#### Large Animal Services at Marysville

**Beef Cow-Calf Vaccination Basics** 

Alissa Wilhelm, DVM, MS





Large Animal Services at Marysville

# Who currently has a written vaccination and deworming protocol for their farm?



## **Talking shop: Giving shots**

IM: intramuscular

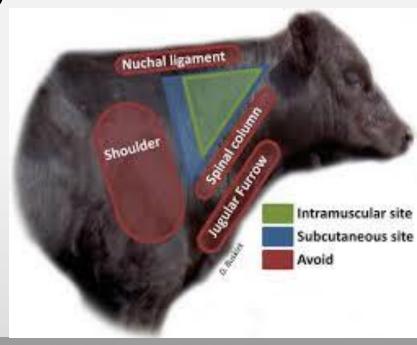
SQ: Subcutaneous tissue

IN: Intranasal

PO: orally

IV: Intravenous

Read Product Labels!!!



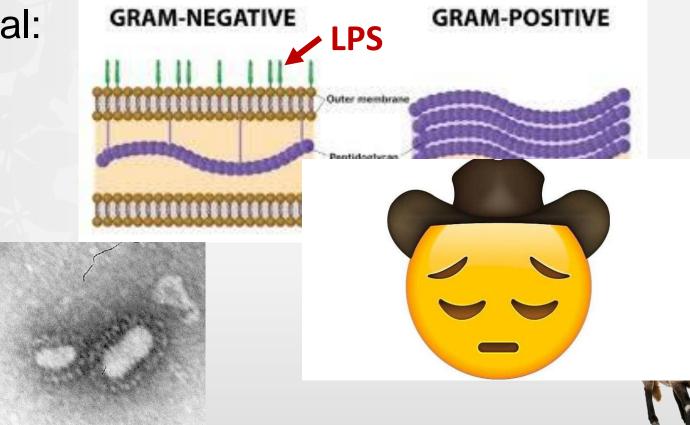
# **Talking shop**

- Modified live vaccine (MLV): is a live but weakened version of a virus that is used to stimulate immune response.
- Killed Vaccine: is an inactive form of the virus, with all infectious bacteria taken out and killed.



# Talking shop: Vaccine types

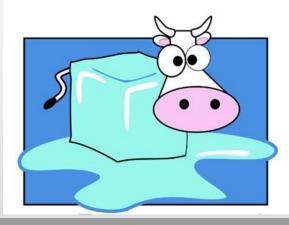
Bacterial:



Viral

# **Vaccine Handling**

- Use MLV within 4 hours of mixing
- Use killed within 3 weeks of opening
- Do not thaw frozen vaccines
- Fridge Temperature for vaccines: 37-45
  - Do not store in the door



## How many ways???

- 5-way respiratory: BRSV, IBR, PI3, BVD1&2
- 5-way Lepto vaccine: different strains
- 7-way vaccine: clostridal vaccine, NO tetanus
- 8-way vaccine: clostridial with tetanus











#### Large Animal Services at Marysville

Vaccination Protocol: Cow/Calf

**Spring Calving** 

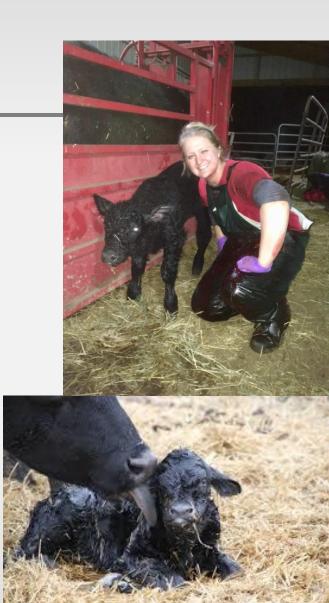
CONSULT YOUR
VETERINARIAN
REGARDING WHAT IS
BEST FOR YOUR HERD!





#### Calves: at birth

- Up and nursing within 4 hours
- Ear tag
- Inforce 3 or Nasalgen: IN\*
- 7% lodine dip for naval
- Trace mineral or Se injection\*
- Castrate bull calves
- C/D and T vaccine\*
- First defense bolus\*
  - \* Denotes optional



#### Calves: 2-3 months

- 5-way respiratory with lepto (MLV)
- 8-way clostridial vaccine (7 is ok)
- Castrate (if not already)
- Implant\*
- Pour-on / fly tag



# Calves: 4-6 months (weaning)

- 5-way respiratory with lepto (MLV): booster
- 7 or 8-way clostridial vaccine
- Deworm: oral or injectable
- Implant\*
- Pour-on & remove fly tag



# Cows: prebreeding

- 5-way respiratory with lepto (vibrio optional)
  - MLV: once yearly
  - Killed: spring & fall if moving animals
- 7-way clostridial
- Pour on & fly tag
- Deworm oral or injectable



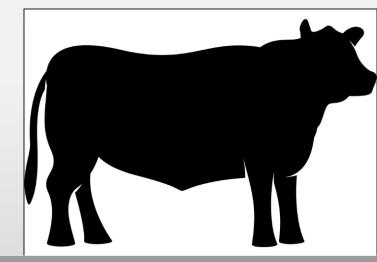
#### Cows: Fall

- Booster of 5-way respiratory with lepto
  - If killed was used in spring
- Pour-on
- Remove fly tags
- Deworm skinny cows



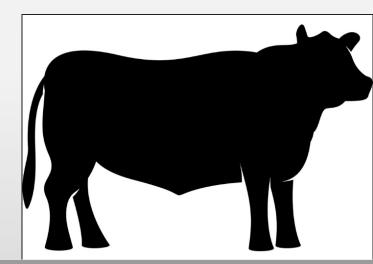
### **Bulls: Prebreeding**

- Breeding soundness exam
- 5-way respiratory with lepto (vibrio optional)
  - MLV: once yearly
  - Killed: spring & fall if moving animals
- 7-way clostridial
- Pour on & fly tag
- Deworm oral or injectable



#### **Bulls: Fall**

- Booster of 5-way respiratory with lepto
  - If killed was used in spring
- Pour-on
- Remove fly tags
- Deworm yearlings



### Replacement Heifers (4-6 weeks pre-breed)

- 5-way respiratory with lepto (MLV)
- 7- way clostridial: Especially if under 2 years of age
- Spring: fly tag
- Deworm: oral or injectable
- Pour-On insecticide



### **Incoming Cattle: at arrival**

- Inforce 3 IN OR 5-way resp. with lepto
- 7 way Clostridial
- Injectable or oral dewormer
- Pour-on insecticide
- Metaphylaxis: optional
- Isolate



### **Other Optional Vaccines**

- Scour vaccines
- Pink eye
- Pastuerella/manheimia
- Vibrio (campylobacter)
- Salmonella
- Many, many more



### **Vaccination Tips**

- Do not vaccinate calves with a 5-way
   MLV in the first week of life.
- Boosters not before 3 weeks or after 3 months of previous vaccine
- No vitamin injections with vaccines
- Discard after expiration dates
- Clean needle used for vaccine draw

**But why doc?** 



#### **Vaccines and Reproduction**

- MLV in naïve animals can result in abortions
  - MLV in calves nursing naïve cows too

#### PRECAUTIONS:

Do not use in pregnant cows (abortions can result) unless they were vaccinated, according to label directions, with any Bovi-Shield GOLD FP or PregGuard GOLD FP vaccine within the past 12 months. Do not use in calves nursing pregnant cows unless their dams were vaccinated within the past 12 months as described above.



# **Vaccination tips**

- No more than 2 gram negative vaccines at once
- Mineral deficiencies increase vaccine reactions



### **Examples of Gram - Vaccines**

- NO MORE THAN 2:
  - Leptospira (leptoferm, spirovac)
  - E. Coli (Scourgard 4kc)
  - Vibrio (campylobacter)
  - Histophilus somnus
  - Pinkeye
  - Pasteurella
  - Salmonella
  - Clostridial:(gram +) counts as half
  - Mu-Se (counts as a gram -)



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#### When to vaccinate?

- 85°F
- THI greater than 115

