

HEALTH CARE ADVISORY BOARD

Meeting Summary

June 13, 2016

MEMBERS PRESENT

Marlene Blum, Chairman
Rose Chu, Vice Chairman
Ann Zuvekas
Tim Yarboro, MD
Rosanne Rodillo
Dr. Michael Trahos, DO
Francine Jupiter
Deborah Leser
Ellyn Crawford
Dave West

STAFF

Sherryn Craig

MEMBERS NOT PRESENT

William Finerfrock, Vice Chairman

GUESTS

Dr. Gloria Addo-Ayensu, Health Department
Rosalyn Foroobar, Health Department (HD)
Dr. David Wilder, Health Department
Shawn Kiernan, Health Department
Maryann Panerelli, Fairfax County Public Schools (FCPS)
Jesse Ellis, Neighborhood and Community Services (NCS)

Call to Order

The meeting was called to order by Marlene Blum at 7:39 pm.

May 9, 2016 Meeting Summary

The meeting summary from May 9, 2016 was approved as corrected.

Election of HCAB Officers

Ann Zuvekas, chairman of the nominating committee, presented the slate of candidates: Marlene Blum, Chairman, Rose Chu, Vice-Chairman, and Bill Finerfrock, Vice-Chairman. No nominations were submitted from the floor. With nominations

closed, the slate of candidates was put to a vote. The nominees were approved unanimously.

Presentation on CDC Epi-Aid Report on Youth Suicide

Epi-Aid refers to CDC investigations of serious and urgent public health problems in response to formal requests for rapid assistance from states, federal agencies or international organizations and ministries of health from other countries. The goal of these investigations is to better understand what may be causing the problem and what prevention steps could be taken.

In Fairfax, there had been a cluster of youth suicides, including seven deaths over the course of three years in one high school. Although extensive resources had already been given to suicide prevention activities within FCPS and the County, the community was concerned about its effectiveness since suicides were continuing to occur.

The objective of the investigation was to identify factors contributing to the suicide risk as well as unmet needs that must be addressed by preventive efforts. A formal request was made on July 22, 2014 by Virginia Department of Health (VDH) on behalf of the Fairfax community. Data gathering was conducted between July and December 2014, and as part of that process, an Epi-Aid team, comprised of individuals from CDC and SAMSHA, visited Fairfax November 12-21, 2014.

By the time the team arrived, a total of 19 youth suicides had occurred in 2014 alone and there were other high schools of concern. So the focus was shifted to an examination of all schools. The Epi-Aid team conducted opening and exit briefings with key stakeholders from FCPS, HD, Community Services Board (CSB), NCS, community partners, and VDH.

The reason for examining fatal and non-fatal behaviors is because deaths by suicide account for only a fraction of the impact of suicide. For each death by suicide, there are many more hospitalizations, ED visits and events that involve no formal medical care.

Four quantitative data sources were used to determine the frequency of fatal and non-fatal suicidal behaviors among youth in the county.

- VVDRS – data system that compiles information on violent deaths from sources such as law enforcement, medical examiner, vital records. It allows for examination of circumstances (Intimate partner violence (IPV)/alcohol, etc.).

- VOCME – VVDRS data only through 2012 so data supplemented with OCME data – date of birth, demographics, precipitating risk factors (alcohol/drugs/mental illness).
 - ESSENSE – hospital based system used to monitor outbreaks.
 - EMS – dispatched suicide responses occurring between 1/1/10 – 9/30/14.

To explore risk factors, a number of data were used.

- Youth survey
- VSSCD – a component of the annual school audit. It assesses student/teacher perceptions on 1) disciplinary structure 2) student support 3) academic expectations 4) student engagement; and 5) prevalence of teasing and bullying.

Additional qualitative data were collected.

- Six focus groups with parents (n=71) and interviews with school principals and directors of student services were conducted. Schools were selected based on prevalence of suicide and self-reports of suicidal ideation (SI) from youth survey.
- Questions addressed: 1) Perceptions of youth suicide; 2) Perceptions of risk factors; 3) Perceptions of protective factors.
- (Eight principals; eight high school director of student services; two middle school director of student services)

CDC staff also scanned local and national media outlets to identify stories related to youth suicides in Fairfax because research has shown that certain types of news coverage can increase the likelihood of suicide in vulnerable individuals and the magnitude of the increase is associated with the amount, duration and prominence of coverage. Thirteen news stories were identified and evaluated based on established recommendations for reporting on suicide.

A mixed method approach was used in examining trends of fatal and non-fatal suicide behaviors and identifying risk and protective factors associated with these behaviors. The analysis ranged from compilations and simple descriptive analysis to logistic regression. School differences and unique risk factors were examined and reported where data were available. Due to low counts of some behaviors by school, an effort was made not to present in a way that could lead to the identification of any individual. When a numerator was less than 10, rates were not calculated.

Looking at data through 2012, Fairfax had a lower suicide rate for youth overall, as well as for the different age groups. At the time of the Epi-Aid, Fairfax had already requested and received the rates for the 10-19 age group since the school community was most concerned about suicide in the student population. The rates in the 10-19 year population were calculated with fewer than 20 cases.

The rates of suicide among the 10-19 age group fluctuated substantially across the years and ranged from 0.7 per 100,000 in 2007 to 6.9 in 2013, when it peaked. This spike also correlates with a significant increase in ED visits for youth suicidal behavior or ideation and suicide deaths. Over 1,700 ED visits were identified during 2010-2014.

There was also an increase in suicide deaths in the second quarter of 2013. Between September 2010 and November 2014, there were 85 deaths by suicide among youth 10-24 years. The two most common methods were hanging and gunshot wound. Of the 85 decedents, the majority were white (69%; n=59) and male (74%; n=63). Similar to national data on youth suicide, more males died by suicide, but more females are admitted to ED for suicidal ideation or behaviors.

The prevalence of alcohol or drugs at autopsy was examined over each year. While not statistically different, the percent of decedents who tested positive for alcohol or drugs fluctuated across years. In 2013, 59% of youth who died by suicide tested positive for alcohol or drugs at autopsy. Ninety-five percent of decedents for whom circumstance data were available had at least one precipitating circumstance identified.

The second objective of the Epi-Aid was to identify risk and protective factors associated with fatal and non-fatal suicidal behaviors among youth. A four-level social-ecological framework was used to better understand the magnitude of the problem, identify risk and protective factors and recommend potential prevention strategies. The four levels are: individual characteristics that influence behavior; interpersonal interactions; community influences; and social/cultural norms.

Multiple risk and protective factors across the social ecological model that may have contributed to thoughts of suicide and suicide attempts were identified from quantitative data (Youth Survey) as well as qualitative interviews with school staff and parents. Statistically significant risk factors associated with SI and self-reported non-fatal suicide behavior included feeling sad or hopeless and victimization from violence. Significant protective factors identified include: (1) resilient – solves problems and find solutions that make things better when things do not go well for me, (2) six or seven hours of sleep (compared to less than 6), (3) parent help available, and (4) feels safe at

school. Qualitative data from the interviews and focus groups suggested academic pressures and achievement were risk factors.

The 2013 Youth Survey data showed that when compared with state and national statistics, a higher percentage of Fairfax 10th and 12th graders reported feeling sad/hopeless or considering suicide. Data were examined for each specific school as well.

One of the things the Virginia Secondary School Climate Data assesses is students' expectations about pursuing post-secondary education and involvement in extracurricular activities. Across FCPS, most schools had higher percentages of students intending to get a four-year degree or higher compared to state and regional percentages. Percentages ranged from 73% to 99%. The number of extracurricular activities students reported being involved in ranged from six to eight. All schools in FCPS had slightly higher levels of agreement that school rules and discipline seemed fair compared to region/state; most schools were at or above region/state for academic expectations and student engagement. Schools were at or below region/state for prevalence of teasing and bullying.

In summary, a mixed method approach was used in examining trends of fatal/non-fatal suicide behaviors and identifying risk and protective factors associated with these behaviors among youth. There were 85 youth deaths by suicide and over 1,700 ED visits were identified. Youth who died by suicide or attempted suicide had multiple risk factors for suicide before an attempt was made. This finding contradicts a common myth that most suicides occur suddenly and without warning. Multiple risk factors were identified, including: mental health issues, substance use, and interpersonal problems such as previous victimization and experiences of violence

There was community concern about the need to 1) increase access to mental health resources, as well as decrease stigma associated with seeking these services, 2) address pressures related to academic achievement, and the role of mass media. Media coverage included many strategies that research has shown should be avoided, such as one story describing a suicide note, four stories showing photos/video of location or method of death, memorials, funerals, etc., four stories describing the suicide method, identifying the schools where the decedent attended, with one school referenced in all 13 news stories.

Together, these factors demonstrate that youth suicide is a public health problem with multiple levels of influence that requires a multilevel – state, county, community, school, family, and individual – response.

The CDC's 12 recommendations included both programmatic and surveillance actions. Full recommendations can be found on pages 52-56 of report. Most recommendations align with strategies in the Northern Virginia Suicide Prevention Plan and with initiatives being planned or already implemented by Fairfax County Government or FCPS.

- (1) Educate and assist parents on navigating mental health resources.
- (2) Work to improve care coordination among schools, primary care providers, and mental health providers.
- (3) Create and disseminate a protocol for responding to traumatic loss, with an emphasis on suicide.
- (4) Continue to develop partnerships with community organizations and agencies in different sectors.
- (5) Educate local media outlets on the Recommendations for Reporting on Suicide.
- (6) Continue to review and implement evidence-based primary prevention strategies.
- (7) Consider a health communication campaign to educate the community about risk factors associated with youth suicide and the availability of mental health resources.
- (8) Develop and implement an evaluation plan for all ongoing and future suicide prevention activities.
- (9) Continue to monitor trends in suicide-related behaviors among youth through local data sources.
- (10) Continue to assess the community's perceptions of youth suicide.
- (11) Add items to the Youth Survey to assess perceptions of academic pressure, extracurricular activities, and course load.
- (12) Consider social media monitoring (i.e., Chatter Grabber) as an active surveillance tool to identify discussion about suicide or suicide-related behaviors in real time.

FCPS is receiving funding through the Project Aware Virginia System of Care grant. Five high schools, one from each cluster, are included in the project. Students who are not acute (i.e., hospitalized), but still need mental health services, will receive up to eight

counseling sessions within five days of referral. Funding provides referrals/services for 350-400 students. FCPS is also working to strengthen its relationships with the Emergency Departments, Dominion Hospital, and Merrifield so that Return to Learn measures can be put in place for students re-entering the school setting.

FCPS has also seen an increase in the number of students calling and texting Crisis Link. Based on students' preferred modality, FCPS has had to make changes in staffing (i.e., paid vs. volunteer personnel).

Protocols are in place to address mental health needs in the county's Juvenile Detention Center (JDC), but generally speaking, the number of FCPS students placed in the JDC has declined.

Data show cultural and socioeconomic differences. Depressive feelings are higher among schools with a larger percentage of low income students. SI is 50% higher among Hispanic girls than the rest of the student population.

FCPS will work with students who self-identify as Lesbian Gay Bisexual Transgender (LGBT), but if they are younger than 18, FCPS must notify their parents. If abuse is suspected/anticipated, FCPS follows protocols with Child Protective Services (CPS).

Procedures for students with first-time drug offenses have changed. The option to return to their base school will be considered.

Jesse Ellis will share several resources with Sherryn Craig for distribution to the HCAB.

Zika Virus Presentation

Dr. David Wilder, Public Health Physician and the Zika Virus Incident Commander briefed the HCAB on what the Health Department is doing to prepare for the possibility of local transmission and ways to prevent the spread of the disease.

Dr. Wilder began his presentation with a history of the virus. In 1947, Zika was isolated from a monkey in Uganda (Zika forest). The first human case was reported in 1954; only 14 documented in Africa and SE Asia prior to 2007. In 2007, the first Zika outbreak was reported on Yap Island (Federated States of Micronesia). Antibody surveys for Zika on Yap Island estimated that 75% of the island's 7,000+ citizens were infected with Zika, but of those infected, only 18% (about 919 persons) suffered actual symptoms of illness. Investigators of the Yap Island outbreak were only able to observe and record Zika symptoms in 31 symptomatic patients that had laboratory confirmed infections.

In 2013-2014, another outbreak occurred in French Polynesia (>28,000 suspected cases) and spread to other Island groups including New Caledonia, the Cook Islands, Vanuatu, Fiji, the Solomon Islands, and Easter Island (Feb-Jun 2014). The first confirmed Zika case was documented in Brazil in May 2015. The first case of the virus was confirmed in December 2015 in Puerto Rico.

On January 26, 2016, the first imported case of the Zika virus was identified in Virginia. The World Health Organization (WHO) declared that Zika was a public health emergency of international concern on February 1, 2016. The Zika virus is confirmed in 38 countries and territories in the Americas. So far, no cases of local transmission from mosquitoes has occurred in the continental U.S.

Zika is generally a mild disease. In fact, only 1 out of 5 people infected experience symptoms, which usually develop a few days to a week after mosquito bite. The most common symptoms are fever, rash, joint pain and conjunctivitis. Severe disease requiring hospitalization is uncommon and death is rare. The illness usually lasts a few days to a week. The virus usually remains in the blood of an infected person for about a week but it can be found longer in some people.

Currently, there are no medications or vaccines to prevent or treat Zika infection. Complications include: microcephaly; other neurological complications (brain and eye abnormalities); pregnancy loss; Guillain-Barre Syndrome (GBS). GBS is a rare disorder in which a person's own immune system damages the nerve cells, causing muscle weakness and sometimes, paralysis. These symptoms can last a few weeks or several months. Although most people fully recover from GBS, some people have permanent damage and in rare cases, people have died.

The Zika virus is primarily transmitted through the bite of an infected *Aedes* mosquito. A mosquito is infected when it bites a person infected with Zika and then spreads the virus by biting other people.

There are no cases of local transmission from mosquitoes in the continental U.S., and those at greatest risk are people traveling to the affected areas. There is concern that with mosquito season, local mosquitoes could potentially spread the virus. Until now, public health has focused on imported cases to identify pregnant women at risk because of travel history or that of their infected sexual partner, but the Health Department is also working on preventing local mosquitoes from spreading the disease.

There are no reports of infants getting Zika virus through breastfeeding. Zika infection does not affect future pregnancies conceived after Zika virus leaves the body. A pregnancy registry has been implemented that will include serial ultrasound results during pregnancy; monitor infant development at two, six, and 12 months.

The guidance for pregnant and non-pregnant couples is pregnant couples should use a condom during intercourse or abstain during pregnancy. For non-pregnant couples, men diagnosed or symptomatic should use condoms or abstain for six months after symptoms began. Men who traveled, but are not symptomatic, should use condoms or abstain for eight weeks after their return. Men living in a Zika-affected area, but who are not symptomatic, should use condoms or abstain while Zika continues to affect the area. Women attempting conception after a Zika infection should wait eight weeks after symptoms, or if asymptomatic, wait eight weeks after last date of exposure.

There remains a strong possibility of virus transmission through blood transfusion.

The two *Aedes* mosquitoes that can transmit Zika are *A. aegypti* and *A. albopictus* – the same mosquitoes that transmit and spread yellow fever, dengue, and chikungunya viruses. The *A. aegypti* is also known as the “yellow fever mosquito” and almost exclusively prefers to bite people and lives indoors and outdoors near people. This mosquito is an efficient vector for Zika, but is not commonly found in Virginia.

The mosquito larvae develop in artificial containers: buckets, bird baths, tires, tarps, wheel barrows, kiddie pools, animal dishes, and corrugated downspout extensions. They are not strong fliers and are generally found close to their breeding sites (150-200 yard radius). They rest in vegetation where it’s shaded, cool, humid, and in other protected areas – underneath decks, siding, window wells, or sheds. They will feed on other animals.

While researchers continue to learn about Zika, public health is taking steps to help control its spread and keep residents safe. Fairfax is increasing its surveillance capacity and testing of mosquitoes to determine when Zika is present within the local mosquito population.

The most effective way to prevent the spread of Zika is to eliminate mosquito breeding sites and prevent mosquito bites. The Health Department is engaging its local public health partners (county & community) to integrate prevention, response and mitigation activities.

The Health Department has convened stakeholder meetings with its public and partner agencies and provides one-on-one follow up. Training has been prepared for Health Department staff and County staff. Public Service Announcements, press releases, and articles has been developed to increase education and outreach. The Health Department is encouraging individuals to share what they learn with neighbors, friends and coworkers.

With respect to source reduction efforts, the best way to prevent the spread of the virus is to eliminate containers with standing water. Mosquito larvae need just over a week to mature and become adult flying mosquitoes, so tipping and tossing each week will effectively disrupt the life-cycle. If there are containers that cannot be emptied, larvicides can be used.

Residual barrier sprays can be used for adult mosquito control where they are known to rest. The effects last about two-three, or until a significant rainfall.

Individuals are encouraged to wear long-sleeved shirts and long pants; loose fitting; light color and use EPA-registered insect repellents. Insect repellent is recommended for children and pregnant women. DEET (>2 mo.), Picaridin, oil of lemon eucalyptus (>3 yrs) or IR 3535 are some examples. Individuals should read and follow label instructions. Repellent should be reapplied as directed and should not be sprayed on the skin under clothing. If sunscreen is also being used, it should be applied before the insect repellent.

Additionally, clothing can be treated with permethrin or purchased with the repellent. This clothing remains protective after multiple washings, but specific product information will provide the best information. When treating items, individuals should follow the product instructions carefully. Permethrin products should NOT be used directly on skin. They are intended to treat clothing only.

Peak biting times should also be avoided. Individuals should stay and sleep in places with screened windows or air conditioning (A/C). A mosquito bed net can be used if A/C screened rooms are not available or if sleeping outdoors.

Infected persons should stay indoors and/or avoid bites during the first week of illness. Travelers to Zika-affected areas should try to avoid bites for three weeks after return.

Other Business

Mid-Year Budget Review with Inova. Sherryn Craig will be in touch with possible dates for the HCAB's mid-year budget review with Inova's senior staff.

There being no further business, the meeting adjourned at 9:36 pm.