



## Dairy Pre and Post Milking Wash Protocol

### Pre-Milking:

Upon entering Milk House rinse footwear with hot water hose and rinse any resulting debris toward center floor drain

Turn on sink faucet and begin running hot water to flush water lines of cold water.

Turn on CIP wash and run through detergent cycle \* **DO NOT Add Detergent** \* cycle runs with hot water to rinse milking claws and hoses

At shelving unit:

Assemble milking lids and pulsator units

Using hot water hose rinse all (6) milking cans while inverted on the counter. Rinse until bottom of inverted can becomes hot to the touch of a gloved hand

\* IF filling into an empty bulk tank rinse at this time and leave valve open to drain \*

At sink:

With flexible faucet running hot water begin rinsing all other equipment parts

Rinse and assemble milk filter funnel

Be sure to include isotropic paper filter when assembling after rinsing

Place assembled filter into lid opening of bulk tank to be filled that milking

Rinse off straight faucet attached to flexible faucet with hot water

Rinse all (6) milk lid gaskets and hang around straight faucet

One at a time: Rinse milker lids with pulsators attached being sure to keep water away opening with black pulsator base

As each lid is rinsed insert a lid gasket being sure the flat side is resting against the underside of the lid

Take milk cans one at a time from counter and attached lid and gasket assembly

Repeat procedure for solid transfer pail lids and buckets

Attach airline to stem of pulsator base

Remove milk claw and hose assembly one at a time from CIP wash sink and attach to milking cans

\* Be sure to place metal spring around silicone milk line before attaching hose to lid \*

Rinse and fill one stainless steel pail with warm – hot water and a light drizzle of dish soap

Place on dairy cart in barn for udder washing

\* If milking in cold weather: fill small stainless pail with hot water for warming iodine dip cups \*

Collect strip cups and cup for milk claw plugs, place on dairy cart in barn

Making sure wash cycle is set to “off” and all ports are covered on CIP wash cylinder, switch machine to “milk”

Close valve on tank to be filled and cap with valve cover

Bring all remaining equipment into barn and begin milking

## **Post-Milking:**

Bring all milking equipment from barn and dairy cart into Milk House placing in such a way as to offer easy movement about the Milk House

At CIP Unit turn switch from Milk to Wash

Begin filling wash sinks:

Right sink filled 3/4 full with hot water and one 4-ounce scoop of powdered manual brush detergent

Left sink filled 3/4 full with cold water and 8 ounces of Acid-Oxy San Sanitizer (blue chemical barrel)

**\* Keep watch to ensure sinks do not over flow \***

Remove filter funnel from bulk tank and ensure all tank lids and gaskets are properly placed and seated.

Use first cool water and then hot water to thoroughly rinse any milk residue from the outside surfaces of bulk tanks

**\* DO NOT use excessive water around top control unit of small (bottling) tank \***

Using water hose again rinse footwear and all milking equipment. Rinse any resulting debris toward center floor drain.

With outer surfaces of all equipment rinsed begin by disassembling filter funnel and discarding isotropic paper filter in Milk House waste bin. Inspect filter for any debris of clumped milk. Let Matt or Zach know if anything unusual is discovered.

At sink:

Thoroughly scrub all filter funnel components in right side soap sink with wash brush

Place in left side sanitizer sink

Making sure all soap residue has been cleared from surface remove components from sanitizer sink and place on stainless steel shelving unit to dry

Disassemble milking cans consolidating air hoses and milk claw hose assemblies out of the way of foot traffic

One at a time remove pulsator assemblies from lids.

Disassemble black base from blue pulsator, placing pulsator on top rack of stainless shelving unit

Dip-wash and sanitizer black based in right and left sink basins, place on rack next to pulsators

**\* In cold weather use blow dryer to thoroughly dry blue pulsators before returning to shelving unit \***

Remove all (6) gaskets from lids and rinse with flexible faucet, scour with gloved hand in soap sink and place in sanitizer sink, from sanitizer sink spread on shelving unit to dry

Rinse milk residue from all (6) can lids with flexible faucet and place in soap sink

Thoroughly scrub all surfaces with wash brush and place in sanitizer sink

From sanitizer sink, hang milking can lids (4) from hooks at shelving unit, place transfer can lids (2) on shelf to dry

Scrub stainless steel udder wash pail with wash brush and sanitize, place on shelf with other pails to dry

With gloved hand scour milk claw plugs, sanitize and place on shelf to dry

With wash brush scrub strip cups and screens (2 each) and cup for claw plugs, sanitize, spread on shelf to dry

Remove metal springs from milk lines (4) dip-wash in soap sink, sanitize and place on shelf to dry

Using hot water hose spray down groups of air hoses and milk claw hose assemblies to ensure components are free of dirt and fecal matter.

Rinse insides of all (6) milking cans and allow water to sit

Taking air hoses one at a time, remove valve assembly and wash inside and outside with brush. Place valve assemblies on shelf with the valve open to dry. Wash exterior of air hoses with brush and dip in sanitizer. Two air hoses should be hung over the drying rack to dry, and two air hoses should be attached to the CIP cleaning system.

Taking all (4) milking claw hose assemblies place claws in soap sink allowing hoses to drape over side

Making sure to keep the open end of the double tubed air line out of the water thoroughly scrub and scour claw and hose assemblies one at a time with wash brush and gloved hand

Again keeping open end of the double tubed air line out of the water sanitize each assembly and place in CIP wash sink

**\* Make sure to secure black dial on milking claws, and attach milk line to CIP wash cylinder\***

\* At this time fill detergent tube of CIP wash center with 8 ounces of Synthesis Detergent (Pink) and begin wash cycle

Empty water from (6) milking cans

Place a light dusting of powdered manual brush detergent in the bottom of one can, use hot water hose to fill can between 1/4 and 1/2 full.

Taking long handled yellow scrub brush thoroughly scrub inside of can **\* Do Not Scrub Outside At This Time \***

Rest scrub brush in next can to be washed and transfer soapy water.

Bring freshly scrubbed can to wash sink and scrub inside and outside with wash brush in soap sink. Pay close attention to inside bottom edge, and the inside and outside of the lip.

Sanitize inside AND outside of can in sanitizer sink being sure all soap residue has been removed from inside

Place upside down along edge of window wall counter, allowing enough of the can's opening over the counter edge to ensure proper drainage

Repeat prior steps until all (6) cans have been washed and sanitized

### **Once each week on Friday afternoon:**

1. Perform the above wash procedures but also add MSR (milk-stone remover) to all wash water.
2. Test the temperature of the hot water coming out of the sink faucet with the stem thermometer. Temperature should be between 160 F and 170 F. If it is below 160 F let Matt or Zach know.
3. Change the bulk tank temperature recording charts.

### **Standard Protocol for preparing cows to be milked**

1. Dip cloth wash rag in warm soapy water and use to wash any dirt from each teat and the bottom of the udder. Place the used rag in the dirty rag bucket. Do not use the same rag to clean another cow. Use a second rag if needed to get the teats thoroughly cleaned.

2. Using a strip cup with a screened lid, strip 3 to 5 squirts of milk from each teat through the screen into the cup. Examine the screen for any clumping or thickening of the milk or any blood. If any of these conditions exist, milk this cow last and feed the milk to the pigs. Let Matt or Zach know about the situation.
3. Dip each teat in iodine solution.
4. Allow iodine to be on the teat for at least 30 seconds.
5. Using a single use paper towel, wipe any excess iodine solution off of the teat.
6. Immediately attach the milking unit onto the udder.

## MILK BOTTLE WASHING PROTOCOL

1. Returned bottles in labeled crates transported from Farm Store to Bottling Room.
2. Left Hand Sink filled with HOT water. Add 4oz powdered detergent.
3. Right Hand sink filled with COLD water. Add 4oz Acidoxy San. Check sanitizer with Peracetic Acid test strip to ensure a concentration of 200ppm or higher.
4. Power on the Hobart sanitizing washing machine.
5. Soak returned bottles thoroughly in left-hand sink soapy mix.
6. Scrub interior and exterior of bottles thoroughly with yellow bottle brush. Be sure to get bottoms, corners and shoulders and check interior surfaces closely for stuck-on residue.
7. Empty bottle completely, then submerge in right-hand sink sanitizer, filling bottles.
8. Pour out sanitizer from bottle, then place bottles upside-down in a clean bottle crate.
9. If Hobart says "READY", place crate full of clean bottles in machine, close, and start the machine.
10. While cycle is running, take bottle transportation cart and clean with Synthesis acid solution, rinsing with hot water from hose.
11. When cycle is done, remove crate with sanitized bottles and place on the CLEAN bottle transportation cart.
- 12. These bottles are now ready for filling.**

