

COMMITTEE ON LEGISLATIVE RESEARCH
OVERSIGHT DIVISION

FISCAL NOTE

L.R. No.: 1294-01
Bill No.: HB 588
Subject: Motor Vehicles; Law Enforcement Officers and Agencies
Type: Original
Date: February 6, 2017

Bill Summary: This proposal prohibits law enforcement from stopping a motorcycle for failing to wear protective headgear.

FISCAL SUMMARY

ESTIMATED NET EFFECT ON GENERAL REVENUE FUND			
FUND AFFECTED	FY 2018	FY 2019	FY 2020
Total Estimated Net Effect on General Revenue	\$0	\$0	\$0

ESTIMATED NET EFFECT ON OTHER STATE FUNDS			
FUND AFFECTED	FY 2018	FY 2019	FY 2020
Total Estimated Net Effect on <u>Other</u> State Funds	\$0	\$0	\$0

Numbers within parentheses: () indicate costs or losses.

This fiscal note contains 9 pages.

ESTIMATED NET EFFECT ON FEDERAL FUNDS			
FUND AFFECTED	FY 2018	FY 2019	FY 2020
Total Estimated Net Effect on <u>All</u> Federal Funds	\$0	\$0	\$0

ESTIMATED NET EFFECT ON FULL TIME EQUIVALENT (FTE)			
FUND AFFECTED	FY 2018	FY 2019	FY 2020
Total Estimated Net Effect on FTE	0	0	0

☐ Estimated Net Effect (expenditures or reduced revenues) expected to exceed \$100,000 in any of the three fiscal years after implementation of the act.

ESTIMATED NET EFFECT ON LOCAL FUNDS			
FUND AFFECTED	FY 2018	FY 2019	FY 2020
Local Government	(Unknown)	(Unknown)	(Unknown)

FISCAL ANALYSIS

ASSUMPTION

Officials from the **Department of Public Safety - Missouri Highway Patrol, Office of the State Courts Administrator, Department of Revenue, and the Department of Transportation** each assume the proposal would not fiscally impact their respective agencies.

In response to a similar proposal from 2016 (HB 1657), officials from the **Department of Health and Senior Services (DHSS)** stated changing the helmet law to no longer allow law enforcement to stop, inspect, or detain motorcycle or motortricycle operators or passengers based solely on their failure to wear approved protective headgear will result in an increased number of individuals not wearing approved protective headgear. This will also increase the number of adults incurring a traumatic brain injury (TBI), thus there will be an increase in participants requesting services through the Adult Brain Injury (ABI) Program.

Based on the most recently published motorcycle crash statistics by the Missouri State Highway Patrol, there were 1,701 motorcycle crashes that resulted in personal injuries in 2014. Of these 1,701 motorcycle crashes 26 percent of those crashes involve persons who were either not wearing a helmet, or not wearing an approved helmet. It is estimated that the number of individuals not wearing an approved helmet would at least double if they can no longer be stopped based on their failure to use a proper helmet, increasing the number of individuals injured in a motorcycle crash while not wearing approved headgear another 26 percent (442 individuals). Based on assessment of other states, if 50 percent of those individuals experience a traumatic brain injury (TBI), and 50 percent of those with a TBI are eligible for the ABI program, there would be an additional 111 new enrollments to the ABI Program per year ($442 \times .50 \times .50$).

The current average cost per participant to provide rehabilitation services through the ABI Program is \$4,236 per year. The total needed for rehabilitation services would be \$470,196 ($\$4,236 \times 111$ participants). The increase in participants would also require the ABI Program to add at least three additional service coordinators, based on the fact that currently there is an average of 40 participants per service coordinator caseload. Service coordinators provide case management for participants enrolled in the ABI program and are contracted through local public health agencies (LPHA) at a cost of \$61,800 per service coordinator. The total needed for the three additional service coordinators would be \$185,400 ($\$61,800 \times 3$ service coordinators).

Participation in the ABI Program is subject to available funding and without additional funding any potential new participants will be added to a waiting list for rehabilitation services. Currently, there are 89 Missourians on the ABI Program waitlist, with a wait time of over 253 days before rehabilitation services are started through the program. It is clear that additional

ASSUMPTION (continued)

program participants would result in the ABI Program requesting additional funding for the program. The total needed to cover the rehabilitation services and service coordination costs for the additional participants would be at least \$655,596 per year.

This proposal would also negatively impact the following programs that provide services to individuals with a traumatic brain injury meeting program eligibility: Children and Youth with Special Health Care Needs (CYSHCN), Healthy Children and Youth (HCY) and the Medically Fragile Adult Waiver (MFAW). CYSHCN is a state funded program serving individuals under age 21. Both HCY and MFAW are partially federally funded with state Medicaid match. HCY serves individuals under age 21 and MFAW serves those over age 21 who have continued need for HCY type services after age 21. Data is not currently available to DHSS regarding the number of motorcycle crashes involving persons under age 21 who were either not wearing a helmet or not wearing an approved helmet, nor is there any survey data on the usage of helmets for this age group when helmet laws are weakened as proposed in this legislation. Therefore, the negative fiscal impact to these programs is unknown.

Officials from the **Department of Mental Health (DMH)** state data from the Missouri State Highway Patrol, United States Census Bureau, Centers for Disease Control, and fiscal data from the Division of Developmental Disabilities (DD) were utilized to arrive at an estimated fiscal impact.

Crash Rates

The MO State Highway Patrol reports 1,683 personal injury motorcycle crashes in 2005, injuring 1,978 people. By 2012, those figures had risen to 2,065 and 2,404 respectively (MO State Highway Patrol, 2014). The State's eight-year average for motorcycle crashes between 2005 and 2012 is 1,854 and 2,165 for persons injured (Missouri State Highway Patrol, 2014). In 2011 and 2012, the number of crashes increased 9% over each preceding year.

Based on available data, projections indicate Missouri will have experienced an average of 2,148 motorcycle crash injuries per year between 2016 and 2020.

State Demographics

The United States Census Bureau estimates that in 2013 the percentage of persons aged 16 to 21 years old residing in Missouri comprised 8% of the total state population, or 494,057 persons out of 6,044,171 (US Census Bureau, 2014).

ASSUMPTION (continued)

Head Injury Rate of Occurrence

The federal Centers for Disease Control reports an annual incidence rate for head injury requiring hospitalization of 81.2 per 100,000 people aged 16 to 22 (Centers for Disease Control, 2014). Comparing this data to the census data previously discussed yields an estimate of 401 persons aged 16 to 22 per year in Missouri who will experience a head injury requiring hospitalization (persons aged 16 to 21 in MO / CDC unit of measurement x CDC incidence rate)

DD Community Placements & Cost Estimate

In 2015, the Division of DD admitted 24 individuals with head injuries.

DD estimates an average cost per day of \$334 (\$121,910/yr.) for community placement services. The state share of this cost in FY 2017 is \$44,829 ($\$121,910 \times 36.772\%$ state share = \$44,829).

Estimated Annual Fiscal Impact

Assuming a 15% rate of TBI incidence for motorcycle crashes each year between 2017 and 2021 for individuals aged 21 in Missouri, a total of 130 additional individuals or 26 people per year could become eligible for DD waiver services and DBH services.

Utilizing the Division of DD's cost estimates for FY 2016, this represents an increased annual cost to the DMH of \$1,165,554 of general revenue per year ($\$44,829 \times 26 = \$1,165,554$).

Officials from the **Department of Social Services (DSS) - MoHealthNet Division (MHD)** state this bill prohibits law enforcement agencies from stopping motorcyclists for failing to wear protective headgear.

DSS' Division of Legal Services state assume no impact and defer to MHD for fiscal impact.

MHD

There are two categories of individuals who would sustain severe traumatic brain injuries (TBI) and result in increased MO HealthNet expenditures.

1. Individuals who are privately insured at the time of the accident, but sustain severe TBI and are unable to meet the higher premiums charged by private health insurance plans or are forced to spend down resources and become eligible for Medicaid because of their disability.
2. Individuals who are Medicaid recipients at the time of the accident and sustain severe TBI.

ASSUMPTION (continued)

The Missouri State Highway Patrol reported 1,979 non-fatal injured persons resulting from motorcycle crashes in 2014. Because this legislation makes compliance with the motorcycle helmet law a secondary offense, children and adults could ride unhelmeted. Based on crash statistics from the National Highway Transportation and Safety Administration, 4.7% of helmeted motorcyclists involved in a crash suffered from severe TBI whereas 7.3% of unhelmeted motorcyclists suffered from severe TBI. Therefore, MHD assumes 93 persons sustained severe TBI injuries in 2014 as a result of motorcycle crashes while wearing helmets ($1,979 \times 4.7\%$). This number would increase to 144.5 individuals with severe TBI injuries if helmets were no longer required under state law ($1,979 \times 7.3\%$). Therefore, it is estimated that 51.5 individuals will sustain severe TBI as a result of this legislation ($144.5 - 93$).

1. MHD assumes that of these 51.5 individuals, 30% will ultimately spend down their resources and qualify for Medicaid, and will be classified as totally and permanently disabled (PTD). MHD assumes that some individuals would qualify more quickly than others. MHD assumes that of those individuals with new TBIs, 15% would qualify within the first year, 22.5% would qualify within the second year, and 30% would ultimately qualify within three years. Based on these assumptions, MHD assumes 7.7 new PTD in FY18, 19.3 in FY19, and 34.8 in FY20. Based on FY16 annual Medicaid expenditures for a recipient with PTD trended annually by a 4.1% inflationary factor, MHD estimates an annual first year cost of \$16,885.48 per person for a total first year cost of \$130,018 in FY18.
2. MHD further assumes that of the 51.5 individuals annually sustaining severe TBI as a result of this legislation, 13.99% (based on current Medicaid recipients ages 8-64 divided by the general Missouri population ages 8-64) will be Medicaid recipients at the time of the accident or 7.2 individuals. MHD assumed a minimum age of 8 as this was the highest minimum age to ride as a passenger for states that have motorcycle age restrictions. Based on a 2013 report issued by the Arkansas Spinal Cord Commission, the average acute care Medicaid costs for TBI was \$15,783 (average from 2007-2012). This initial cost was inflated by a three year average Hospital Market Basket Trend from SFY10 through SFY17. Therefore, the initial hospitalization cost is estimated to be \$19,563 per person in FY18 or \$140,853.60 ($\$19,563 \times 7.2$ individuals).

The one-time acute care costs are in addition to the annual cost to care for a person with TBI. The average cost for a custodial parent (based on FY16 expenditures) is \$5,558.74. MHD assumes annual expenditures will increase to the PTD level for an annual increase of \$10,022.86 per person sustaining a TBI as a result of this legislation. This amount is trended annually by

ASSUMPTION (continued)

4.1%. MHD estimates the annual costs for caring for an individual with TBI will be \$78,203.52 (\$10,861.60* 7.2 individuals each year). The total annual cost for individuals who are Medicaid recipients at the time of the accident is \$219,057 (\$140,853.60 + \$78,203.52).

This cost reflects expenditures incurred by the Division of MO HealthNet. Any Medicaid services incurred by the Department of Health and Senior Services (DHSS) and the Department of Mental Health (DMH) will be included in their responses.

MHD estimates the total impact as follows:

FY18: Total - \$349,075; GR - \$124,759; Federal - \$224,316
FY19: Total - \$647,381; GR - \$231,374; Federal - \$416,007
FY20: Total - \$1,040,941; GR - \$372,033; Federal - \$668,908

Each year, an additional 15.5 privately insured individuals would gradually become eligible for Medicaid as a result of a severe head injury sustained while riding a motorcycle without a helmet. 7.2 Medicaid recipients would sustain severe head injuries annually while riding a motorcycle without a helmet.

Oversight assumes, there may be an increase in injuries or the severity of injuries to motorcyclists choosing not wearing appropriate protective headgear which may **indirectly** result in increased costs to the state.

Officials from the **Springfield Police Department** assume the proposal would not fiscally impact their agency. In response to a similar proposal from 2016 (HB 1657), officials from the **Boone County Sheriff's Department**, the **Springfield Police Department**, and the **Columbia Police Department** each assumed the proposal would not fiscally impact their respective departments.

Officials from the **Department of Public Safety - Missouri Highway Patrol** stated they wrote 531 fail to wear protective headgear tickets in 2015.

Oversight does not have information regarding the number of such tickets written state-wide. Oversight assumes the removal of protective headgear as a primary offense will have some impact on the number of tickets written and therefore, the amount of fine revenue collected by local political subdivisions. Oversight assumes some portion of the tickets written would still have been written even if helmet offense was not a primary offense. With the several unknown variables, Oversight will assume an unknown loss of fine revenue to local political subdivisions.

<u>FISCAL IMPACT - State Government</u>	FY 2018 (10 Mo.)	FY 2019	FY 2020
	<u>\$0</u>	<u>\$0</u>	<u>\$0</u>

<u>FISCAL IMPACT - Local Government</u>	FY 2018 (10 Mo.)	FY 2019	FY 2020
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LOCAL POLITICAL SUBDIVISIONS

<u>Loss</u> - cities, counties, school districts - of fine revenue from fewer fail to wear protective headgear tickets issued	<u>(Unknown)</u>	<u>(Unknown)</u>	<u>(Unknown)</u>
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ESTIMATED NET EFFECT TO LOCAL POLITICAL SUBDIVISIONS	<u>(Unknown)</u>	<u>(Unknown)</u>	<u>(Unknown)</u>
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FISCAL IMPACT - Small Business

No direct fiscal impact to small businesses would be expected as a result of this proposal.

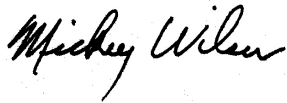
FISCAL DESCRIPTION

This bill makes it unlawful for a law enforcement agent to stop, inspect, or detain a motorcyclist to solely enforce the requirement that he or she be wearing a helmet.

This legislation is not federally mandated, would not duplicate any other program and would not require additional capital improvements or rental space.

SOURCES OF INFORMATION

Department of Public Safety
Office of the State Courts Administrator
Department of Revenue
Department of Transportation
Department of Health and Senior Services
Department of Mental Health
Department of Social Services
Springfield Police Department
Boone County Sheriff's Department
Springfield Police Department
Columbia Police Department



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