asked "Does the Heritage site actually justify 'traffic barrier protection" he stated:

"Road side barriers are not usually necessary in low speed urban environments." (Wellington Street is a low speed urban environment).

It would also appear that the Sticky Beaks 'planter boxes' are designed as an **interception device** rather than a **deflection barrier**.

A **deflection barrier** is usually designed to deflect an errant vehicle away from the danger, for the safety of vehicle occupants and other road users.

An **interception barrier** is designed to stop, in situ, a vehicle, as in a head-on or side-on impact. The Sticky Beaks planter boxes weigh, with the concrete infill, between **2 and 2.5 tonnes** each.

The philosophy of safety barriers is to 'save human life', not to protect property.

The design mission of the above traffic-barrier/ planter-boxes is unclear; are they designed to tip over on impact, or are they designed stop dead, any errant vehicle?

The JMG work drawings show a 2.2 meter 'vehicle penetration zone' past the edge of the concrete box. The drawing also shows a 'major debris zone' of 6.5meters past the footpath of the concrete box to the Sticky Beaks exterior wall.

The above 'debris zone' extends to the Sticky Beaks exterior wall and includes the restaurant main front window. It is presumed that the debris in the 6.5m debris zone would include vehicle components and flying concrete?

It would appear to the untrained eye that the Council has authorised a solution that includes an object that may disintegrate upon vehicular impact and potentially send debris to the very edge of the building that it is trying to protect, as opposed the VicRoads certified bollards that would not shatter and most likely remain is situ.

In addition, it is presumed that an errant vehicle would be only traveling within the gazetted speed limit of 50 kilometres per hour. Any one livening on Wellington Street and Marlborough Street know that 'after-dark yobs' have no trouble in regularly exceeding the official limit.

As the concrete boxes are half filled with additional concrete, and the boxes are just sitting inside, what appears a 120 mm to 150 mm hole, with apparently no connecting steel reinforcing tie rods or structural anchors, the potential for the boxes to dislodge and skate over the smooth pavement and hitting the Sticky Beaks exterior wall can not be discounted.

Should the boxes tip over as the result of a heavy crash, the decorative rusty steel side-plates have the potential to assist any skating effect, or themselves dislodge from their light-weight fixings ,and become airborne 'knife blades, presenting an additional hazard of an entirely different type.

It is pertinent to point out that a hurried ill-considered exercise by the Melbourne City Council to place 108 concrete blocks from 'Harry the Hirer', had two barrier experts warn that the blocks had the potential to fly about 30meters across the pavement, and this in a 50km zone. (see attachment).

May I also suggest that the onus is not for a ratepayer to point out that the concrete boxes may or may not conform to safety standards, but the onus is upon the Council to prove that they are.

Finally, I must point out that in none of the extensive JMG traffic reports and recommendations, is there one single mention that the Sticky Beaks project is in the sensitive Longford Historic Precinct, or any acknowledgement of the legislative requirements in both the NMC Planning Scheme or the Tasmanian Historic Cultural Act 1995, for the streetscape protection of historical sites.

Trusting that the Council will remove the **ill-conceived concrete faux-traffic-barriers and install the** certified black bollards recommended by VicRoads in their 44 page Traffic Barrier regulation document. (see VicRoads document extracts.)

I look forward to receiving your response to the matters and concerns I have raised here.

Sincerely,

John Izzard.

44 Wellington Street Longford 7301.

HISTORY OF THE AFFECTED PLACE

It is known that the affected place was formerly 'The London Inn', later trading as 'The Plough Inn'. It is thought to have been built in the 1830s. A photograph published in the *Weekly Courier* of 14/12/1922 shows the building already with its distinctive balcony but not the ground level verandah. In that image, bollards defined the edge of the carriageway.

The ground level verandah is likely to have been added soon after the 1922 photograph was taken, and was certainly in existence by 1949 when a photograph from the underside was taken by a member of the Thwaites family (SLT - NS3195-1-664).

In 1998, when the place was entered in the THR, the roads and footpath had a bitumen seal, separated at the rounding of the corner by a concrete kerb placed on the surface and painted white.

More recently, the footpath has been paved at a level above that of the adjoining carriageway, and in late 2022 the pedestrian zone was extended northwards with corresponding narrowing of the carriageway.

THE DEVELOPMENT

The development comprises (a) the re-alignment of the kerb line to enlarge the pedestrian zone on the southern side of the intersection of Wellington and Marlborough Streets, and (b) the placement of five planter boxes in this zone.

It is estimated that the boxes are 1.2 metres square and stand around 0.8 metre tall. As such, they are relatively bulky street furniture. It is estimated that they are placed at distances of between 1.5 to 3 metres from the verandah perimeter of the affected place.

The boxes are documented in drawings by JMG Engineers & Planners as pre-cast concrete shells containing a ballast of concrete and hollow space filled with soil in which plants may be grown. The boxes are clad in rusted steel sheeting (Corten), into which decorative leaf motifs have been cut out on each side.

Visible parts of the boxes' concrete are painted dark green.

HERITAGE ACT NOT ENGAGED

The development is outside the boundaries of a registered place, and consequently the *Historic Cultural Heritage Act 1995* was not engaged in the development application process. For this reason, when Northern Midlands Council referred the development application to the Tasmanian Heritage Council (THC) the THC delegate responded with a notice of 'no interest' pursuant to section 36(3)(a) of the Act.

IMPACT ON HERITAGE VALUES

The most visible component of the development may be described as new street furniture comprising five planter boxes. These have been placed at a focal point of a town that has long been recognised for its heritage character. The boxes have as their backdrop one of the town's most distinctive buildings, a place that is entered in the Tasmanian Heritage Register for its architecture and townscape contribution.

The boxes present as dark objects against the light to mid-tone backdrop of the affected heritage place. They are bulky and starkly rectilinear elements that have little in common with the scale and delicate ornamental character of the town's existing street furniture.

In my considered opinion, the development detracts from the historic townscape character.

DISCUSSION

The development is understood to be a response to concerns for the safety of pedestrians, café patrons, and the heritage building on the south side of the intersection between Wellington and Marlborough Streets. It is known that the building has on occasion been damaged by vehicles leaving the carriageway.

Information on the frequency and cause of such events was not available to the author at the time of preparing this assessment, but it is assumed to be a fact that vehicle movement through this intersection presents an elevated risk to persons and property.

Public authorities have a duty of care to take any action they reasonably can to reduce to an acceptable level risks of the kind that are assumed to exist at this intersection. In doing so, authorities must consider the range of available risk mitigation options, each with its effectiveness and impacts including cost. In deliberating on the subject development, impact on heritage values would have been an important factor.

Heritage Tasmania does not have access to information on how the available risk mitigation options were evaluated by the Northern Midlands Council, and what weighting they gave to the protection of heritage values.

An option that could have been considered was to close off the carriageway nearest the affected building, simplifying traffic movements in the intersection and increasing the traffic-free zone where the boxes are presently located. The development does not preclude this option being reconsidered in the future.

The boxes are one design solution for a traffic barrier, but other options could be devised that would be less visually obtrusive; for example, engineered bollards (with or without linking cables or chains). The development does not preclude this option being reconsidered in the future.

For the box barrier solution that was pursued, various options exist for cladding treatment. The rusted steel plate cladding was probably chosen because it is known to visually blend into natural environments. However, a more effective camouflage for the boxes as they are situated is a paint colour matching the walls of the heritage building that forms its backdrop. A change of cladding would not be difficult or costly to effect. With any change in cladding, the existing decorative motifs need not be retained as they have no obvious relevance to the setting nor do they noticeably enhance the aesthetic of the boxes.

CONCLUSION

The conclusions that I draw from having inspected the completed development and having re-examined the development application as referred to the Tasmanian Heritage Council on 23/05/2022, are that: (a) the boxes detract from the historic townscape character of Longford and more particularly, detract from the presentation of one of the town's most important heritage locations; (b) the visual impact of the boxes that exist can be reduced by a changing their colour to match that of the heritage building that forms their primary backdrop; and, (c) other risk mitigation options that are more sympathetic to the heritage townscape may yet be found to be feasible, and so, in future as and when circumstances allow, a search for better alternatives should be continued.

Yours sincerely

lan Boersma

Works Manager, Heritage Tasmania

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APPENDIX - SUPPORTING IMAGES





1. LIST layer showing concentration of THR places in the central part of Longford. Subject site indicated by red arrow.

2. Image published in the Weekly Courier of 14/12/1922.





3. Under verandah, 1949 (SLT - NS3195-1-664). 4. View looking south, c1950. (SLT - LPIC147-4-269)





5 & 6. Images taken circa 1998 (Tasmanian Heritage Council).



7. The affected place with raised footpath of brick paving and small planter boxes at each verandah post, circa 2021. Source: https://www.ourtasmania.com.au/launceston/longford-walk.html



8. Photograph taken 8/02/2023, after the widening of the footpath and placement of five planter boxes.



9. Looking south, 8/02/2023.



10. Looking west, 8/02/2023.



11. Looking south, 8/02/2023.

Garry Hills
Principal Analyst
Traffic Engineering
Infrastructure Tasmania
Dept. State Growth
Hobart and Launceston.

'Berriedale'

February 5th 2023

Dear Garry,

Traffic Barriers Heritage Corner Longford.

Thank you meeting me on site on Friday 3rd February to discuss the traffic barrier installation on the corner of Wellington and Marlborough Streets, Longford; undertaken in the past few month by the Northern Midlands Council.

As you indicated that you would answers the questions I put to you at the meeting, they are, hereby listed as follows:

- 1. Does State Growth (Tas Roads) rely on the Victorian Roads Barrier Standards for Tasmanian traffic barrier design, and specifications?
- 2. Does the Longford Heritage Corner barrier installation comply with the Victorian Standards or indeed AustRoads criteria?
- 3. Does 'Traffic Engineering' Tasmania know whether the professional NMC advisors and consultants involved in the design and installation at Heritage Corner were 'approved person or persons holding an Australian Safety Hardware Training and Accreditation Scheme (ASHTAS) certificate?
- 4. Was the post-installation of the Heritage Corner, issued with a Certificate of Compliance?
- 5. Have the Hudson concrete riser-type boxes (1200mmx 1200mm x1200mm boxes been checked and tested by Austroads Safety Barrier Assessment Panel?
- 6. Does the Council's designer and engineering specialist proposal and subsequence construction meet the Relevant Design Guidance AGRD, part 6, and all other guidance material regarding all aspects of 'intercepting street furniture'?

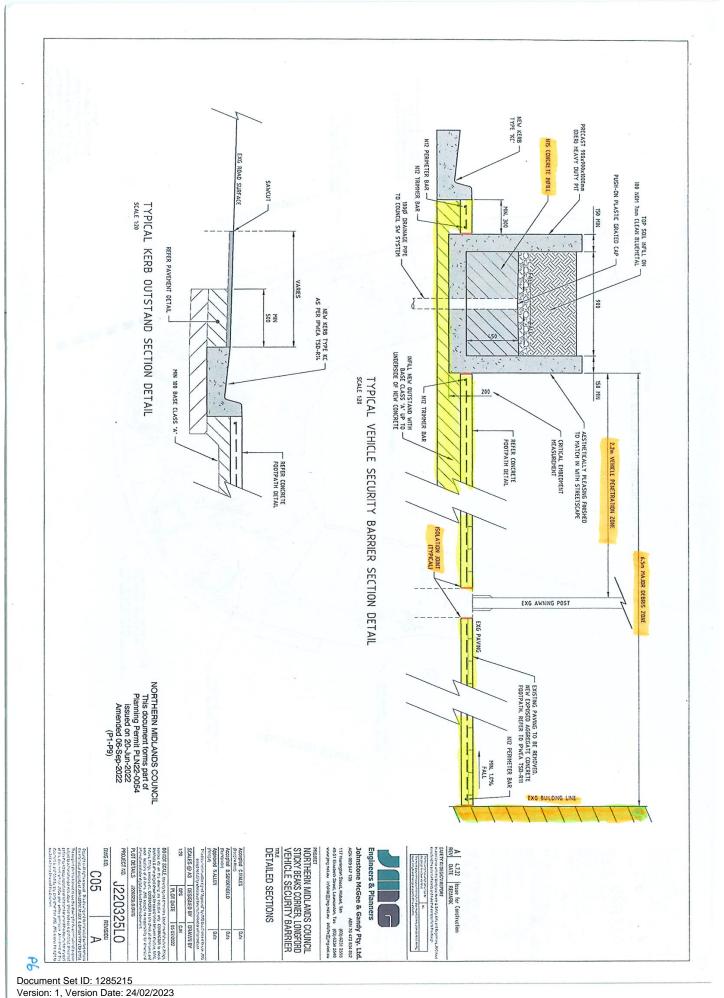
The answer to a few additional questions would also assist our examination of the Heritage Corner Installation.

- a. Are the design of traffic barriers primarily for the protection of the public, pedestrians, and people travelling in motor vehicles, rather that for the safe-guarding of public and private buildings?
- b. Does the Heritage Site actually justify 'traffic-barrier installations'?
- c. Does the extreme height (1200mm) of the concrete boxes pose a danger to playing children; both attracted to the structures, or waiting to cross at the intersection?
- d. Also, are children potentially endangered by not being seen by approaching motorists, or indeed by children themselves, not being able to see approaching vehicles?
- c. Because of the height of the boxes, are motorists in either low slung sports cars, or Mini-type vehicles, endangered by having their overall street/approaching-vehicle-vision impaired?

Trust that you can assist in this matter as the existing installation, we believe, is more dangerous, than none, and the installation of Vic Roads approved bollards will both improve the safety of the corner and help to restore the corner to its original, and deserved state.

Sincerely,

John Izzard



Attachment 16.1.8 Report to GM from J Izzard February 16 2023

From: Hills, Garry Garry.Hills@stategrowth.tas.gov.au &

Subject: RE: Heritage Corner, Longford
Date: 13 February 2023 at 3:33 pm
To: John Izzard johnizzard@bigpond.com



Hello John – please see below advice in red against your queries (reproduced below from your original letter).

As mentioned, these comments are purely based on the technical aspects raised and are not an indication that the Department have any concerns with the subject works undertaken from a State road safety and operational perspective.

Let me know if you require any further clarifications.

Kind regards,

Garry Hills I Principal Analyst Traffic Engineering Infrastructure Tasmania I Department of State Growth GPO Box 536, Hobart TAS 7001 Phone: (03) 6777 1940 www.stategrowth.tas.gov.au

Courage to make a difference through TEAMWORK | INTEGRITY | RESPECT | EXCELLENCE

As you indicated that you would attempt to answer the questions I put to you at the meeting, they are, hereby listed as follows:

- Does State Growth (Tas Roads) rely on the Victorian Roads
 Barrier Standards for Tasmanian traffic barrier design, and specifications?

 State Growth specifications for roadside barriers are set out in Section 708:
 Steel Beam Guard Fence and Section 711: Wire Rope Safety Barrier (WRSB).

 These are based upon the Victorian Department of Transport specifications with some minor amendments to suit local conditions. In terms of accepted barrier products the Department is guided by the Vic DoT Road Design Note 06-04.
- 2. Does the Longford Heritage Corner barrier installation comply with the Victorian Standards or indeed AustRoads criteria?
- As the planter boxes are not considered a 'safety barrier' they cannot be assessed for compliance under the abovementioned barrier standards.
- 3. Does 'Traffic Engineering' Tasmania know whether the professional NMC advisors and consultants involved in the design and installation at Heritage Corner were 'approved person or persons holding an Australian Safety Hardware Training and Accreditation Scheme (ASHTAS) certificate?
- We have no information regarding whether or not the consultants engaged by NMC hold an ASHTAS Certificate. It is expected that will have necessarily provided all advice and recommendations to Council under the usual requirements for professional engineers who are suitably qualified and experienced in road design practice.

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- 4. Was the post-installation of the Heritage Corner, issued with a Certificate of Compliance?
- I'm not able to confirm either way. The Department only require a compliance certificate for barriers installed under the abovementioned specifications.
- 5. Have the Hudson concrete riser-type boxes (1200mmx 1200mm x1200mm boxes been checked and tested by Austroads Safety Barrier Assessment Panel?
- No, not aware of any assessment under ASBAP.
- 6. Does the Council's designer and engineering specialist proposal, and subsequence construction meet the Relevant Design Guidance AGRD, part 6, and all other guidance material regarding all aspects of 'intercepting street furniture'?
- Council's designer would need to provide advice on this aspect. It is noted that AGRD Part 6 is primarily about the protection or elimination of roadside hazards in high speed rural road environments. While there is some commentary on urban road side hazards (particularly where the speed limit is 70 km/h or higher) the advice for a 50 km/h speed environment indicates that the risk score is very low and even if there is a vehicle impact it is unlikely to result in a serious outcome for vehicle occupants.

The answer to a few additional questions would also assist our examination of the Heritage Corner Installation.

- a. Are the design of traffic barriers primarily for the protection of the public, pedestrians, and people travelling in motor vehicles, rather that for the safe-quarding of public and private buildings?
- Generally yes. An exception (as an example) might be where there is a building or solid structure very close to the edge of a high speed road and a barrier is installed to protect this impact hazard.
- b. Does the Heritage Site actually justify 'traffic-barrier installations'?
 Road side barriers are not usually necessary in low speed urban environments.
- c. Does the extreme height (1200mm) of the concrete boxes pose a danger to playing children; both attracted to the structures, or waiting to cross at the intersection?
- See item d.
- d. Also, are children potentially endangered by possibly not being seen by approaching motorists, or indeed by children themselves, not being able to see approaching vehicles?
- Any solid structure has the potential to obstruct driver visibility to a younger pedestrian and vice versa.
- e. Because of the height of the boxes, are motorists in either low slung sports cars, or Mini-size vehicles, endangered by having their overall street/approaching-vehicle-vision, impaired?
- Driver eye height for the measurement of intersection sight distance specified under Austroads Guidelines is 1.1 m from road level. This covers the majority of

the Australian vehicle fleet. The Department provided advice to Council that the height of the planter boxes should not be more than 800 mm.

From: John Izzard <johnizzard@bigpond.com>

Sent: Monday, 6 February 2023 8:44 AM

To: Hills, Garry <Garry.Hills@stategrowth.tas.gov.au>

Subject: Heritage Corner, Longford

Dear Garry,

Many thanks for meeting Robert Henley and myself on Friday (3rd February), on site, to discuss the various issues surrounding the concrete boxes installed by NMCat Heritage corner, Longford.

The attached letter lists the questions that we are anxious to have answered, and I would appreciate if you could reply to them in either long or short form, if this is possible.

The NMC requires all items for their Feb 20th 2023 general meeting be provided by **Wed. 15th of February** so, I know it is a big ask, but could you please reply to my letter by this date, if you can.

Again, many thanks for your attention and interest in this matter,

Sincerely,

John Izzard.

p.s. Could you let me know the description details of the bollard that Vic Roads approves for this type of corner problem.

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Garry Hills.docx

Appendix 1.

Serious issues:

Tasmania Department of State Growth (Tasroads) uses the Victorian Government design guidelines for Traffic Barriers. The starting point is, what are the objects that have been installed at Heritage Corner, Longford.

The Northam Midlands Council refer to them as 'bollards'.

JMG Engineering, on their plans to Council, call them 'Mass Concrete Block Bollards'.

Under the Vicroads requirements Bollard Categories.

Bollard Categories Road Safety Devices:

All road safety devices must be submitted to the Australian Safety Barrier Assessment Panel ASBAP for national assessment. Road Safety Devices accepted by DoT are published in RDN 06 04. These devices must be installed as tested to ensure an equivalent performance to AS3845.2: 2017-Road Safe Devices.

Performance:

Bollards must be crash tested in accordance with AS/NZS 3845.2:2017.

As well, under:

4.2 Quality assurance Certificate of Compliance:

"Due to the increasing complexity of propriety safety barriers and terminals to install, and the lack of an installer accreditation scheme, DoT requires that all proprietary systems receive a Certificate of Compliance (CoC) by the system supplier".

As the system supplier and manufacturer is, I believe Hudson Civil, has that manufacturer of the 'mass concrete block bollards' supplied to the NMC, such a Certificate?

Owing to the complexity of the above issues, and those contained in my letter of the 13th of February, has Council considered the legal implications of the Sticky Bears corner redevelopment, and the potential liability should a serious incident occur.

From: Hills, Garry Garry.Hills@stategrowth.tas.gov.au &

Subject: RE: Sticky Beaks Corner,
Date: 14 February 2023 at 12:08 pm
To: John Izzard johnizzard@bigpond.com

Cc: Rob & Annette Aldersea ppc1888@bigpond.com



Hello John – see below information. Thanks, Garry

From: John Izzard <johnizzard@bigpond.com> Sent: Tuesday, 14 February 2023 11:23 AM

To: Hills, Garry < Garry. Hills@stategrowth.tas.gov.au>
Cc: Rob & Annette Aldersea < ppc1888@bigpond.com>

Subject: Sticky Beaks Corner,

Dear Garry,

Many thanks for your response.

Could you clarify the following:

- Did State Growth insist on yellow bollards.
 - The Department have no specific requirements relating to the colour of traffic / pedestrian bollards.
- You mentioned at on-site meeting, that VicRoads had one recommended/ approved bollard that would suit the corner.

Could you give me the name and code #.?

- There are actually two accepted products that are designed to limit any errant vehicle encroachment in a low speed environment. See below image
 Source: RDN 06-04 - Accepted Safety Barrier Products.
- 3. Is there any other traffic barrier in Tasmania, like Longford's?
 - I can't definitively say if there is or not. Not aware of any similar situations specifically as a traffic barrier in the northern half of the State, but there could be something on the local road network and also in the south.

Hope you can assist.

Cheers,

John.

	n Protection Boll Insidered when a r			in low-speed environments. They should
EAB	Impact Absorbing Systems	1600kg @ 50km/h (Physical)	Nil	Conditionally accepted at NCHRP TL-Cuntil a MASH equivalent product is accepted. Product must be installed on roads with a posted speed of 50 km/h or less. And mube used in accordance with RDN 06-16 Appendix A.

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				All installations require a site specific risk assessment and must be approved prior installation. Do'T should be notified of any incidents involving this product.
Omni-Stop Ultra Bollard	SaferoadsPty Ltd	1600kg @ 50km/h (Physical)	Nil	Conditionally accepted at NCHRP TL-4 until a MASH equivalent product is accepted. Product must be installed on roads with a
				posted speed of 50 km/h or less. And mu be used in accordance with RDN 06-16 Appendix A.
				All installations require a site specific risk assessment and must be approved prior installation.
				DoT should be notified of any incidents involving this product.

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The Vic Roads bollard document outlines the problem of bollard selection with comprises needed, when selecting suitable and tested bollard solutions.

Contrary to claims that there no acceptable bollards available, and that deep sunken bollards would inter with public utility under payment installations, there are available high-impact bollards that require only 200m depth into footpath surrounds.

The Roman cross-rail attachments, as shown in the Campbelltown installation could surely be adapted to suit the Longford situation, and be constructed in such a way as to provide 'deflection' as apposed to 'interception'.

Regarding the cost of re-imagining the Heritage Corner installation, any remedial expense should be shared by both State Growth and and /or Council's technical advisors.

Department of Primary Industries, Parks, Water and the Environment



14 February 2023

File: 10-86-92 THC

Mr John Izzard 'Berriedale' 44 Wellington Street Longford TAS 7301

Dear Mr Izzard,

As requested, by way of this letter I provide a heritage impact assessment of the boxes recently placed in the road reservation fronting the heritage building at 1-3 Marlborough Street, Longford; which I consent to your sharing with the Northern Midlands Council.

Prior to this, Heritage Tasmania had not undertaken any formal assessment of the development because it is not within the boundary of a place that is entered in the Tasmanian Heritage Register (THR). The *Historic Cultural Heritage Act 1995* was therefore not engaged by the development.

THE AFFECTED PLACE

The nearest place that is entered in the THR is the property at 1-3 Marlborough Street, Longford, (THR # 5118 for #1 and 5119 for #3), the boundary of which is described by certificate of title 52310/1. For the purposes of this letter, 1-3 Marlborough Street will be referred to as 'the affected place'.

Nearby, on another side of the intersection, is the Longford Jubilee Lamp and Jubilee Fountain (THR # 5175), and within the immediate context are the Queen's Arms Hotel at 69 Wellington Street (THR # 5165), Longford Municipal Hall at 67 Wellington Street (THR # 5164) and The Big Store at 73 Wellington Street (THR # 5167). The property on the opposite side of Marlborough Street, the former Longford Hotel at 1-3 William Street, dates to 1827 but is not entered in the THR.

There is a dense concentration of heritage places around the intersection which has been known as 'Heritage Corner' (see image in Wikipedia entry for 'Longford, Tasmania'). In a statement relating to social values, the THR datasheet for the Longford Jubilee Lamp and Jubilee Fountain describes the setting as "an historic precinct on the most prominent intersection in Longford, a town noted for its Georgian and Victorian architecture."

Prior to the THR coming into existence, 'Longford Historic Town' was entered in the Register of the National Estate (ref. *The Heritage of Australia: The Illustrated Register of the National Estate*, published by The Macmillan Company, 1981, page 7/132) which functioned as a statutory heritage list from 1976 to 2012.

By 1984, the National Trust had also Classified the affected place, providing the basis for the Heritage Council's registration which was gazetted 14 years later, on 9/12/1998.

The THR entry for the affected place provides scant information as to its historic cultural heritage values. Statements are given against criterion (d) and (f), the latter being relevant to the matter at hand: "This building is of historic heritage significance because its townscape associations are regarded as important to the community's sense of place."

Protecting Tasmania's Historic Environment

Level 1, Public Buildings 53 St John Street LAUNCESTON TAS 7250 Australia Ph (03) 6165 3700 | Email enquiries@heritage.tas.gov.au | Web www.heritage.tas.gov.au

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REPORT For NORTHERN MIDLANDS COUNCIL Traffic Study Wellington Street and Marlborough Street Intersection, Longford October 2020





Johnstone McGee & Gandy Pty Ltd

ABN 76 473 834 852 ACN 009 547 139

www.jmg.net.au

HOBART OFFICE 117 Harrington Street Hobart TAS 7000

49-51 Elizabeth Street Launceston TAS 7250 Phone (03) 6334 5548

LAUNCESTON OFFICE

Phone (03) 6231 1535 infohbt@jmg.net.au

infoltn@jmg.net.au

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- Compliance with BCA is not part of the scope of this report. The report may include references to BCA as a guide to likely compliance/non-compliance of a particular aspect but should not be taken as definitive nor comprehensive in respect of BCA compliance.

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 - Due to the nature of building construction it is not physically possible to gain access to/inspect all materials of construction when conducting a non-destructive inspection. Inaccessible areas may include:
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 - certain plant/ducts/pipework/switchboards, floor coverings covered by subsequent renovations.

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- Estimates are order of cost. They are not quotes, nor based on quotes and are not upper limit of cost. Estimates are not based on measured quantities or a defined scope of works.
- Estimates are exclusive of GST, engineering fees, market escalation, associated builder's works, builder's margins, design contingency, project
- As project scope becomes better defined it is strongly recommended that estimates are updated.

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Appendix A - No Right Turn out of Wellington St at Marlborough Street

Appendix B - No North Bound Entrance into Wellington Street at High Street

Appendix C - Barrier Protecting Sticky Beaks Café Building



1. Introduction

The Northern Midlands Council commissioned Johnstone McGee and Gandy Pty Ltd (JMG) to provide a Traffic Options Analysis and associated Report for the traffic issues identified in the Northern Midlands Report, *Traffic Concerns at the Wellington and Marlborough Streets Longford*. That Report requested an analysis based on the following Northern Midlands Council's options:

- Do nothing and continue to monitor the safety at the intersection.
- Consider changes to the kerb alignment at the intersection as part of the Longford Main Street upgrade plan currently being developed by Lange Design.
- Install bollards to provide protection for pedestrians investigate whether Vulnerable Road User or Blackspot funding is available for these works.
- Continue to discuss the possibility of raised intersection treatment with the Department of State Growth subject to the outcome of the Austroads report on Raised Safety Platforms.

The Northern Midlands Council then provided a scope requirement in their email to JMG dated 23 July 2020 with the following requirements:

- The possibility of making this intersection one way and closing it to north bound traffic either at the intersection or further south.
- Heavy vehicle issues if this intersection is closed to northbound traffic.

JMG provided a Proposal to the Northern Midlands Council dated 28 July 2020 agreeing to deliver an option analysis and associated report on three alternatives as:

- No Right Turn out of Wellington St at Marlborough Street.
- No North bound Entrance into Wellington Street at High Street. Entrance only available at the Marlborough-Wellington Street Intersection.
- An option that can be pursued that does not require a redirection of traffic but will
 protect patrons of the adjoining café and the café building itself, and any pedestrians.

2. Existing Infrastructure

Figure 1 is a LISTmap extract showing the Marlborough and Wellington Street intersection.



Figure 1. LISTmap extract showing road ownership and property boundaries

The shaded area in Figure 1 shows the Department of State Growth casement for Marlborough Street and Wellington Street north of the intersection. LISTmap shows Marlborough Street



Traffic Study - Wellington / Marlborough St, Longford - October 2020

and Wellington Street north of the intersection as an Arterial Road controlled by the Department of State Growth. Figure 1 also shows Wellington Street south of the intersection as a Sub-Arterial Road controlled by Northern Midland Council. Figure 1 also shows property boundaries as described by LISTmap. The complexity of this traffic problem is that it occurs at the interface between two road management jurisdictions. All options considered in this Report must consider the requirements of both Road Managers during the option's assessment.

Figure 2 is a LISTmap extract showing selected traffic movements at the Marlborough Street and Wellington Street intersection. Also shown are the adjoining landowners as key stakeholders.

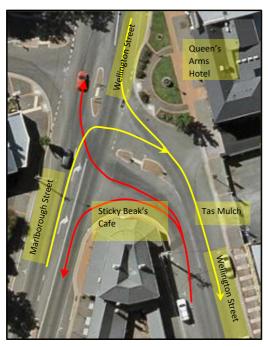


Figure 2. LISTmap extract showing traffic movements and adjoining properties

Figure 3 summarises the traffic counts for Wellington Street as provided by Northern Midlands Council.

Austroads Vehicle Classification	Classification Description	Traffic Counts 8 August 2020 to 14 August 2020 (Vehicles/6 days) Average Daily Traffic Counts (Vehicles/6						icles/day)		
1	Short	8662		Light Vehicles			1444		Light Vehicles		
2	Short - Towing	167	8829	(Class 1 - 2)	8829	95.4%	28	1472	(Class 1 - 2)	1472	95.3%
3	Two Axle Truck or Bus	294		Light to Medium			49		Light to Medium		
4	Three Axle Truck or Bus	29		Trucks (Class 3 - 5)			5		Trucks (Class 3 - 5)		
5	Four Axle Truck	12	335	Trucks (Class 5 - 5)			2	56	Trucks (Class 5 - 3)		
6	Three Axle Articulated or Rigid Vehicle and Trailer	2					1				
7	Four Axle Articulated or Rigid Vehicle and Trailer	16		Heavy Trucks (Class 6 - 9)			3		Heavy Trucks (Class 6 - 9)		
8	Five Axle Articulated or Rigid Vehicle and Trailer	17		(Class 0 - 5)			3		(Class 0 - 3)		
9	Six Axle Articulated or Rigid Vehicle and Trailer	41	76				7	14			
10	B Double or Heavy Truck and Trailer	11	11	B-Doubles (Class 10)	422	4.6%	2	2	B-Doubles (Class 10)	72	4.7%
·	Totals	9251	9251		9251	100.0%	1544	1544		1544	100.0%

Figure 3. Traffic counts for Wellington Street south of Sticky Beaks Cafe



Figure 3 shows an approximate Annual Average Daily Traffic of 1,544 vehicles with 4.7% of that count heavy vehicles. Of significance is the 16 heavy articulated vehicles in the traffic count for Wellington Street south of Sticky Beaks Café. The traffic split provided by the Northern Midlands Council is approximately 55% south and 45% north at the traffic count site. Based on this information, approximately seven articulated heavy vehicles negotiate the intersection from the south to the north according to the red path as detailed in Figure 2. Otherwise, vehicles are registering at the traffic counter and moving to one of the businesses prior to entering the intersection.

Figure 4 is a table showing traffic counts for Poatina Main Road, locally named Marlborough Street and Wellington Street north of the intersection. Figure 4 provides data for the traffic count station A1604100 located at the northern entrance to Longford and the traffic count station A1604120 located in Longford south of the intersection. The difference between the counts from both stations is 6,086 vehicles. These vehicles have either Longford surrounds north of the traffic count station A1604120 as their origin / destination or they move along Wellington Street south.

Station	Loaction	Year	AADT	%HV
A1604100	Poatina Main Road, 370 metres south of Illawarra Main Road	2018	9255	10.2
A1604120	Poatina Main Road, 190 metres South of Cracroft Street	2018	3169	14.3
	Difference		6086	

Figure 4. Marlborough Street Traffic Counts

The traffic count data described in Figure 3 occurred during restrictions imposed due to the COVID-19. Considering both the content of Figure 3 and Figure 4, the traffic count for Wellington Street south could be considerably higher.

3. Problem Definition

JMG understands the problem for the Northern Midlands Council as errant vehicle mounting the footpath outside Sticky Beaks Café and causing building damage. There is also potential for an errant vehicle causing injury to people occupying the footpath. With reference to the Submission to Council for Northern Midlands Council meeting on 20 July 2020 by Gregory Howlett, a vehicle accident occurred at the intersection of Marlborough Street and Wellington Street where an errant motor vehicle caused significant damage to Sticky Beaks Café building. The Submission to Council proposed a solution to reduce similar vehicle accidents by removing the right turn movements for traffic moving from Wellington Street south to Wellington Street north through the intersection with Marlborough Street.

JMG understands the vehicle accident involved a light truck turning right from Wellington Street south into Wellington Street north. For some reason, the truck failed to give way to a small light vehicle travelling south on Wellington Street north. The light vehicle collided with the front of the truck causing the light vehicle to veer into the Sticky Beaks Café building. The cause appears to be a failing to give way by the truck. A similar accident may also occur if the truck was turning left from Wellington Street south to Marlborough Street.

Restricting right turn movement from Wellington Street south is a solution but, similar vehicle accidents could occur with vehicles moving north along Marlborough Street and turning right into Wellington Street south, impacting southbound vehicles on Wellington Street north. As previously mentioned, similar vehicle accidents could occur with vehicles turning left from Wellington Street south to Marlborough Street.

A roundabout at the junctions of William Street, Marlborough Street, Wellington Street south and Wellington Street north is an acceptable traffic management solution that would



significantly reduce the risk of collisions at the Marlborough Street and Wellington Street intersection. This solution would address the cause and significantly reduce the consequence of the effect.

Based on Table 3.10 'Key traffic management considerations in the selection of roundabout', from the Austroads *Guide to Traffic Management Part 6: Intersections, Interchanges and Crossings Management*, roundabouts:

- are generally much safer than traffic signals in terms of crash severity,
- create less delay than traffic signals during the off-peak periods, leading to less overall
 delay to traffic throughout the day,
- readily caters for heavy right-turns,
- can be used in local streets,
- controls vehicle speeds as a traffic calming measure,
- assist in providing access for important minor roads,
- need to consider footprint and therefore possible land acquisition.

The decision to place a roundabout at the intersection is therefore outside the scope of this Report. To progress a roundabout alternative, the option would require a full intersection analysis to determine suitability. If requested, JMG could provide this service.

JMG will also examine an option that exclusively addresses the effect of an errant vehicle. This option proposes a physical barrier to reduce the risk of errant vehicles colliding with any part of the Sticky Beaks Café building.

JMG confirms that the three options for analysis will address the problem with the options as:

- No Right Turn out of Wellington St at Marlborough Street.
- No North bound Entrance into Wellington Street at High Street. Entrance only available at the Marlborough-Wellington Street Intersection.
- An option that can be pursued that does not require a redirection of traffic but will
 protect patrons of the adjoining café and the café building itself, and any pedestrians.

JMG also considered an alternative to fully close the intersection of Wellington and Marlborough, that would remove all turns at Marlborough Street.

JMG will also provide additional commentary in the Options Analysis regarding:

- Movement of pedestrians at the Wellington Street and Marlborough Street intersection.
- Raised intersection treatment such as the Raised Safety Platforms.

4. Option Assessment

4.1 No Right Turn out of Wellington St at Marlborough Street

This Option was proposed in the *Submission to Council* for Northern Midlands Council meeting on 20 July 2020 by Gregory Howlett. Appendix A of this Report provides a concept plan of this option. An extract from the *Submission to Council* regarding this option follows:

A simple and inexpensive solution (raised by two Councilors) would be to disallow right hand turns from Wellington Street (south) at the Sticky Beaks intersection into Wellington Street (north). As this would not involve any change to the intersection bar the placement of appropriate signage, it is hoped that the Department would be amenable to this solution. If implemented, regular northbound traffic on Wellington Street (south) would in time redistribute itself amongst the various cross streets running between



Wellington Street and Marlborough Street. This would just occur naturally. There would also be minimal disruption to affected businesses and residents.

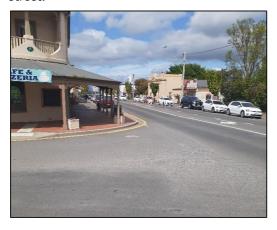
JMG considers that passive control measures such as traffic signage, to not allow right turns from Wellington Street south into Wellington Street north, would be ineffective and require enforcement measures to ensure compliance. Both passive signage and active control measures such as traffic island restricting the right turns from Wellington Street south into Wellington Street north would result in a better solution for this option. This option would allow left turns from Wellington Street south into Marlborough Street. This option would also allow two-way access for all businesses and residents located on Wellington Street south. Should any vehicle from businesses or residents located on Wellington Street south plan a destination north of the intersection, they would require a possible travel path through the Wellington Street south and High Street intersection then through the High Street Marlborough Street intersection.

This option will not reduce the access to businesses and residents located on Wellington Street south, but it will reduce the through traffic travelling to Wellington Street north. Photograph 1 shows the intersection from the landscaped area outside the Queens Arms Hotel with a view down Wellington Street south. It also shows the south bound lane of Wellington Street south. This option allows vehicle to move along Wellington Street north and turn left into Wellington Street south.



Photograph 1. Wellington Street

Photograph 2 is a view from the traffic island south along Marlborough Street. Due to the constrained nature of the intersection, heavy articulated vehicles turning left from Wellington Street must obstruct the northbound right turn lane on Marlborough Street. This option allows vehicle to move along Wellington Street south and turn left into Marlborough Street.



Photograph 2. View from the traffic island south along Marlborough Street



This option will not remove the risk of vehicle collisions for vehicle movements from Wellington Street south turning left into Marlborough Street or from Marlborough Street turning right into Wellington Street south. The consequence of an accident during either of these traffic movement may result in errant vehicle mounting the footpath and colliding with the Sticky Beaks Café building.

Photograph 3 shows the raised traffic island on the centreline of Wellington Street south at the approach to the intersection with Marlborough Street. This option will not reduce the access to businesses and residents located on Wellington Street south.



Photograph 3. Traffic island on the centreline of Wellington Street south

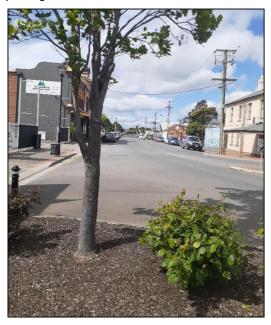
Photograph 4 shows the traffic signage from Wellington Street south turning right into Wellington Street north as a Give Way control. This option will require a similar raised traffic island and signage to restrict right turns. The new raised island would extend to the left of existing island shown to prohibit right tun movements.



Photograph 4. Traffic signage from Wellington Street turning right



Photograph 5 shows the intersection from the landscaped area outside the Queens Arms Hotel with the entrance to the Queens Arms Hotel and Tas Mulch on the left side of Wellington Street south. Wellington Street south is a sub arterial road with adequate width and parallel parking on both sides of the street.



Photograph 5. Entrance to the Queens Arms Hotel and Tas Mulch

During the traffic analysis JMG approached selected business operators on Wellington Street south. The business operator at Tas Mulch had the following comments regarding this option:

- They operate truck and dog heavy vehicle configurations and currently avoid the intersection where possible.
- Trucks leaving Tas Mulch attempting to turn right at the Wellington Street and Marlborough intersection will block the traffic travelling south along Wellington Street south causing traffic congestion.
- Truck drivers travelling north move along Wellington Street south then through the Wellington Street south and High Street intersection then through the High Street Marlborough Street intersection.
- Truck drivers rarely turn left into Marlborough Street from Wellington Street south because they must obstruct the right turn lane from Marlborough Street.
- Business operator would be amenable to no right turns from Wellington Street south to Wellington Street north.

The business operator at Longford Mower and Chainsaw Centre had the following comments regarding this option:

- Opposed to any option that would reduce the number of traffic movement past the business as passing trade generates a large part of his business.
- Provided a simple concept as a possible option, see Figure 5.



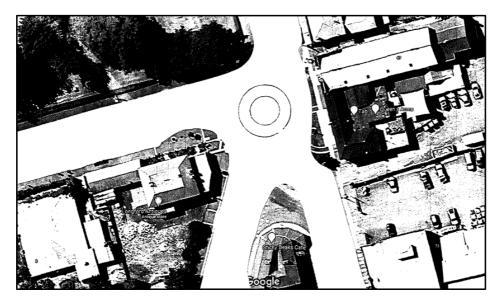


Figure 5. Simple concept provided by Longford Mower and Chainsaw Centre

The business operator at Sticky Beaks Café had the following comments regarding this option:

- Prefers this option to reduce the risk of vehicles impacting the at Sticky Beaks Café building.
- Agrees that a roundabout option would be the best solution.
- Claims that there is restricted sight distance north along Wellington Street north when giving way at the intersection.
- Vehicles turning right from Wellington Street south to Wellington Street north must also consider vehicles entering and exiting William Street.

Photograph 6 is a view of Wellington Street north from the traffic island to the north showing very good sight distances.



Photograph 6. Wellington Street north from the traffic island to the north



4.2 No North bound Entrance into Wellington Street at High Street

This option prohibits traffic entering from the south to the section of Wellington Street south, from the Wellington Street south and High Street intersection. Vehicles will continue to move south on Wellington Street south and can also turn right into High Street from Wellington Street south. Figure 6 is a marked-up image showing the concept of the No Entry into Wellington Street south at High Street. Appendix B of this Report provides a concept plan of this option.



Figure 6. Concept of the No Entry into Wellington Street south at High Street

Through traffic proceeding along Wellington Street south with a destination in Wellington Street south, north of the No Entry restriction, must turn left at the Wellington Street south and High Street intersection, right at the High Street Marlborough Street intersection then right into Wellington Street south at the Marlborough Street and Wellington Street intersection. This option would not alter the current configuration of the Wellington Street and Marlborough Street intersection. Also, through traffic proceeding south along Wellington Street south would be unaffected.

Photograph 7 is an image of the High Street and Wellington Street intersection. This option will prohibit left turn movements from High Street into Wellington Street south. All traffic will turn right into Wellington Street south. Both passive signage and active control measures such as traffic island restricting the left turns from High Street into Wellington Street south and through north bound traffic on Wellington Street south would enable this option.



Photograph 7. High Street and Wellington Street intersection



Photograph 8 is an image of High Street. This option would in effect direct onto the left lane of High Street shown in Photograph 8, all traffic, including heavy vehicles, that currently move north along Wellington Street south between High Street and the Wellington Street and Marlborough Street intersection.



Photograph 8, High Street

A consequence of this option is that the left lane of High Street, as shown on the left side of Photograph 8, would receive accelerated pavement and bituminous seal degradation due to expected increase in heavy vehicles.

Photograph 9 is an image showing the High Street and Marlborough Street intersection.



Photograph 9. High Street and Marlborough Street intersection

This option may result in a larger traffic volume, including heavy vehicles turning right from High Street into Marlborough Street. This analysis examined the vehicle turning templates to ensure that the heavy vehicles such as rigid trucks, can safely move through the intersections.

During the traffic analysis JMG approached selected business operators on Wellington Street south. The business operator at Tas Mulch had the following comments regarding this option:

- Business operator would be amenable to this option.
- Tas Mulch indicated that this option could receive considerable resistance from other business owners with accesses along Wellington Street south.



The business operator at Longford Mower and Chainsaw Centre had the following comments regarding this option:

 Vehemently opposed to any option that would reduce the number of traffic movement past the business as passing trade generates a large part of his business.

The business operator at Sticky Beaks Café had the following comments regarding this option:

 Prefers the option to prohibit right turns at the Marlborough Street and Wellington Street intersection.

4.3 Barrier protecting Sticky Beaks Café building

This option will not remove the risk of vehicle collisions. Appendix C of this Report provides a concept plan of this option. This option would reduce the impact of an errant vehicle, following a collision, mounting the footpath and colliding with the Sticky Beaks Café building. As detailed previously, the critical vehicle movements that could result in errant vehicles colliding the building front include vehicle movements; from Wellington Street south turning left into Marlborough Street, from Marlborough Street turning right into Wellington Street south and from Wellington Street south turning right into Wellington Street north.

Photograph 10 shows the Sticky Beaks Café and the intersection from the perspective of a motor vehicle travelling south along Wellington Street north and turning left into Wellington Street south. A traffic island on the centerline of Wellington Street south also acts as a refuge for pedestrians crossing Wellington Street. The red arrows in Photograph 10 show the approximate path of an errant vehicle that impacted the cafe building causing significant damage.



Photograph 10. Sticky Beaks Café and the intersection

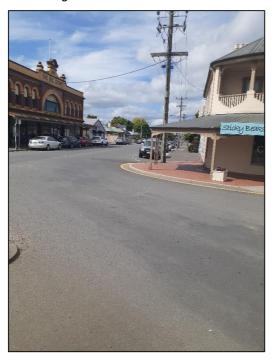
Photograph 11 shows the intersection from the landscaped area outside the Queens Arms Hotel. This option would involve placing a suitable barrier between the Sticky Beaks Café building awning supports and the roadway. Photograph 10 indicates that vehicles travelling south along Wellington Street north could collide with propped turning vehicles resulting in the through vehicle deviating its path and colliding with the building. The impact area and the point of need should be between the existing pedestrian crossing outside the Sticky Beaks Café and the tangent point of the curve along Marlborough Street.





Photograph 11. Intersection from the landscaped area outside the Queens Arms Hotel

Photograph 12 shows Wellington Street south from the traffic island. There appears to be adequate lane width in Wellington Street for heavy vehicles moving along Wellington Street to the south as well as maintain the turning movement from Wellington Street south to Marlborough Street.



Photograph 12. Wellington Street from the traffic island



Photograph 13 shows the intersection and Wellington Street north from the footpath at Sticky Beaks Café viewing to the north. The errant vehicle that collided with the Sticky Beaks Café building passed to the right of the building awning column in Photograph 13.



Photograph 13. Intersection from the footpath at Sticky Beaks Café

This option proposes a raised island that will accommodate a suitable vehicular barrier in front of the Sticky Beaks Café building awning supports. The suitable vehicular barrier would be a product capable of dissipating the kinetic energy generated by and errant light motor vehicle striking the barrier. The intent of the proposed barrier placement would be to protect the pedestrians and building including the awning columns.

During the traffic analysis JMG approached selected business operators on Wellington Street south. The business operator at Tas Mulch had the following comments regarding this option:

Business operator would be amenable to this option.

The business operator at Longford Mower and Chainsaw Centre had the following comments regarding this option:

• Business operator would be amenable to this option.

The business operator at Sticky Beaks Café had the following comments regarding this option:

- Business operator would be amenable to this option.
- Prefers the option to prohibit right turns at the Marlborough Street and Wellington Street intersection.



5. Additional Commentary

5.1 Movement of pedestrians at the Wellington Street and Marlborough Street intersection

During the assessment of the traffic options for the issue at the Wellington Street and Marlborough Street intersection, there appeared to be issues regarding the pedestrian crossing movements from the Sticky Beaks Café footpath. Photograph 14 shows the pedestrian crossing outside Sticky Beaks Café. Also shown is the access to the Queens Arms Hotel and the Tas Mulch landscape supplier.



Photograph 14. Pedestrian crossing outside Sticky Beaks Café

Photograph 15 show the sight distance from the pedestrian crossing outside Sticky Beaks Café back along Wellington Street south. The sight distance is restricted by a parked vehicle and the building wall.



Photograph 15. Sight distance from the pedestrian crossing along Wellington Street



Photograph 16 shows the improved sight distance outside Sticky Beaks Café back along Wellington Street south. The sight distance remains restricted by a parked vehicle.



Photograph 16. Improved sight distance from the pedestrian crossing

The solution to resolve the traffic management issue at the Wellington Street and Marlborough Street intersection proposes to also improve the pedestrian safety by any of the following:

- Providing an extended raised island to project a pedestrian further into the intersection to increase the sight distance south on Wellington Street south.
- Restricting traffic movements.

5.2 Raised Safety Platforms

The Vic Roads Road Design Note RDN 03-07 Raised Safety Platforms dated December 2019, claims that Raised Safety Platforms are a speed management treatments capable of reducing the maximum comfortable operating speed for a vehicle, thus lowering the overall speed of vehicles to a Safe System collision speed (i.e. should a collision occur, impact forces are within human tolerances). Figure 7 is a plan of a raised safety platform.

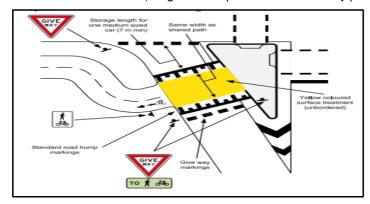


Figure 7. Raised safety platform from VicRoads



For this device to be effective, it should be placed on Wellington Street north to reduce the vehicle speed resulting in lower speed collisions. A lower speed collision would result in a reduction in the incidence of an errant vehicle colliding with the Sticky Beaks Café building.

This device will not be discussed further as it will involve discussions between Northern Midlands Council and the Department of State Growth.

6. Option Analysis

6.1 No Right Turn out of Wellington St at Marlborough Street

Advantages

- Reduction in the traffic using the Wellington Street and Marlborough Street intersection.
- Based on the three vehicle conflicts, Marlborough Street turning right into Wellington Street south, Wellington Street south turning left into Marlborough Street, Wellington Street south turning right into Wellington Street north, this option eliminates conflicts for the Wellington Street South turning right into Wellington Street north movement.

Disadvantages

- Based on the three possible vehicle conflicts, two conflicts remain as Marlborough Street turning right into Wellington Street south and Wellington Street south turning left into Marlborough Street.
- Reduction in the traffic passing businesses in Wellington Street south with the perceived loss of trade.
- Sub arterial traffic moved to and impacting on local residential streets.
- No reduction in the impact of vehicle collisions on building components such as the awning columns.

Planning Estimate of Cost

- Project estimate \$26,000.
- Remove existing traffic islands.
- New traffic islands.
- Traffic signage.
- Linemarking.
- Setout and traffic management.
- Design and procurement.
- Supervision.

6.2 No North bound Entrance into Wellington Street at High Street

Advantages

- Reduction in the traffic using the Wellington Street and Marlborough Street intersection.
- Based on the three possible vehicle conflicts, Marlborough Street turning right into Wellington Street south, Wellington Street south turning left into Marlborough Street, Wellington Street South turning right into Wellington Street north, this option reduces but does not prohibit all conflicts.



Disadvantages

- Reduction in the traffic passing businesses in Wellington Street south with the perceived loss of trade.
- Increased traffic turning movements at the Wellington Street and High Street intersection.
- Increased traffic turning movements at the High Street and Marlborough Street intersection.
- Sub arterial traffic moved to and impacting on local residential streets.

Planning Estimate of Cost

- Project estimate \$42,000.
- New traffic islands.
- Traffic signage.
- Linemarking.
- Setout and traffic management.
- Design and procurement.
- Supervision.

6.3 Barrier Protecting Sticky Beaks Café Building

Advantages

- Reduction in the impact of vehicle collisions on building components such as the awning columns at the Sticky Beaks Café creating a safer environment for pedestrians.
- Provision of a safer pedestrian crossing from the Sticky Beaks Café footpath due to projected raised traffic islands allowing greater pedestrian sight distance down Wellington Street south.

Disadvantages

- This option addresses the effect and impact of traffic accidents and not the cause of the traffic accidents.
- Based on the three vehicle conflicts, Marlborough Street turning right into Wellington Street south, Wellington Street south turning left into Marlborough Street, Wellington Street South turning right into Wellington Street north, this option has no reduction on the vehicle conflicts.

Planning Estimate of Cost

- Project estimate \$29,000.
- Traffic barrier.
- New traffic islands including traffic barrier foundation
- Concrete kerb.
- Linemarking.
- Setout and traffic management.
- Design and procurement.
- Supervision.

7. Conclusions

The least expensive option is prohibiting right turns from Wellington Street south into Wellington Street north. This option will reduce one of the three vehicle conflicts as vehicle turning right from Wellington Street south into Wellington Street north. The possibility of two vehicle conflicts will remain. This option does not address the impact of vehicle collisions on building components such as the awning columns at the Sticky Beaks Café. This option will



Traffic Study - Wellington / Marlborough St, Longford - October 2020

increase the sub arterial traffic moving to and impacting on the local residential streets. This option will also reduce the traffic passing businesses in Wellington Street south with the perceived loss of trade.

The most expensive option is prohibiting north bound access into Wellington Street south at High Street. This option does not address the impact of vehicle collisions on building components such as the awning columns at the Sticky Beaks Café. This option will increase sub arterial traffic moving to and impacting on local residential streets. This option will also significantly reduce the traffic passing businesses in Wellington Street south with the perceived loss of trade.

For approximately \$3,000 more than the least expensive option, the Northern Midlands Council could provide a traffic barrier protecting Sticky Beaks Café building. This option will not reduce any of the three vehicle conflicts. This option will address the impact of vehicle collisions on building components such as the awning columns at the Sticky Beaks Café creating a safer environment for pedestrians. This option will not increase sub arterial traffic moving to and impacting on local residential streets. This option will not reduce the traffic passing businesses in Wellington Street south with the perceived loss of trade. This option will create a safer pedestrian crossing from the Sticky Beaks Café footpath due to extended raised traffic islands allowing greater pedestrian sight distance down Wellington Street south.

Whilst not treating the cause of the intersection accidents, the proposed traffic barrier protecting Sticky Beaks Café building provides significant safety improvements including pedestrians. The accidents at the intersection have been in a low speed environment with minimal personal injury. However, the risk to pedestrians and building infrastructure is much higher.

JMG recommends progressing the option proposing the traffic barrier protecting Sticky Beaks Café building.

JMG can assist in developing this option into a designed product as well as targeted stakeholder management to attain positive outcomes for Northern Midlands Council, road users and the affected stakeholders.

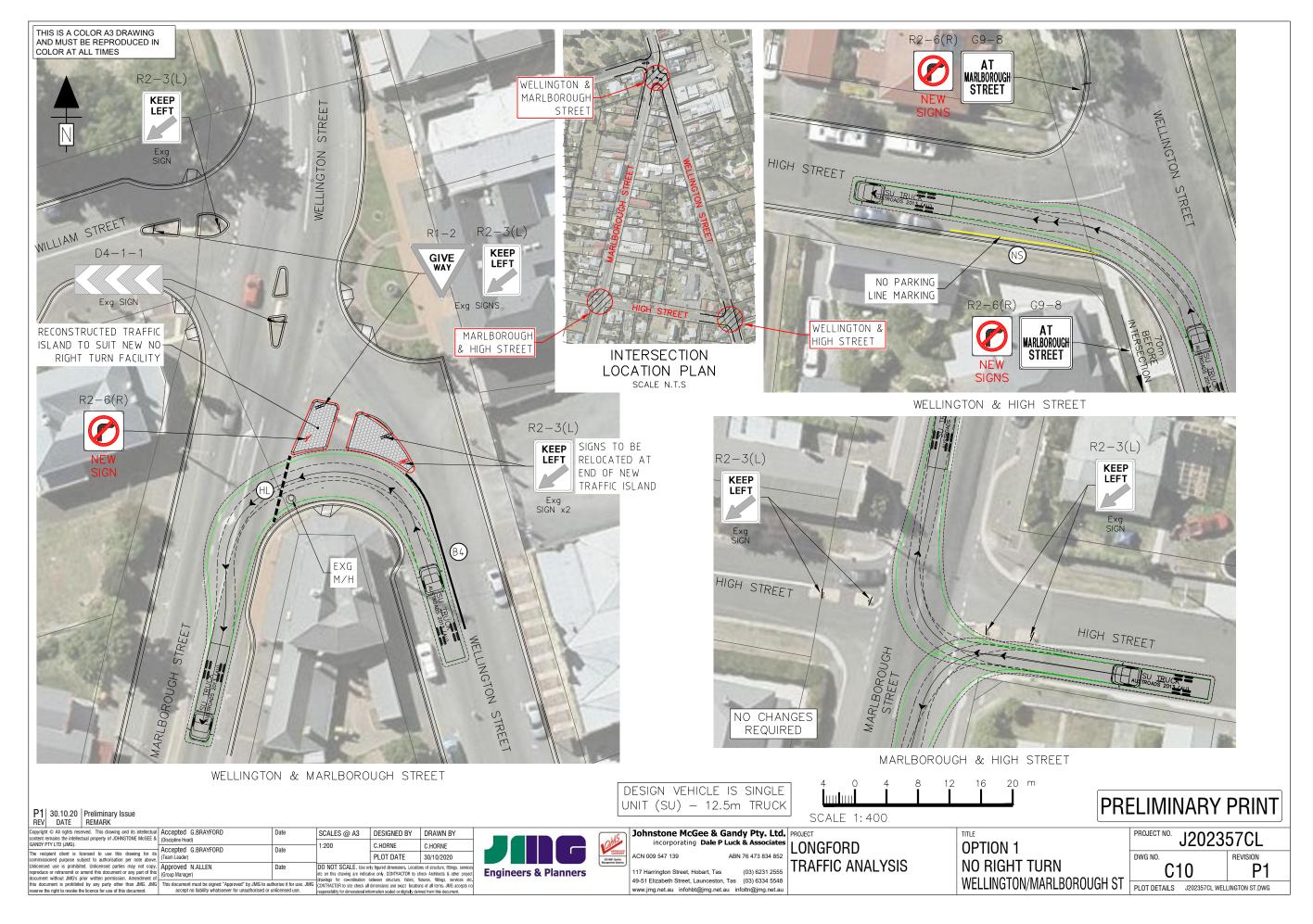


APPENDIX A

Option 1:

No Right Turn out of Wellington St at Marlborough Street



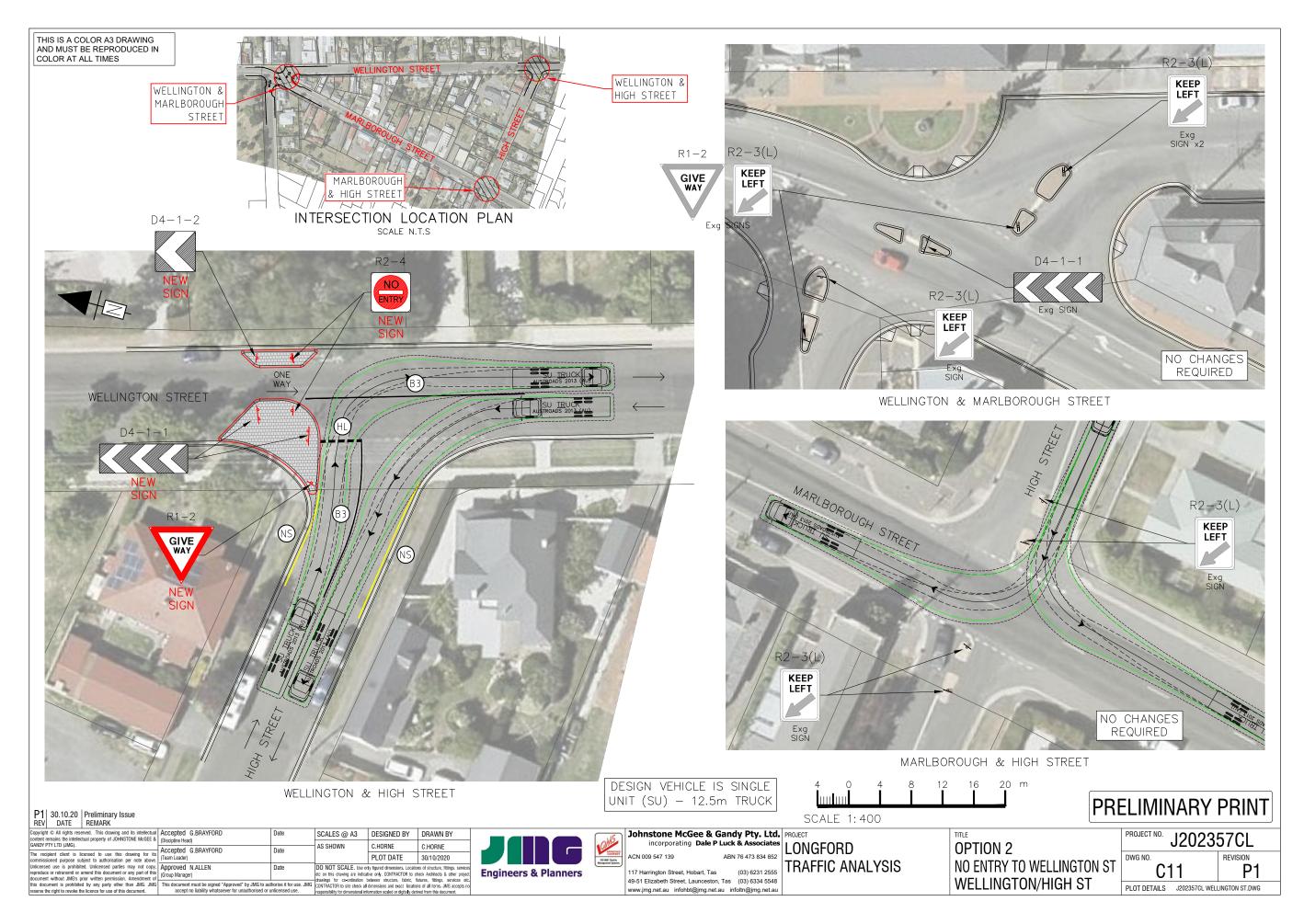


APPENDIX B

Option 2:

No North bound Entrance into Wellington Street at High Street



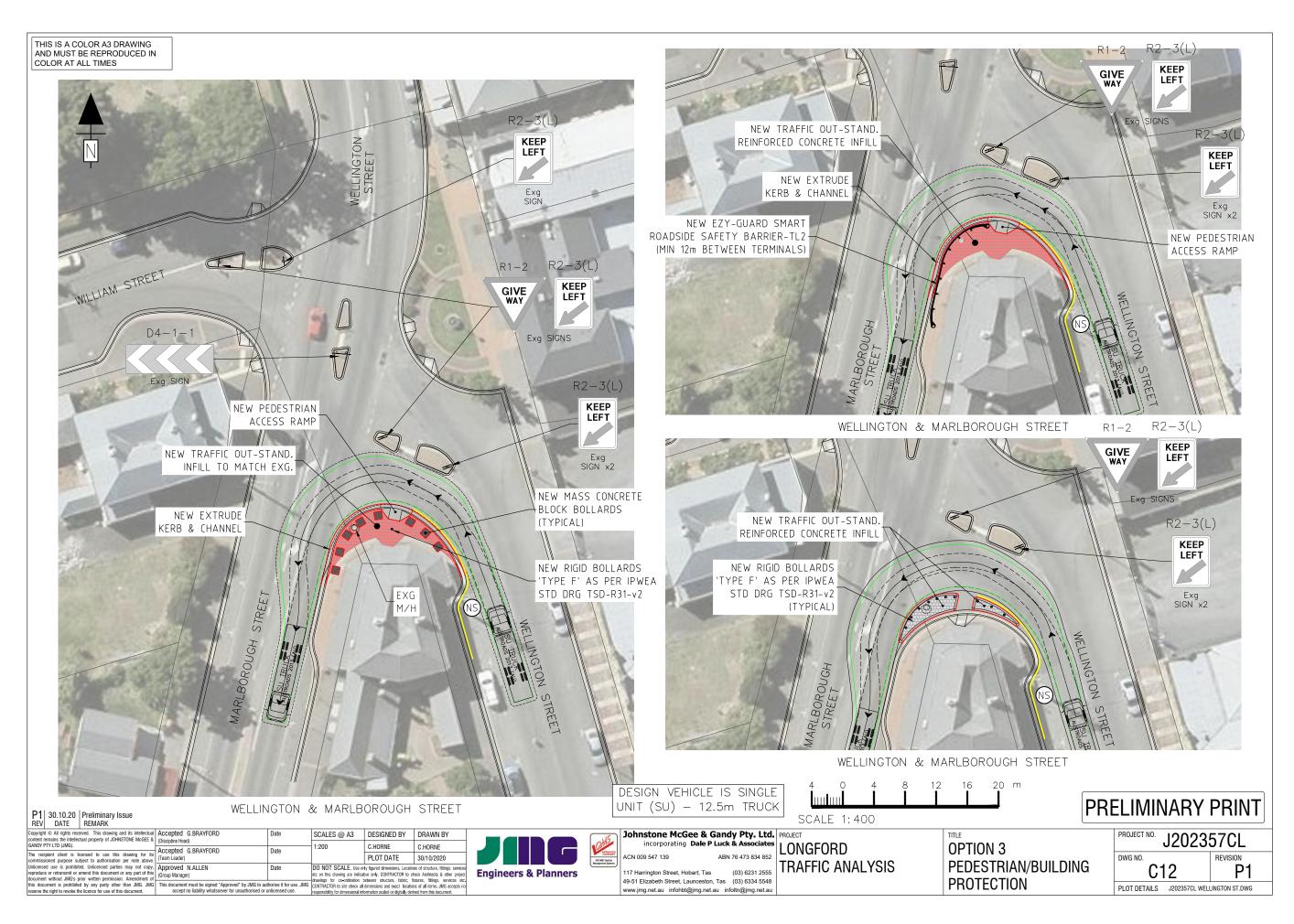


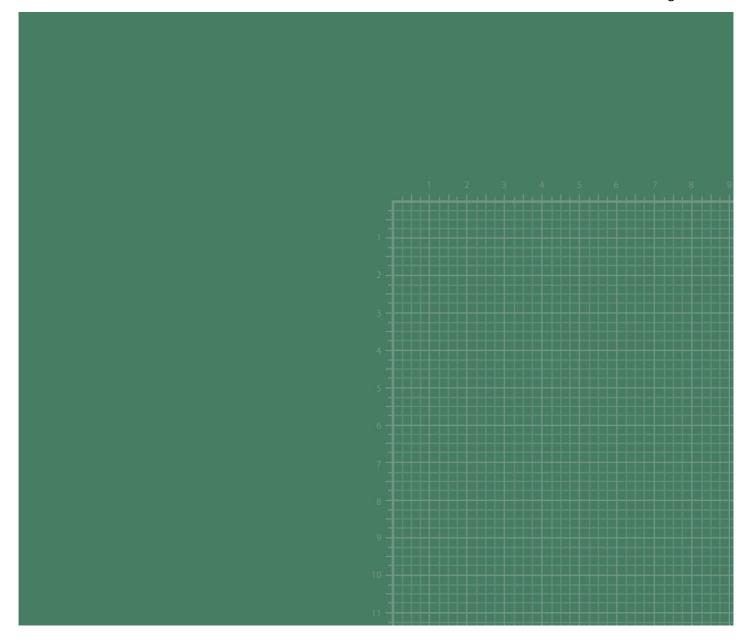
APPENDIX C

Option 3:

Barrier Protecting Sticky Beaks Café Building







Johnstone McGee & Gandy Pty Ltd

ARN 76 473 834 852 ACN 009 547 139

www.jmg.net.au

HOBART OFFICE

LAUNCESTON OFFICE 117 Harrington Street 49-51 Elizabeth Street Hobart TAS 7000 Launceston TAS 7250 Phone (03) 6231 2555 phone (03) 6334 5548 infohbt@jmg.net.au infoltn@jmg.net.au



ID2 VCRN UNIT TYP	E DESCRIPTION	CRASH DATE CRASH T	IME REPORT DAT SEVERITY	VISITE	SURFACE TY	LIGHT COND	CENTRE LIN	SPEED ZONE	LOCATION D	DATE 2
215104 14000783 LV	171 - Left off carriageway into object or parked vehicle	07-FEB-2014 23:00	2/12/2014 Property Damage Only	Yes	Sealed	Darkness (with street light)	Single broken	050	Marlborough Street, Longford, Northern Midlands	2/7/2014
425927 14005356 LV; LV	113 - Right near	27-OCT-2014 16:10	10/27/2014 Minor	Yes	Sealed	Daylight	Single Continuous	050	Intersection of Marlborough Street and Wellington Street and William Street, Longford, Northern Midlands	10/27/2014
434424 14005533 LV; LV	113 - Right near	07-NOV-2014 12:10	11/7/2014 Property Damage Only	Yes	Sealed	Daylight	Single broken	050	Intersection of Marlborough Street and Wellington Street and William Street, Longford, Northern Midlands	11/7/2014
1302369 16000186 LV; LV	110 - Cross traffic	11-JAN-2016 16:00	1/13/2016 Minor	Yes	Sealed	Daylight	Other	050	Intersection of Marlborough Street and Wellington Street, Longford, Northern Midlands	1/11/2016
1909697 16004841 MC	184 - Out of control on carriageway	24-JUL-2016 09:45	9/23/2016 Minor	No	Sealed	Daylight	Single Continuous	050	Intersection of Marlborough Street and Wellington Street, Longford, Northern Midlands	7/24/2016
1919882 16005091 LV; LV	113 - Right near	06-OCT-2016 08:45	10/6/2016 Minor	Yes	Sealed	Daylight	Single broken	050	Intersection of Marlborough Street and Wellington Street, Longford, Northern Midlands	10/6/2016
49382698 18003731 LV	181 - Off right bend into object/parked vehicle	04-JUL-2018 07:30	7/4/2018 Property Damage Only	Yes	Sealed	Daylight	Single Continuous	050	Intersection of Marlborough Street and Wellington Street, Longford, Northern Midlands	7/4/2018
49678658 18006456 LV; LV	110 - Cross traffic	22-NOV-2018 17:20	11/23/2018 Property Damage Only	No	Sealed	Daylight	Single Continuous	050	Intersection of Marlborough Street and Wellington Street, Longford, Northern Midlands	11/22/2018
49717168 18006743 LV; LV	113 - Right near	07-DEC-2018 14:47	12/7/2018 Minor	Yes	Sealed	Daylight	Single broken	050	Intersection of Marlborough Street and Wellington Street, Longford, Northern Midlands	12/7/2018
50253119 19005410 LV; HV	110 - Cross traffic	17-SEP-2019 13:47	9/17/2019 Minor	Yes	Sealed	Daylight	Other	050	Intersection of Marlborough Street and Wellington Street, Longford, Northern Midlands	9/17/2019
50358156 19006762 LV; LV	110 - Cross traffic	21-NOV-2019 18:30	11/22/2019 First Aid	Yes	Sealed	Daylight	Single Continuous	050	Intersection of Marlborough Street and Wellington Street, Longford, Northern Midlands	11/21/2019
50390196 19007126 LV; LV	110 - Cross traffic	09-DEC-2019 07:10	12/9/2019 Property Damage Only	Yes	Sealed	Daylight	Single Continuous	050	Intersection of Marlborough Street and Wellington Street, Longford, Northern Midlands	12/9/2019
50949643 21000408 LV	179 - Other straight	22-JAN-2021 07:05	1/22/2021 Minor	Yes	Sealed	Daylight	Single broken	060	Marlborough Street, Longford, Northern Midlands	1/22/2021
50956366 21000625 LV; LV	110 - Cross traffic	31-JAN-2021 11:38	1/31/2021 First Aid	Yes	Sealed	Daylight	Other	050	Intersection of Marlborough Street and Wellington Street, Longford, Northern Midlands	1/31/2021
51323014 21004779 LV	173 - Right off carriageway into object or parked vehicle	23-JUL-2021 11:50	7/24/2021 Property Damage Only	Yes	Sealed	Daylight	Single broken	050	Marlborough Street, Longford, Northern Midlands	7/23/2021
51637711 22001796 LV; LV	110 - Cross traffic	01-APR-2022 09:15	4/1/2022 Minor	Yes	Sealed	Daylight	Single Continuous	050	Intersection of Marlborough Street and Wellington Street, Longford, Northern Midlands	4/1/2022
51725633 22004035 LV	-	16-JUL-2022 17:19	7/16/2022 Property Damage Only	Yes	Sealed	Dawn / Dusk	None	050	Intersection of Marlborough Street and Wellington Street and Wellington Street, Longford, Northern Midlands	7/16/2022

