PMF RRF – Procedures

STEP 1 – PREPARATION

1. *Verify:*
    a. *Vent lines are not plugged.*
    b. *Cooler tubes are not plugged.*
    c. *The flush must be able to flow throughout the system.*
2. *Materials needed:*
    a. *Enough **PMF** to fill the HALF the cooling system.*
    b. *Thoroughly mix 1:1 – 1-part **PMF** to 1-part DEIONIZED water.*
    c. *Enough **RRF** to fill the cooling system COMPLETELY.*
    d. ***RRF** is ready to use and should never be diluted.*
    e. *Enough DEIONIZED water to fill entire system THREE TIMES.*
    f. *Two X 1" ball valves, one Installed on each side of block underneath rail.*
    g. *Empty totes available to drain flush if needed.*
    h. *Have new thermostats ready to install if needed.*
    i. *Have new water pump ready to install if needed.*
3. *Record water pump pressure and all temps.*

STEP 2 – DRAIN COOLANT & DISPOSE

1. *Shutdown, LOTO, and Remove Surge/Day Tank Cap.*
2. *Drain and dispose of old coolant.*
3. *Install ball valves. (leave open)*

STEP 3 – FILL WITH PMF

1. *With Surge/Day Tank Cap removed, fill SLOWLY with **PMF** until overflow from Surge/Day Tank.*
2. *Record how much **PMF** is used to completely fill cooling system.*
3. *Replace Surge/Day Tank Cap.*

STEP 4 – RUN AT FULL LOAD

1. *Run Unit 168 hours (one week) to 336 hours (two weeks) at full load.*
2. *Record water pump pressure and all temps daily.*

STEP 5 – RINSE SURGE/DAY TANK

1. *Record water pump pressure and all temps.*
2. *Shutdown, LOTO, and Remove Surge/Day Tank Cap.*
3. *While still HOT and FULL, Power wash Surge Tank with **STH - Surge Tank Hose**.*
4. *Let particles overflow until water runs clear. (@15-20 min)*

STEP 6 – DRAIN FLUSH & DISPOSE

1. *With Surge/Day Tank Cap removed, drain Flush via ball valve on each side of block underneath rail. (dispose as you would old coolant)*

STEP 7 – FILL WITH RRF

1. *With Surge/Day Tank Cap removed, fill SLOWLY with **RRF** (Ready to Use) until overflow from Surge/Day Tank.*
2. *Record how much **RRF** is used to completely fill cooling system.*
3. *Replace Surge/Day Tank Cap.*

STEP 8 – RUN AT FULL LOAD

1. *Run Unit **2** hours, at temp, at full load.*
2. *Record water pump pressure and all temps.*

STEP 9 – RINSE SURGE/DAY TANK

1. *Record water pump pressure and all temps.*
2. *Shutdown, LOTO, and Remove Surge/Day Tank Cap.*
3. *While still HOT and FULL, Power wash Surge Tank with **STH - Surge Tank Hose**.*
4. *Let particles overflow until water runs clear. (@15-20 min)*

STEP 10 – DRAIN FLUSH & DISPOSE

1. *With Surge/Day Tank Cap removed, drain Flush via ball valve on each side of block underneath rail. (dispose as you would old coolant)*

STEP 11 – RINSE OUT ALL PARTICULATES

1. *Fill SLOWLY with deionized water until overflow from Surge/Day Tank.*
2. *Run Unit until up to temp and thermostats open.*
3. *Continue to pump in deionized water (2 x volume) until overflowing from the top at the Surge/Day Tank and ball valve on other side until clean.*

STEP 12 - DRAIN & DISPOSE

1. *Shutdown/LOTO/Remove*
2. *With Surge/Day Tank Cap removed, drain and dispose of rinse water.*

STEP 13 – INSPECTION

1. *Inspect water pump and thermostats and replace if needed.*

STEP 14 – FILL WITH COOLANT

1. *NEVER LEAVE OR RUN WITH WATER ONLY!*
2. *Fill with 50/50 coolant mix to winterize*
3. *Fill with **CoolAint** to Summerize*

STEP 15 – REMEMBER

1. *Quarterly coolant sampling.*