#### VOLUME 9. ISSUE 5 May 2008

# **Epi Monthly Report**

Motorcycle-Related Accidents Among Youths Aged 15-24 in Miami-Dade County, 2005

Anthoni Llau, MPH Miami-Dade County Health Department (MDCHD), Office of Epidemiology and Disease Control

## OBJECTIVE

To examine the factors leading to motorcycle accidents in Miami-Dade County among high school and college aged riders.

## BACKGROUND

The Miami-Dade County population is comprised of 2.4 million people, of which nearly 14% are between the ages of 15-24. During 2005-2006, this age group had the highest rates of motorcycle injury-related hospitalizations (36 per 100,000), emergency department (ED) visits (97 per 100,000) and deaths (7 per 100,000). In Miami-Dade County, 1,252 motorcycle crashes were reported to the Florida Department of Motor Vehicles in 2005. More than a quarter (29%) was among this age group.

## METHODS

Crash records from the Florida Department of Motor Vehicles were reviewed for all motorcycle and moped accidents involving Miami-Dade residents aged between 15 and 24 for 2005. SAS 9.1 was used to extract and analyze data. Descriptive analysis of motorcycle accidents included sex, race, day of week, time of day, licensure of rider, motorcycle ownership, crash location, and vehicle actions at the time of crash.

## RESULTS

There were 368 drivers aged 15-24 involved in motorcycle crashes in 2005. Of these, 72% were injured (Figure 1). Nearly all riders (95%) were male. Most crashes involved either Hispanics or Caucasians, which accounted for 43% and 39% of all accidents, respectively. A majority of victims (43%) were not licensed to ride a motorcycle. In addition, more than half (51%) of all riders were not the motorcycle's respective owners. The majority of crashes (41%) took place between the hours of 12:00 PM - 6:00 PM (Figure 2). Weekends accounted for approximately one third of all incidents within this age group with 34% of crashes occurring on either Saturday or Sunday (Figure 3). A quarter (26%) of motorcycle crashes did not involve another vehicle and 40% occurred while it was dark. Over a third of accidents (39%) occurred at an intersection, with 59% of those resulting from another vehicle turning and cutting in



Motorcycle-Related Accidents Among Youths Aged 15-24 in Miami-Dade County, 2005 Table 1-3

Selected Notifiable Disease Reports, Comparison with Historical data, April 2008

Avian Flu Watch

4

Monthly Report, Selected Reportable Diseases/ Conditions in Miami-Dade County, April 2008

5

Fermin Leguen MD, MPH Chief Physician, Miami-Dade County Health Department Director, Office of Epidemiology and Disease Control

8600 NW 17<sup>th</sup> Street Suite 200 Miami, Florida 33126

Tel: (305) 470-5660 Fax: (305) 470-5533 E-mail: Fermin\_Leguen@doh.state.fl.us



www.dadehealth.org

front of the rider. More than half (56%) of riders were not wearing a safety helmet at the time of the crash. Helmet use was directly related with age, with only 38% of younger victims (ages 15-19) wearing a helmet at the time of the crash as compared to 46% of older victims (ages 20-24). It was unknown whether the motorcyclist was speeding in 16% of crashes.

#### CONCLUSIONS

To reduce the number of accidents, greater efforts are needed to locate unlicensed motorcyclists. In addition, motorcycle education should focus on not only wearing a safety helmet, but also; increase awareness when riding at night, greater attentiveness when approaching an intersection, educating owners to prohibit others from riding their motorcycle, and proper execution of evasive action. Other strategies may include interventions targeting students when leaving school premises during lunch hours or immediately after classes since most accidents occurred between 12:00 PM and 6:00 PM.

Figure 1. Motorcycle-Related Crashes Among 15 - 24 Year Olds, by Injury Severity Miami-Dade County, 2005



Figure 2. Motorcycle-Related Crashes Among 15 - 24 Year Olds, by Time of Accident Miami-Dade County, 2005



Figure 3. Motorcycle-Related Crashes Among 15 - 24 Year Olds, by Day of Accident Miami-Dade County, 2005



## May is...

**American Stroke Month** Asthma and Allergy Awareness Month **Better Sleep Month Clean Air Month Hepatitis Awareness Month Healthy Vision Month** Lyme Disease Awareness Month Lupus Awareness Month **Mental Health Month Melanoma/Skin Cancer Detection and Prevention Multiple Chemical Sensitivity Month** National Arthritis Month National Celiac Disease Awareness Month Ultraviolet Awareness Month National Physical Fitness and Sports Month **National Neurofibromatosis Month** National Teen Pregnancy Prevention Month **Tuberous Sclerosis Awareness Month** National High Blood Pressure Education Month

It's National Physical Fitness and Sports Month so visit <u>www.fitness.gov</u>. It's the health, physical activity, fitness and sports information website of the President's Council on Physical Fitness and Sports. You can find out about the Council and its work, view publications, and link to the resources of other government agencies as well as to health and fitness organizations

"All parts of the body which have a function, if used in moderation and exercised in labors in which each is accustomed, become thereby healthy, welldeveloped and age more slowly, but if unused and left idle they become liable to disease, defective in growth, and age quickly."

Hippocrates, the Father of Medicine

#### TO REPORT ANY DISEASE AND FOR INFORMATION CALL: Office of Epidemiology and

Disease Control

Childhood Lead Poisoning Prevention Program	305-470-6877
Hepatitis	305-470-5536
Other diseases and outbreaks	305-470-5660
HIV/AIDS Program	305-470-6999
STD Program	305-325-3242
Tuberculosis Program	305-324-2470
Special Immunization Program	786-845-0550



THE PRESIDENT'S COUNCIL ON PHYSICAL FITNESS AND SPORTS



Volume 9. Issue 5 May 2008 Page 3

## AVIAN FLU WATCH Unless indicated, information is current as of April 30, 2008



• Since 2003, there have been 382 human cases of avian influenza (H5N1) confirmed by the World Health Organization (WHO). Of these, 241cases have died. This means there is a 63% (241/382) fatality rate.

• **14 Countries with confirmed human cases** include Cambodia, China, Djibouti, Indonesia, Thailand, Vietnam, Iraq, Azerbaijan, Egypt, Turkey, Nigeria, Pakistan, Myanmar, and Lao People's Democratic Republic .



• No human cases of avian influenza (H5N1) have been reported in the United States.

• H5N1 has been confirmed in *birds* in several other countries since 2003. H5N1 has been documented in birds in more than 30 countries in Europe & Eurasia, South Asia, Africa, East Asia and the Pacific, and the Near East. For a list of these countries, visit the World Organization for Animal Health Web Site at :

http://www.oie.int/downld/AVIAN%20INFLUENZA/A \_AI-Asia.htm.

• No restrictions on travel to affected countries have been imposed. Travelers should avoid contact with live poultry and monitor their health for ten days after returning from an affected country.

SOURCES: WHO, OIE, CDC

## PARTICIPATE IN INFLUENZA SENTINEL PROVIDER SURVEILLANCE

## The Miami-Dade County Health Department NEEDS Influenza Sentinel Providers!!

Sentinel providers are key to the success of the Florida Department of Health's Influenza Surveillance System. Data reported by sentinel providers gives a picture of the influenza virus and ILI activity in the U.S. and Florida which can be used to guide prevention and control activities, vaccine strain selection, and patient care.

- Providers of any specialty, in any type of practice, are eligible to be sentinel providers.
- Most providers report that it takes less than 30 minutes a week to compile and report data on the total number of patients seen and the number of patients seen with influenza-like illness.
- Sentinel providers can submit specimens from a subset of patients to the state laboratory for virus isolation free of charge.

For more information, please contact **Erin O'Connell** at 305-470-5660.

### About the Epi Monthly Report

The Epi Monthly Report is a publication of the Miami-Dade County Health Department, Office of Epidemiology and Disease Control, The publication serves a primary audience of physicians, nurses, and public health professionals. Articles published in the Epi Monthly Report may focus on quantitative research and analysis, program updates, field investigations, or provider education. For more information or to submit an article, contact Lizbeth Londoño at 305-470-6918.

> Volume 9. Issue 5 May 2008 Page 4

## Monthly Report Selected Reportable Diseases/Conditions in Miami-Dade County, April 2008

	2008	2008	2007	2006	2005	2004
Diseases/Conditions	this Month	Year to Date				
AIDS *Provisional	54	434	297	426	487	458
Campylobacteriosis	8	44	32	. 37	30	39
Ciguatera Poisoning	0	5	0	0	0	0
Cryptosporidiosis	1	7	9	5	11	2
Cyclosporosis	1	4	0	0	0	0
Dengue Fever	0	1	1	0	0	1
E. coli, O157:H7	0	2	1	0	0	1
E. coli, Non-O157	1	1	0	0	0	0
Encephalitis (except WNV)	0	1	0	0	0	1
Encephalitis, West Nile Virus	0	0	0	0	0	0
Giardiasis, Acute	21	68	60	61	49	92
Hepatitis A	2	12	11	12	18	6
Hepatitis B	1	3	5	8	17	16
HIV *Provisional	100	399	455	380	151	523
Influenza A (H5)	0	0	0	0	0	0
Influenza Isolates	0	0	0	0	0	0
Influenza Novel Strain	0	0	0	0	0	0
Influenza, Pediatric Death	0	0	0	0	0	0
Lead Poisoning	12	48	47	40	36	83
Legionnaire's Disease	0	3	1	0	1	1
Leptospirosis	0	0	0	0	0	0
Lyme disease	0	0	0	0	0	1
Malaria	0	1	0	4	0	5
Measles	0	0	0	0	0	0
Meningitis (except aseptic)	2	3	5	5	3	1
Meningococcal Disease	2	3	3	7	3	8
Mumps	0	1	1	0	0	0
Pertussis	7	7	11	3	1	2
Rubella	0	0	0	0	0	0
Rubella, Congenital	0	0	0	0	0	0
Salmonellosis	35	98	101	112	101	90
Shigellosis	7	15	39	31	88	70
Streptococcus pneumoniae, Drug Resistant	14	38	33	40	3	26
Tetanus	0	0	0	0	0	0
Toxoplasmosis	0	0	1	0	0	1
Tuberculosis *Provisional	13	56	50	75	58	72
Typhoid Fever	0	0	0	2	2	1
Vibrio cholera Type O1	0	0	0	0	0	0
Vibrio cholera Non-O1	0	0	0	0	0	0
Vibrio, Other	0	0	0	0	0	0
West Nile Fever	0	0	0	0	0	0

\* Data on AIDS are provisional at the county level and are subject to edit checks by state and federal agencies.

\*\* Data on tuberculosis are provisional at the county level.

Volume 9. Issue 5 May 2008 Page 5