

Motorcycle Route Safety Review

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Abstract

The Victorian “arrive alive!” *Motorcycle Safety Strategy* (2002-07) acknowledged the growth in motorcycling and aimed to reduced motorcycle crashes, and motorcycle rider and pillion passenger deaths and injuries.

Crash data analysis identified an issue with road safety for motorcyclists, with implications for infrastructure, within the RoadSafe Inner Melbourne Community Road Safety Council (RSIM CRSC) boundaries, which encompass the Cities of Melbourne, Port Phillip and Yarra.

In response, RSIM CRSC instigated a series of audits to address the infrastructure aspects of this problem. Rather than focus on intersection black spot issues, the audits sought to identify hazards that had the potential to cause motorcycle crashes for the ten routes with the highest rider and pillion serious injury incidents and deaths.

The routes audited encompassed significant lengths of arterial roads.

Funding was obtained through the Victorian “SafeRoads Make Motorcycling Safer” initiative, plus equivalent funding from the three municipal councils.

The project was managed by the RIMCRSC motorcycle safety sub-committee, which is convened by a community representative who is an experienced motorcyclist, with representation from the three involved Councils, VicRoads and Victoria Police.

The motorcycle route safety review was conducted by an experienced motorcyclist, on a motorcycle. The audit included video footage, photos, crash data, and identified key issues and hazards for motorcyclists. The audit recommended remedial treatments and changes to maintenance programs. Many of these treatments are now underway with funding from VicRoads or, where appropriate, the Cities of Melbourne, Port Phillip and Yarra

Keywords

Motorcycle, Safety, Audit, Review

Introduction

RoadSafe Inner Melbourne (RSIM) Community Road Safety Council (CRSC) encompasses the Cities of Melbourne, Port Phillip and Yarra. It is one of 24 CRSC that cover Victoria and

deliver programs to address road safety issues in their local area. Membership of RSIM CRSC comprises engineers from each of the three Councils and community engagement staff, police from Melbourne, Port Phillip and Yarra traffic management units, a VicRoads person, and community members volunteering their time and energy representing residents, local business or particular road safety stakeholders (such as motorcyclists).

The RSIM motorcycle safety subcommittee reviewed crash data along routes with the highest crash injury and fatality rates for motorcyclists, with a particular interest in routes that crossed between the boundaries of the Cities of Melbourne, Port Phillip and Yarra.

Crash data analysis identified that between September 2000 and August 2004 within these three Council areas there were:

- 17 rider fatal crashes
- 361 rider serious injury crashes
- 19 pillion serious injury crashes
- 10 -13 November 2009, Sydney, New South Wales

Rather than a focus only on “black spots” or intersections, the RSIM motorcycle safety subcommittee agreed that a motorcycle route safety review would be undertaken.

Funding for the review was sought from the “SafeRoads Make Motorcycling Safer” initiative. This was supplemented with contributions from the three Councils.

Methods

Crash data analysis and consultation with the three Councils identified the following routes to be included in the motorcycle safety review:

- Elizabeth Street (Bourke to Victoria Streets)
- Queensberry Street (Swanston to Curzon Streets)
- Victoria Street/Victoria Parade (Peel to Hoddle Streets)
- Swan Street (Hoddle to Burnley Streets)
- Johnston/Elgin Street (Yarra River – Swanston Street)
- Wellington Street (Victoria Parade to Johnston Street)
- Hoddle St/Punt Rd (Dandenong Rd to Eastern Freeway)
- St Kilda Rd/Brighton Road (Commercial Road to Glen Huntly Road)
- Dandenong Road (Westbury Street to Upton Road – westbound only)

- Montague Street (West Gate Fwy to Normanby Rd – southbound only)

Analysis of motorcycle casualty crash data for the agreed routes identified:

Jan 2000 to Dec 2004 – 244 casualty crashes

Type	No.	%
Vehicles – same direction	68	28
Vehicles opposing direction	62	25
Off path on straight	37	15
Vehicles adjacent direction	29	12
Manoeuvring	23	9
Pedestrian	13	5
On path	6	3
Off path on curve	3	1
Overtaking	2	.8
Passenger and miscellaneous	1	.4

The audit for each route was undertaken by an experienced motorcyclist, on a motorcycle. The auditor rode each route in each lane. The audits were undertaken between 10 am and 2 pm on various days. The audits included video footage and at a later stage, photos of hazards and issues.

Results

The Motorcycle Route Safety Review [1] identified the main hazards as:

- No lane delineation
- Poor / uneven pavement on road surfaces
- Crack sealing along centre of lanes
- Two lanes merging into one over a short distance and without sufficient warning
- Sunken pit lids in lanes
- Slippery pit lids in lanes
- Oil build up on road surfaces on the approach to signalised intersections
- Faded line marking

Recommendations included :

- Right turn issues – implementing fully controlled right turns at signalised intersections/closing medians
- Elimination or better management of pit lids – cooperation with other authorities and understanding of responsibilities – new products need to be identified
- Oil – cleaning protocols and re-sheeting, car and truck vehicle maintenance improvement
- Rider visibility – education for riders and drivers

Conclusion

The RSIM CRSC Motorcycle Route Safety Review report was tabled with VicRoads, and the City of Melbourne, the City of Port Phillip and the City of Yarra. The Review was also tabled at the Victorian Motorcycle Advisory Council.

Most of the routes identified are declared roads, and are the responsibility of VicRoads to manage and to maintain.

The three Councils have accepted some of the recommendations from the review as they affect roads under their management. VicRoads have also accepted some of the recommendations, and many of these have been actioned and are completed, or are underway. Some recommendations were channelled through the Victorian Motorcycle Advisory Council, and have also been actioned. VicRoads is continuing to schedule actions in 2009/10.

Another project, RoadSafe Inner Melbourne Motorcycle Route Safety Audits – follow-up [2], is underway. This includes:

- A progress report of the works undertaken to date based on the recommendations in the original review
- A review of the motorcyclist fatalities and serious injuries to determine changes and trends with a starting point of the statistics used from the original review
- Identifying the next ten routes with the highest risk for motorcyclists within RSIM boundaries

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RoadSafe Inner Melbourne Community Road Safety Council which has actively supported the motorcycle safety subcommittee from its inception in 2000/01.

RSIM CRSC members involved in the Motorcycle Route Safety Review:

Colin Bates – City of Yarra

Sam Donato – City of Melbourne

Paul Smith – City of Port Phillip

Senior Sergeant Mick Downes, Victoria Police, Melbourne Traffic Management Unit

Sharon Wishart – VicRoads

Kerry McConnell – VicRoads

Maria Falzone - VicRoads

References

1. GTA Consultants, (April 2006) 'Motorcycle Route Safety Review', RoadSafe Inner Melbourne Community Road Safety Council (unpub)
2. TrafficWorks, (July 2009), Inner Melbourne Motorcycle Route Safety Audits – Follow Up (Updated),