# MATERNAL AND CHILD DEATH REVIEW PROGRAM

2018 ANNUAL SUMMIT





#### **AGENDA**

9:00 to 9:15 am Welcome & Introductions

9:15 to 9:30 am MCDR Program Updates

9:30 to 10:15 am MCDR Data Presentation

10:15 to 10:30 am Break

10:30 to 11:30 pm Group Table Discussion

11:30 to 12:15 pm Table Report Out

12:15 to 1:30 pm Lunch Provided

1:30 to 2:30 pm Group Table Discussion

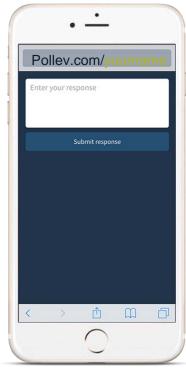
2:30 to 3:15 pm Table Report Out

3:15 to 3:30 pm Break

3:30 to 4:15 pm Moving Forward Activity

4:15 to 4:30 pm Closing Remarks

#### Responding with Poll Everywhere



Web voting



**Text voting** 



#### What's the word that best describes the agency you work for?

#### PRIOR ANNUAL MEETINGS

- 2015: 2-day review (nearly 100 deaths reviewed resulting in >20 recommendations)
- 2016: ½ day review, ½ day discussion (Focused on Drowning, SUID, Suicide, Maternal Opioid deaths)
- 2017: 1 day of partner agency presentations to reduce myths, barriers, and miscommunications between systems.



# us there a manner of death you would like prevention activities to be focused on (statewide/in your own practice)?

Preventable Infant death (0-1yrs)

Child Injury (1-18yrs)

Adolescent Suicide (13-17yrs)

Maternal

Other

# MCDR PROGRAM UPDATES

DANIELLA DELOZIER, MSPH

MCDR PROGRAM MANAGER

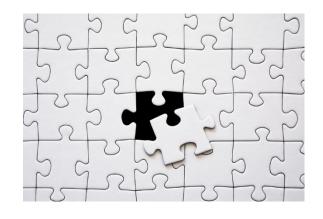
SOA, DHSS, DPH, WOMEN'S
CHILDREN'S & FAMILY HEALTH

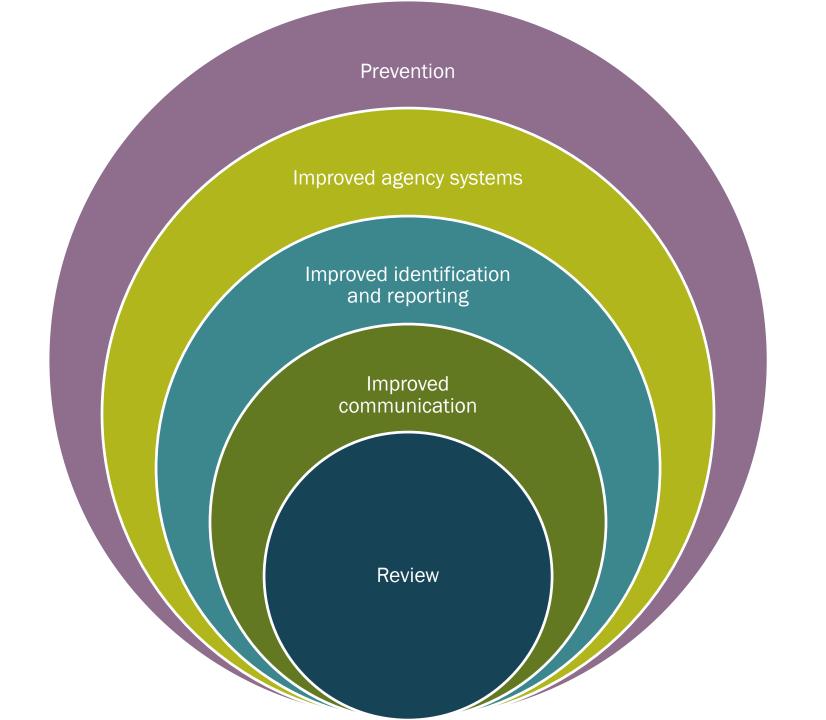
DANIELLA.DELOZIER@ALASKA.GOV

907.269.3446

#### WHAT IS MCDR?

MCDR is an engaged, multidisciplinary community, telling a child's story, one child at a time, to understand the causal pathway that leads to a child's death to identify pre-existing vulnerabilities and circumstances- in order to identify how to interrupt the pathway for other children.





# WHERE IS MCDR?

### Division of Public Health

Section of Women's, Children's, and Family

Maternal & Child Health Epidemiology Unit

Maternal and Child Death Review Program (MCDR) **State Medical Examiner** 

**Child Fatality Review Team (CFRT)** 

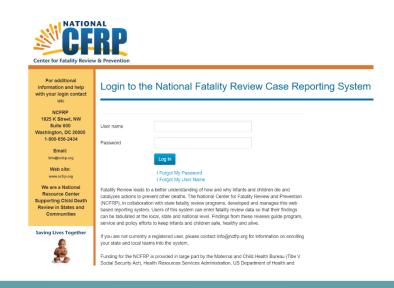




- Review all pregnancy-associated, infant, and child deaths that occur within the state of Alaska, or among Alaskan residents.
- o Identify which deaths are preventable.
- o Find points of possible intervention.
- Use this information to prevent similar deaths.

#### DATA COLLECTION PROCESS

- MCDR is notified of a death.
  - HAVRS file (once a month)
  - CFRT (once a month)
  - Medical Examiner's database (weekly)
- Records collected for each case
  - Law Enforcement, medical, OCS, DJJ, Social Media, etc.
- MCDR staff inputs data elements into the CRS and writes summary for each case.



#### MCDR PROGRAM

#### **UPDATES**

- Restructured program in May 2018
- Hired new Epidemiology
   Specialist in September
   2018
- Created MCDR Listserv
- Annual Maternal Death Review

#### **PLANS**

- Develop custom questions for Case Reporting System
- Start tracking case "strengths" at monthly reviews
- Increase data accessibility
- MCDR Task Force
- Strengthen prevention partnerships

#### MCDR NEEDS

- Rural and Tribal representation on committee
- Behavioral health/Psychiatric provider representation
- School & Behavioral Health Records
- MCDR Recommendation Task Force

**Task Force** 

Action

Monthly Rec's

Knowledge

Committee

Partnerships

**MCDR** 

Data

# MCDR DATA

### SECTION OF WOMEN'S, CHILDREN'S, AND FAMILY HEALTH, MCH-EPIDEMIOLOGY UNIT

JARED PARRISH, PHD- JARED.PARRISH@ALASKA.GOV

MARGARET YOUNG, MPH - MARGARET.YOUNG@ALASKA.GOV

#### What type of MCDR data is most useful to you?

Incidence Data

Predictive analysis

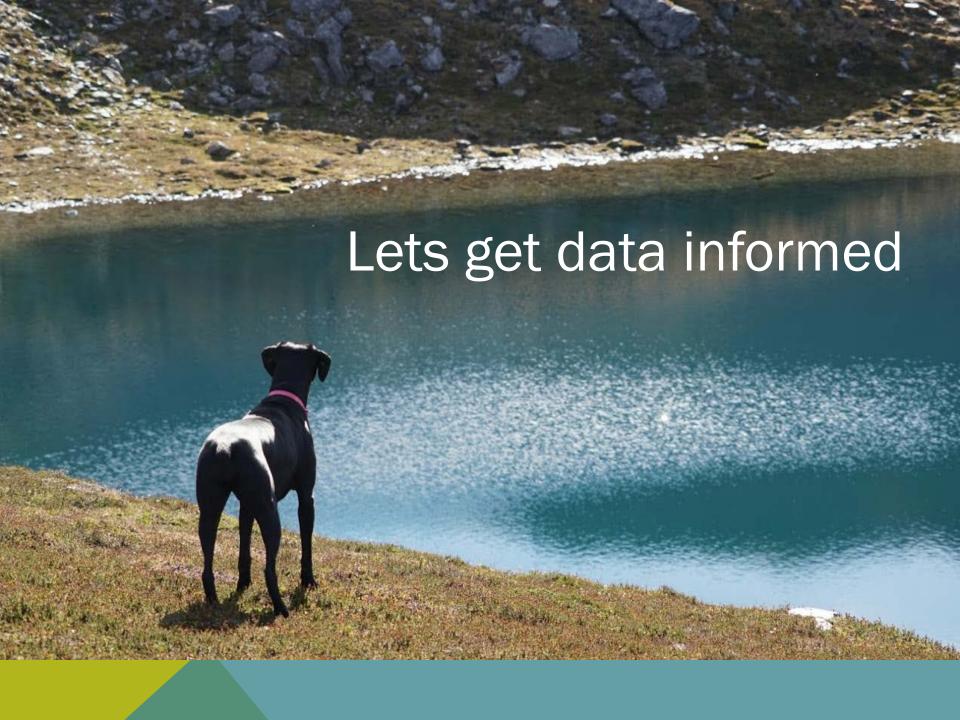
Descriptive Data

Cross-tabulated data

Localized Data

Statewide Data

Other



#### \*\*\*Disclaimer statement\*\*\*

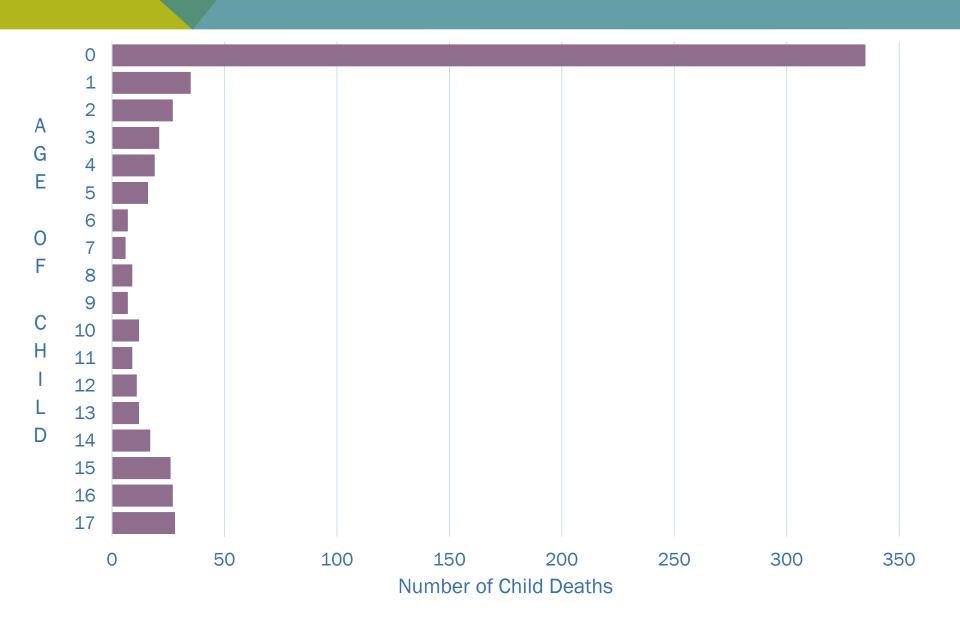
These data, unless otherwise indicated are not for public distribution but were extracted from the Case Reporting System (CRS) for initial provisional analysis to inform the annual MCDR meeting attendees. The information contained herein is subject to change without notice and caution should be used with interpretation until such data are verified.

The MCH-Epidemiology unit, MCDR program is working to develop a public report and increase accessibility to these data. Please contact the MCDR program for the status and availability of verified and finalized MCDR data from the CRS system.

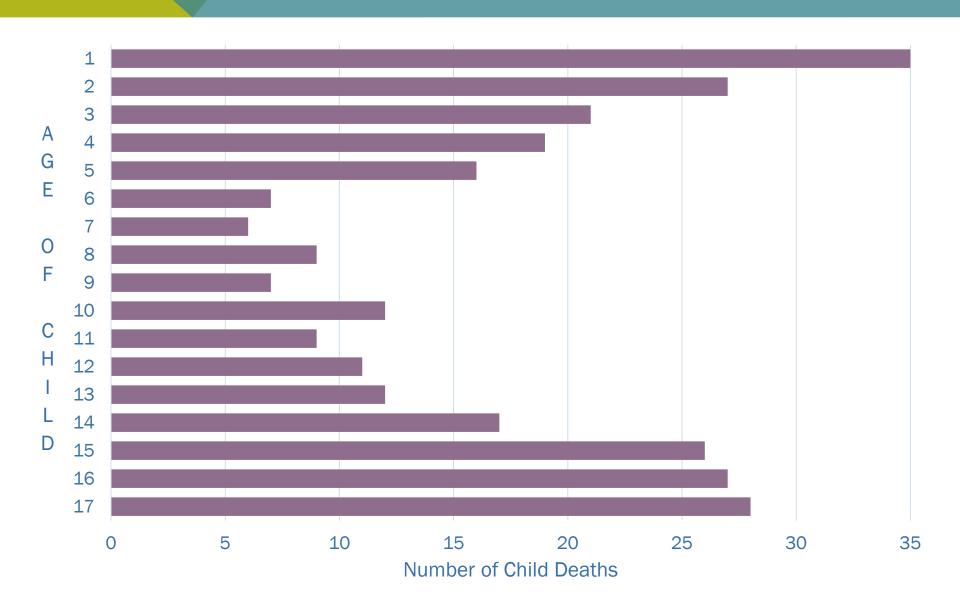
#### CHILD DEATHS IN ALASKA, 2007-2017



#### CHILD DEATHS IN ALASKA BY AGE, 2013-2017



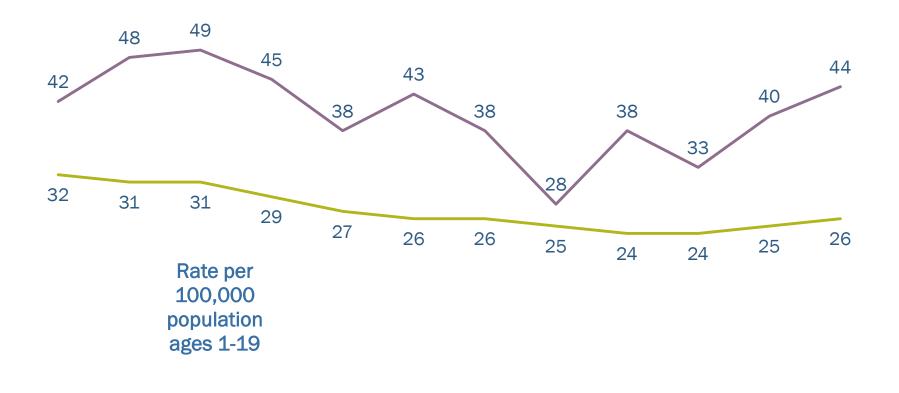
#### CHILD DEATHS IN ALASKA BY AGE, 2013-2017



## CHILD DEATH RATES IN ALASKA & U.S, 2005-2016 PUBLISHED ON KIDS COUNT DATA CENTER

DATA SOURCE: U.S. CENTERS OF DISEASE CONTROL AND PREVENTION (CDC) & NATIONAL CENTER FOR HEALTH STATISTICS (NCHS)

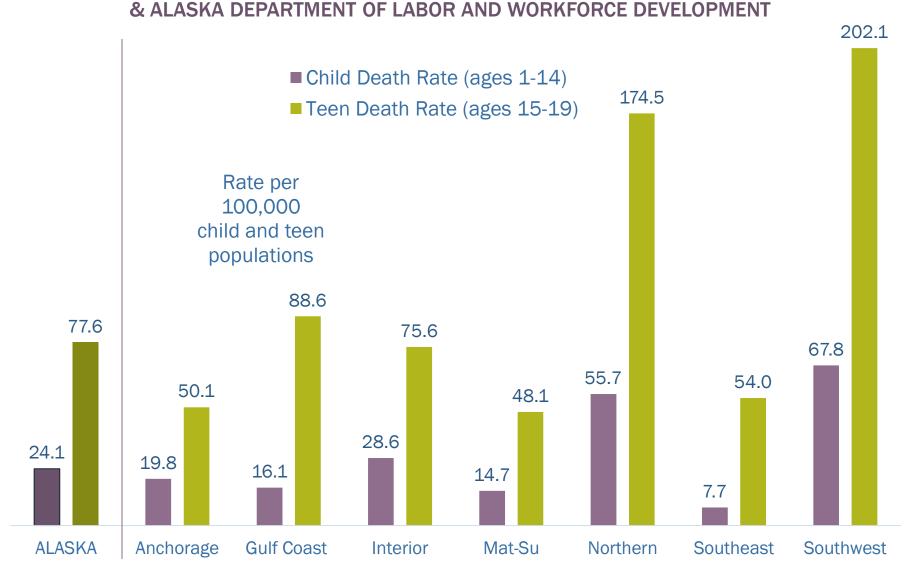
-ALASKA -U.S.



#### CHILD AND TEEN DEATH RATES IN ALASKA BY REGION, 2012-2016

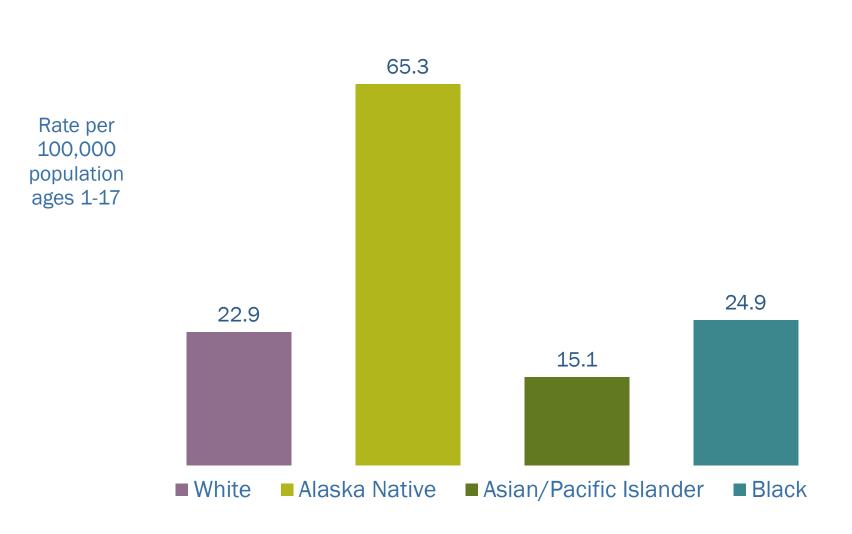
#### **PUBLISHED ON KIDS COUNT DATA CENTER**

DATA SOURCE: ALASKA SECTION OF HEALTH ANALYTICS AND VITAL RECORDS & ALASKA DEPARTMENT OF LABOR AND WORKFORCE DEVELOPMENT

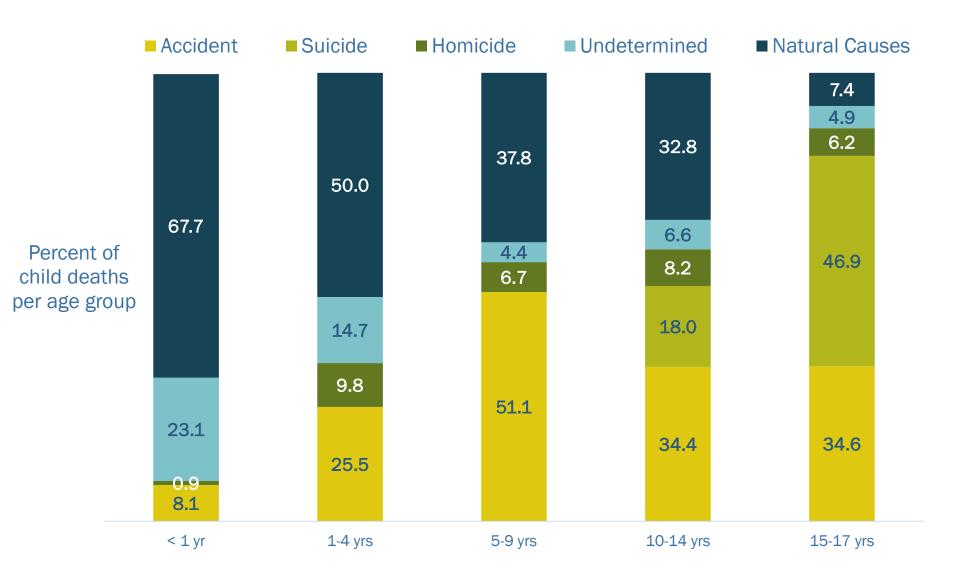


#### CHILD DEATH RATES IN ALASKA BY RACE, 2013-2017

DATA SOURCE: ALASKA SECTION OF HEALTH ANALYTICS AND VITAL RECORDS & ALASKA
DEPARTMENT OF LABOR AND WORKFORCE DEVELOPMENT



# MANNER OF DEATH: PERCENTAGE BY AGE GROUP, 2013-2017



# INFANT MORTALITY RATES: ALASKA AND U.S., 2000-2017

DATA SOURCE: ALASKA SECTION OF HEALTH ANALYTICS AND VITAL RECORDS & NATIONAL VITAL STATISTICS SYSTEM, NATIONAL CENTER FOR HEALTH STATISTICS (NCHS), U.S. CENTERS OF DISEASE CONTROL AND PREVENTION (CDC)



# INFANT MORTALITY RATES (IMR) BY REGION, 2012-2016

Region	# deaths	IMR
Northern	32	11.2
Southwest	43	10.0
Anchorage	136	5.9
Interior	53	5.6
Southeast	23	5.5
Mat-Su	30	4.2
Gulf Coast	22	4.1

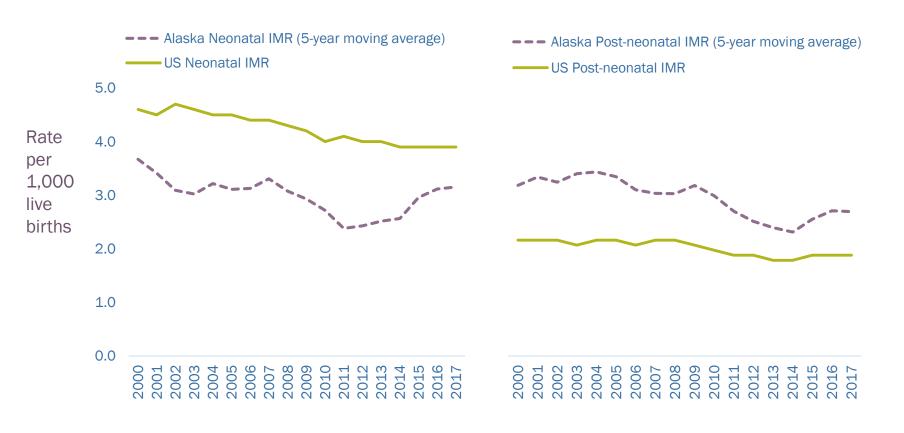


**Definitions:** The number of deaths among infants under 1 year, per 1,000 live births. This is a 5-year average. Region for denominator is determined by maternal residence, not site of delivery. Region for numerator is child's place of residence, not place of death.

Data Source: Alaska Section of Health Analytics and Vital Records, Kids Count Data Center Footnotes: Five years of data were combined to minimize the unreliability of measurement due to the small number of actual events. The reported values are a moving average across five years.

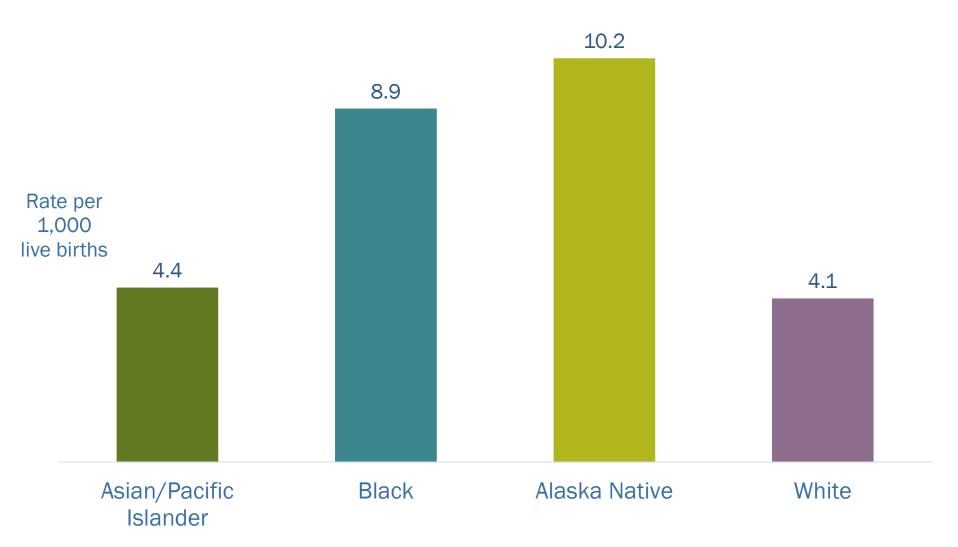
### NEONATAL AND POST-NEONATAL INFANT MORTALITY RATES: ALASKA & U.S., 2000-2017

DATA SOURCES: ALASKA SECTION OF HEALTH ANALYTICS AND VITAL RECORDS & NATIONAL VITAL STATISTICS SYSTEM, NATIONAL CENTER FOR HEALTH STATISTICS (NCHS), U.S. CENTERS OF DISEASE CONTROL AND PREVENTION (CDC)



#### INFANT MORTALITY RATES IN ALASKA BY RACE, 2013-2017

DATA SOURCE: ALASKA SECTION OF HEALTH ANALYTICS AND VITAL RECORDS & ALASKA DEPARTMENT OF LABOR AND WORKFORCE DEVELOPMENT

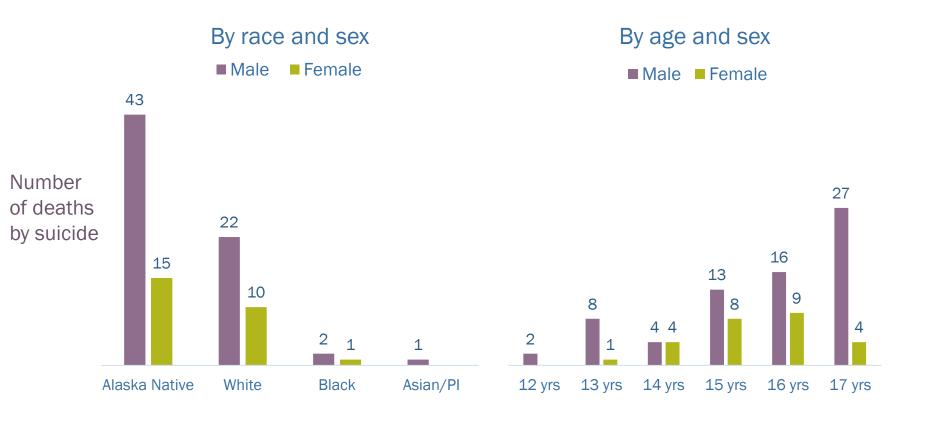


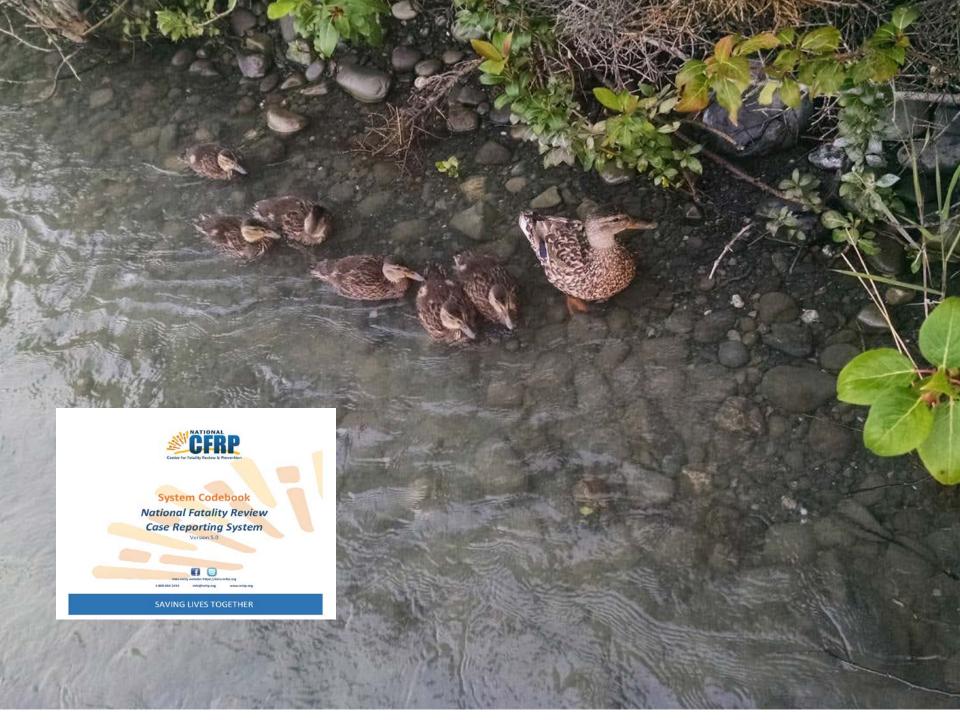
# SUDDEN UNEXPLAINED INFANT DEATH (SUID) RATES: ALASKA AND U.S., 2000-2017

DATA SOURCE: ALASKA SECTION OF HEALTH ANALYTICS AND VITAL RECORDS & U.S. CENTERS OF DISEASE CONTROL AND PREVENTION (CDC), NATIONAL CENTER FOR HEALTH STATISTICS (NCHS)



#### CHILD SUICIDE IN ALASKA, 2007-2017





#### MCDR REVIEWED DEATHS (INFANT/CHILD/ADOLESCENT)

% of deaths occurred during 2016 - Aug 2018 and reviewed by MCDR

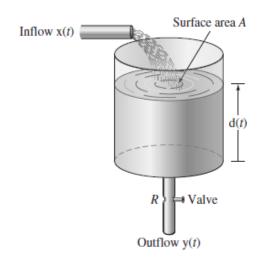


- 329 deaths occurred
  - MCDR has reviewed 67.8% of these deaths
    - 2016: N = 128, 118 reviewed
    - 2017: N = 132, 91 reviewed
    - 2018: N = 69, 14 reviewed

#### MCDR REVIEWED DEATHS (INFANT/CHILD/ADOLESCENT)

#### During 2016 - Aug 2018

MCDR reviewed 371 deaths

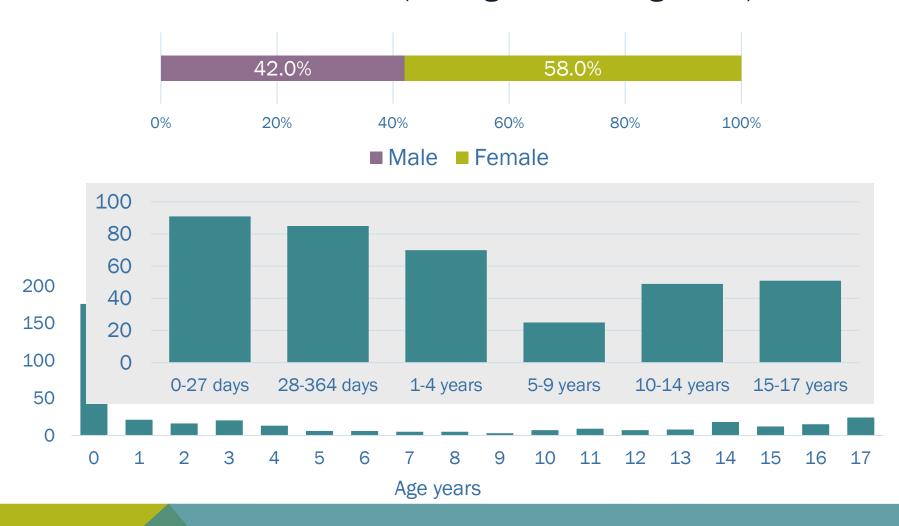


#### Reviewed during:

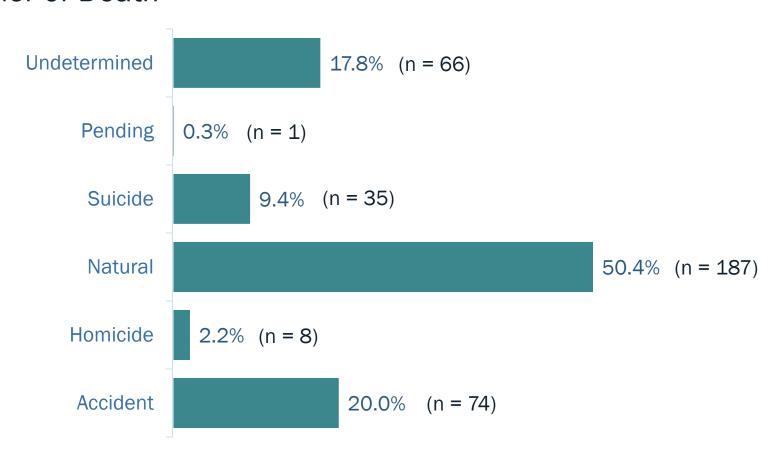


#### MCDR REVIEWED DEATHS (INFANT/CHILD/ADOLESCENT)

MCDR reviewed 371 deaths (During 2016 – Aug 2018)



MCDR reviewed 371 deaths (During 2016 – Aug 2018) Manner of Death



#### CHARACTERISTICS OF THESE FATALITIES

MCDR reviewed 371 deaths (During 2016 – Aug 2018) CRS data for reviewed cases

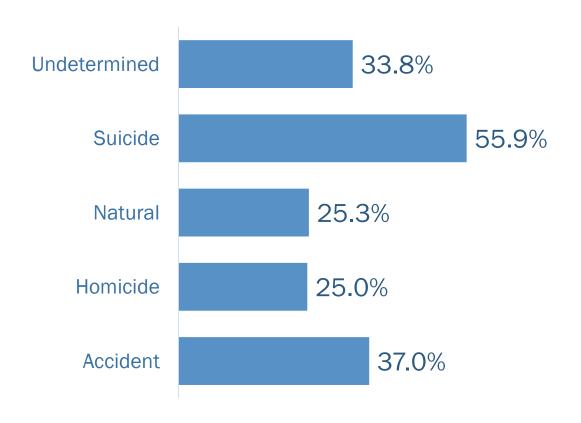


\*\*\*Caution\*\*\*

All CRS estimates should be interpreted as a minimum as detection of specific elements through the available records may (likely) result in incomplete ascertainment

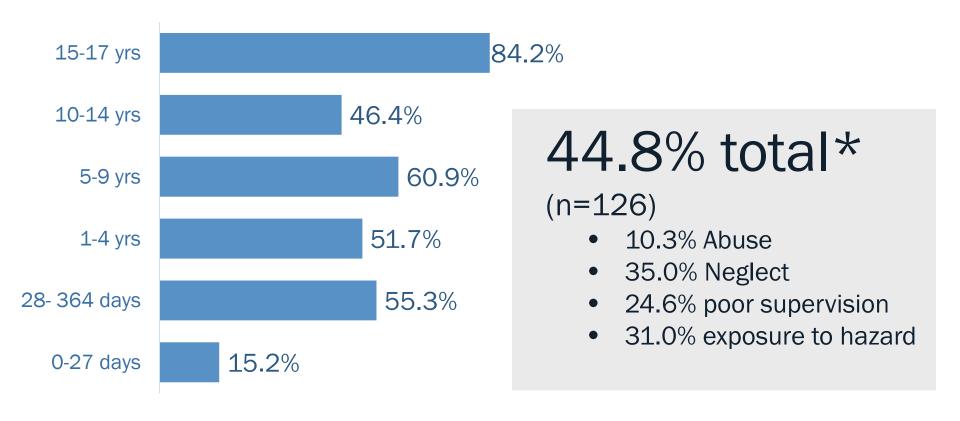
MCDR reviewed 371 deaths (During 2016 – Aug 2018)

Child had history of child maltreatment (as victim)



MCDR reviewed 371 deaths (During 2016 – Aug 2018)

CAN, poor supervision, exposure to hazard cased/contributed to death



MCDR reviewed deaths (During 2016 – Aug 2018)

Hazards

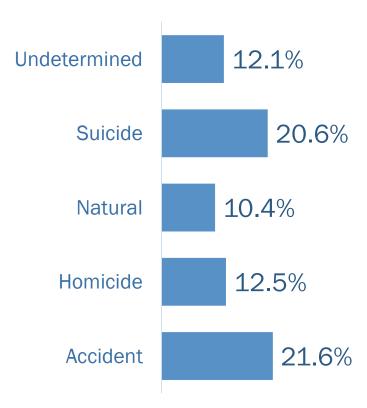
Among the 45 deaths that indicated a specific hazard:

- 39 sleep environment
- 3 firearms
- 2 Motor vehicle
- 1 Medication/poison



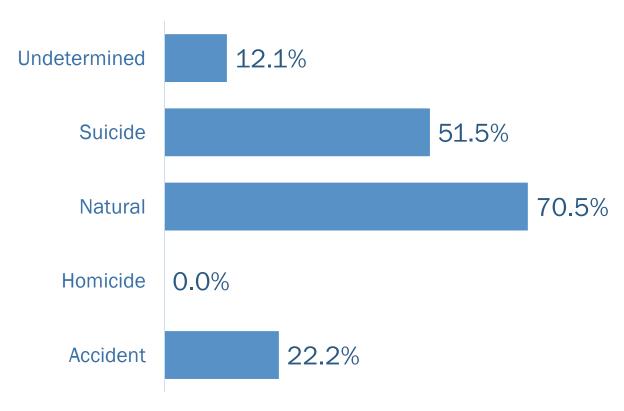
MCDR reviewed 371 deaths (During 2016 – Aug 2018)

Child ever placed outside the home prior to the death by manner of death



MCDR reviewed 371 deaths (During 2016 – Aug 2018)

Child had disability OR chronic illness (physical, mental, cognitive, sensory, other)



#### MCDR reviewed 371 deaths (During 2016 – Aug 2018)

#### - Primary Caregiver

	0-27 dys (N=91)	28-364 dys (N=85)	1-4 yrs (N=70)	5-9 yrs (N=25)	10-14 yrs (N=49)	15-17 yrs (N=51)
Hx of drug abuse	30.6%	44.0%	43.5%	32.0%	18.8%	26.0%
Hx of maltreatment (Vic)	18.2%	23.8%	21.4%	12.0%	6.3%	4.0%
Hx of maltreatment (Perp)	22.7%	42.2%	34.3%	56.0%	30.6%	38.0%
Children ever removed	9.7%	22.3%	20.8%	0%	13.3%	20.6%
Prior death of child	4.5%	8.2%	2.9%	4.0%	4.2%	0%
Hx of IPV	15.4%	24.7%	22.9%	20.0%	16.3%	29.4%
Delinquent/criminal Hx	24.7%	47.1%	35.7%	24.0%	27.7%	26.0%

#### MCDR REVIEWED DEATHS (INFANT/CHILD)

MCDR reviewed 186 deaths (During 2016 – Aug 2018)

- Caregiver: Primary

<u>0-27days</u>	28-364 days	<u>1-4 years</u>	<u>5-9 years</u>
(N=91; 63)	(N=85; 78)	(n=70; 69)	(n=25; 24)
Bio Mother (54) Bio Father (6) Hospital Staff (2) Foster parent (1)	Bio Mother (58) Bio Father (9) Grandparent (2) Other relative (2) Foster parent (2) Adoptive parent (1) Sibling (1) Hospital staff (1) Licensed child care worker (1) Other (1)	Bio Mother (38) Bio Father (12) Adoptive parent (5) Grandparent (5) Other relative (2) Foster parent (1) Sibling (1) Friend (1) Institutional staff (1) Babysitter (1) Unknown (2)	Bio Mother (13) Sibling (3) Grandparent (2) Other relative (2) Bio Father (1) Adoptive parent (1) Foster parent (1) Hospital staff (1)

#### MCDR reviewed 371 deaths (During 2016 – Aug 2018)

#### - Supervision

	0-27 dys (N=91; 63)	28-364 dys (N=85; 79)	1-4 yrs (N=70)	5-9 yrs (N=25)	10-14 yrs (N=49; 34)	15-17 yrs (N=51; 16)
Child supervised at time of incident	96.8%	92.4%	77.1%	68.0%	83.6%	88.0%
Supervisor Hx of drug abuse	35.0%	46.1%	46.2%	34.8%	12.9%	12.5%
Supervisor Impaired at time of incident*	4.8%	25.3%	24.3%	32.0%	29.4%	31.3%

<sup>\*</sup>Post neonates, 1-4yrs, and 5-9yrs caregiver impairment most often indicated as distraction and/or alcohol

#### MCDR reviewed 371 deaths (During 2016 – Aug 2018)

#### - Incident/Investigation

	0-27 dys (N=91; 60)	28-364 dys (N=85; 79)	1-4 yrs (N=67)	5-9 yrs (N=25)	10-14 yrs (N=49; 34)	15-17 yrs (N=51; 49)
911 called	22.0%	77.9%	67.2%	69.6%	75.5%	95.9%
Resuscitation attempted	66.6%	80.5%	65.7%	40.0%	34.7%	52.0%
Drug Impaired	0%	0%	0%	0%	16.2%	30.0%
Investigation conducted	13.8%	70.6%	52.2%	65.2%	78.3%	92.0%
Referred to ME	18.0%	72.9%	67.1%	68.0%	67.3%	96.0%
Autopsy conducted	31.5%	76.5%	55.1%	52.0%	46.9%	68.0%
Death Scene conducted	13.8%	70.2%	52.9%	65.2%	75.6%	92.0%

#### MCDR REVIEWED DEATHS (INFANT)

#### MCDR reviewed 176 deaths (During 2016 – Aug 2018)

	NeoNates (0-27 days) N=91	PostNeo (28-364 days) N=85
Low birth wt. (<2500g)	35.5%	22.1%
Access or compliance issues with prenatal care	34.8%	29.4%
Infant born drug exposed	26.7%*	35.0%*
Mother smoked 3mo prior to pregnancy	25.8%	42.4%
Mother smoked during pregnancy	20.2%	40.0%
Abnormal metabolic newborn screen	21.7% (20% CPT1-A)	20.7% (58% CPT1-A)

<sup>\*</sup>based on 30 reviewed cases (neo) and 20 reviewed cases (post-neo)

#### MCDR reviewed 195 deaths (During 2016 – Aug 2018)

#### Manner of Death by age group



MCDR reviewed 195 deaths (During 2016 – Aug 2018)

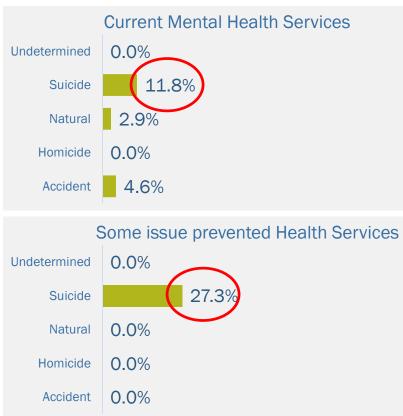
Child had Problems in School (academic, truancy, suspensions, behavioral, expulsion)



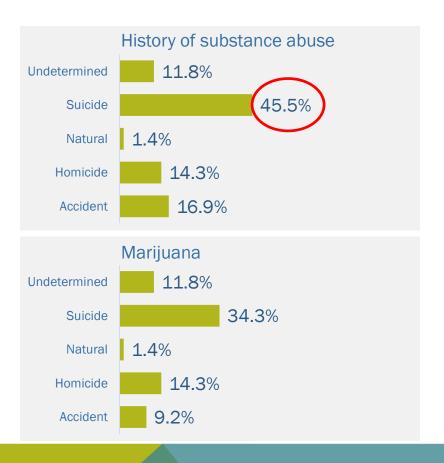


### MCDR reviewed 195 deaths (During 2016 – Aug 2018) Mental Health



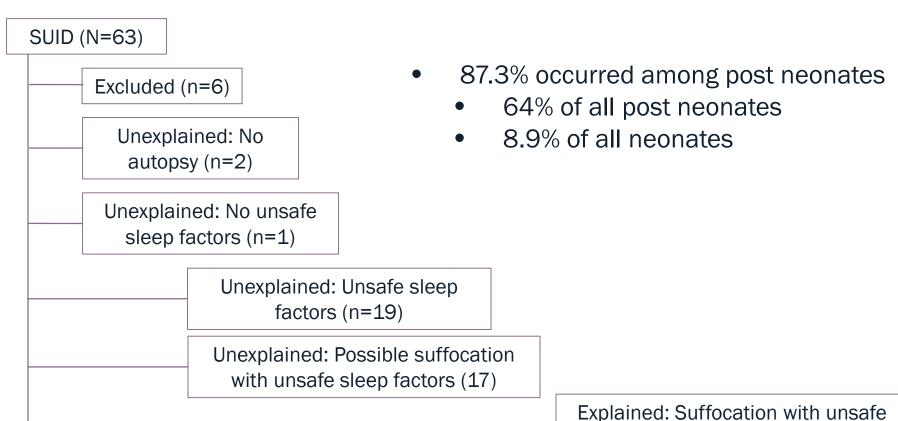


### MCDR reviewed 195 deaths (During 2016 – Aug 2018) Substance abuse/DJJ





MCDR reviewed SUID deaths (N=63, 36% of Infant deaths) (During 2016 – Aug 2018)



sleep factors (17)

MCDR reviewed **Motor Vehicle Crash** deaths (N = 23) (During 2016 – Aug 2018)

<u>1-4 years</u>	<u>5-9 years</u>	<u>10-14 years</u>	<u>15-17 years</u> (n=51; 9)
(n=70; 2)	(n=25; 3)	(n=49; 9)	
Pedestrian (2)	Pedestrian (1) Car (1) ATV (1)	Airplane (5) Pedestrian (1) SUV (1) Motorcycle (1) ATV (1)	ATV (3) Pedestrian (1) Car (1) SUV (2) Truck (1) Snowmobile (1)

MCDR reviewed **Fire deaths** (N=12) (During 2016 – Aug 2018)

Sources of	of ignition	Structure type

Cigarette lighter Single home Cooking stove Duplex

Electrical wiring Trailer/mobile home

Hot liquid

Other

\*Only 1 of the home fire fatalities occurred in a home with a working smoke detector.

MCDR reviewed **Drowning deaths** (N=20) (During 2016 – Aug 2018)

Activity before event	<u>Location</u>	River (5)
Playing near water (7) Swimming (3) Boating (2) Bathing (1) Tubing (1) Sleeping (2)	Open water (15)  Bathtub (3)  Pool/hot tub (1)  Well/septic (1)  Other (1)	Creek (3) Lake (3) Pond (2) Ocean (2)

Unknown/other (5)

\*Only 1 of the drowning deaths occurred where a life jacket

was worn



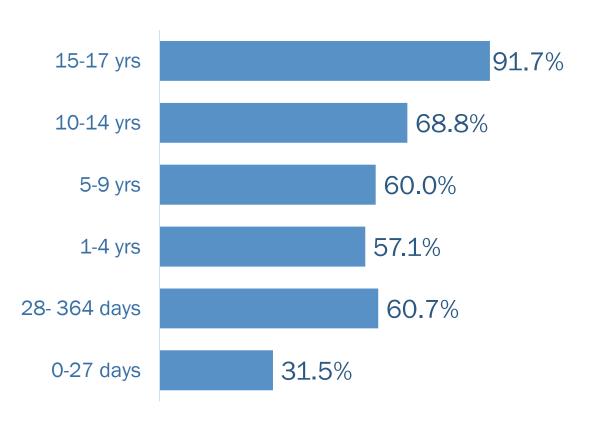
MCDR reviewed **Suicide deaths** (N=35) (During 2016 – Aug 2018)

- 62.3% talked about suicide
- 45.7% prior suicide threats
- 42.9% left a note
- 34.2% Hx of self mutilation
- 22.9% Hx of being bullied
- 22.9% totally unexpected
- 20.0% recent breakup with boyfriend/girlfriend
- 11.4% recent argument with boyfriend/girlfriend
- 14.3% prior attempts

MCDR reviewed Suicide deaths (N=35) (During 2016 – Aug 2018)

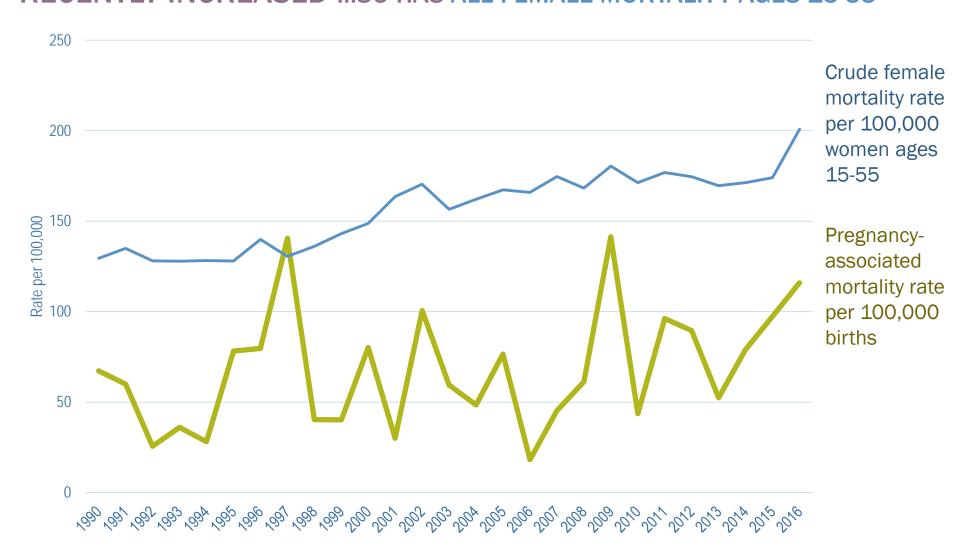
	Female (n=7)	Male (n=28)
Talked about suicide	85.7%	57.1%
Prior suicide threats	71.4%	39.3%
Left a note	57.1%	39.3%
Hx of self mutilation	85.7%	21.4%
Hx of being bullied	42.9%	17.9%
Totally unexpected	0%	28.6%
Recent break up with boyfriend/girlfriend	28.6%	17.9%
Recent argument with boyfriend/girlfriend	14.3%	10.7%
Prior attempts	28.6%	10.7%

MCDR reviewed 371 deaths < Preventable > (During 2016 - Aug 2018)





### ALASKA'S PREGNANCY-ASSOCIATED MORTALITY RATE HAS RECENTLY INCREASED ... SO HAS ALL FEMALE MORTALITY AGES 15-55



Data Sources: Alaska Section of Health Analytics and Vital Records (birth and death certificate data), Alaska Department of Labor and Workforce Development (population data)



#### PREGNANCY-RELATED DEATHS

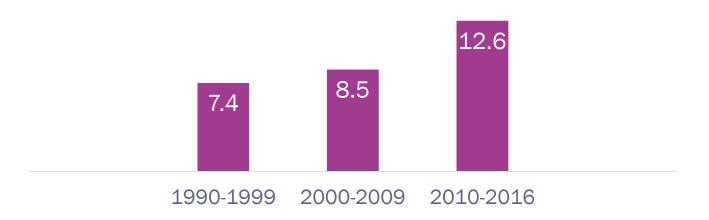
Pregnancy-related mortality rates per 100,000 births (Alaska 1990-2016)

US 2014 Rate, 18.0

1990-1999: **deaths** 

2000-2009: deaths

2010-2016: 10 deaths



#### 3 OF THE 6 PREGNANCY-RELATED DEATHS DURING 2012-2016 WERE DEFINITELY OR PROBABLY PREVENTABLE



#### MCDR Committee Recommendations

- Improved blood pressure control
- Earlier referral to higher level of care
- Appropriate treatment of maternal infections
- Patient compliance with taking prescribed medications
- Improved access and treatment of substance abuse

# HOW DO WE MOVE DATA TO ACTION?

#### MCDR DATA IN ACTION - SAFE SLEEP ROADSHOW 2018

#### Safe Sleep Saves Lives Helping every Alaskan Baby Sleep Safer



Every year, more than 20 Alaskan infants die in an unsafe sleep environment. Most of these deaths did not have to happen.

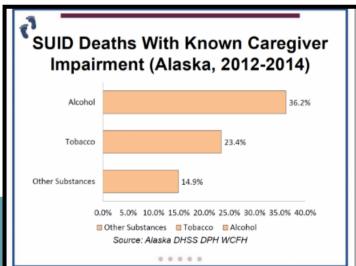
You can help keep your baby safe by following these tips for a safe sleep, every sleep.

Back to sleep for every sleep: Your baby should be placed on their back for every sleep time, including naps.

Share your room, not your bed: Your baby should be close to you, but they need their own sleeping space without adults or other children.

Be aware, not impaired: Your baby needs a sober caregiver who isn't under the influence of any drugs or alcohol, including prescription medications that can make you sleepy, such as those for pain or anxiety. Caregivers who are impaired should never share a bed with their haby.











### Please rank the recommendation you would like for the MCDR Program and prevention partners to focus on over the next year related to Sudden Unexpected Infant Death (SUID)

Recommendation 1

Recommendation 2

Recommendation 3

Recommendation 4

Recommendation 5

Recommendation 6

Recommendation 7

### Please rank the recommendation you would like for the MCDR Program and prevention partners to focus on over the next year related to Maternal deaths

When poll is active, respond at PollEv.com/mch2018

Recommendation 16

Recommendation 17

Recommendation 8

Recommendation 19

Recommendation 20

Recommendation 21

Recommendation 22

# CASE SUMMARIES 1 & 2

#### TABLE DISCUSSION

- 1. As a group, choose the recommendation you would like to work on and share out (you can do both if you finish early!)
- 2. Self-Reflection: Take a minute to jot down some ideas of your own for questions 1 and 2 on the "Group Discussion Worksheet"
- 3. Complete the worksheet as a table.
- 4. Decide what will be shared for Table Report Out question 1.
- 5. Wait for instructions on Table Report Out question 2

#### Thanks to today's lunch sponsor



#### Alaska Mental Health Trust Authority

www.mhtrust.org











## Please rank the recommendation you would like for the MCDR Program and prevention partners to focus on over the next year related to Child injury deaths

Recommendation

8

Recommendation

C

Recommendation

10

Recommendation

11

## Please rank the recommendation you would like for the MCDR Program and prevention partners to focus on over the next year related to Adolescent suicide

Recommendation

12

Recommendation

13

Recommendation

14

Recommendation

15

# CASE SUMMARIES 3 & 4

#### TABLE DISCUSSION

- 1. As a group, choose the recommendation you would like to work on and share out (you can do both if you finish early!)
- 2. Self-Reflection: Take a minute to jot down some ideas of your own for questions 1 and 2 on the "Group Discussion Worksheet"
- 3. Complete the worksheet as a table.
- 4. Decide what will be shared for Table Report Out question 1.
- 5. Wait for instructions on Table Report Out question 2



#### MOVING FORWARD ACTIVITY

On an index card, write the next step this group should take to create prevention task force



### SIGN UP OR NOMINATE SOMEONE!

#### MCDR TASK FORCE & PREVENTION TEAM

#### PLEASE COMPLETE THE FOLLOWING: Name: \_\_\_\_\_\_ Title: \_\_\_\_\_ Organization: Each month the Maternal Child Death Review committee generates recommendations for prevention and identifies common risk factors based on individual case reviews. Often these reviews also identify gaps in systems, policies, death investigation process, and healthcare access and services. However it has been difficult for MCDR to use this information in a meaningful way to prevent deaths and improve data to action initiatives. If you would be interested in forming a MCDR task force and prevention team to move these and future recommendations from the MCDR committee into action please check the boxes for the teams you would be interested in joining. ☐ GENERAL MCDR TASK FORCE AND PREVENTION TEAM ☐ MATERNAL DEATHS □ PREVENTABLE INFANT DEATHS (0-1YR) ☐ CHILD UNINTENTIONAL INJURY (1-12YR)

Time commitment: Each team above will receive an e-mail after every monthly MCDR Committee Review with corresponding prevention recommendations. At the team's request, MCDR staff will facilitate a group meeting to discuss moving recommendations to action.

Is there someone you would like to nominate for a team?

□ OTHER –WRITE IN-\_\_\_\_\_

Nominee name and contact info:

□ ADOLESCENT SUICIDE (13-17YR)

