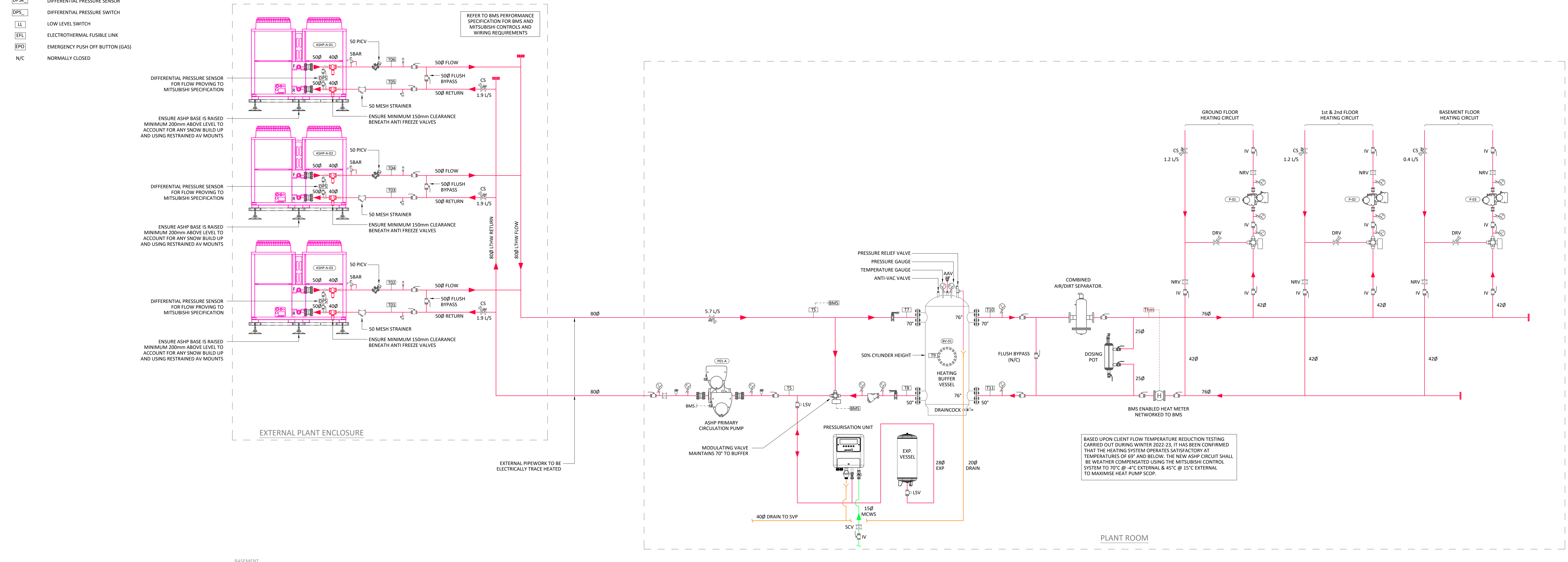


**LEGEND:**

- LTHW F&R PIPEWORK
- LEVER OPERATED BALL VALVE
- BUTTERFLY VALVE LEVER OPERATED
- STOPCOCK
- DOUBLE REGULATING VALVE
- COMMISSIONING VALVE
- ORIFICE PLATE
- PRESSURE INDEPENDENT CONTROL VALVE
- PRESSURE REDUCING VALVE
- LOCKSHIELD VALVE
- STRAINER
- NON RETURN VALVE
- CHECK VALVE
- DOUBLE CHECK VALVE
- DRAIN COCK
- 2 PORT MOTORISED VALVE
- 3 PORT MOTORISED VALVE
- PRESSURE/TEMPERATURE/EXPANSION RELIEF VALVE
- AUTOMATIC AIR VENT WITH IV
- BINDER TWINLOCK TEST POINT
- FLEXIBLE CONNECTOR
- CALEFFI ANTIFREEZE VALVE, 40mm, 3°C DISCHARGE TEMPERATURE
- PIPE REDUCER / ENLARGER
- TWIN HEAD PUMP
- IMMERSION TEMPERATURE SENSOR
- CLAMP ON TEMPERATURE SENSOR
- PRESSURE GAUGE
- TEMPERATURE GAUGE
- DIFFERENTIAL PRESSURE SENSOR
- DIFFERENTIAL PRESSURE SWITCH
- LOW LEVEL SWITCH
- ELECTROTHERMAL FUSIBLE LINK
- EMERGENCY PUSH OFF BUTTON (GAS)
- NORMALLY CLOSED

**NOTES:**

1. THIS DRAWING SHALL BE READ IN CONJUNCTION WITH PLANT ROOM MECHANICAL SERVICES LAYOUT DRAWING 22213-DPL-XX-81-D-M-5602.
2. INCLUDE AN EXTERNAL AIR TEMPERATURE SENSOR (T20) FOR HEATING FROST AND HEATING ECONOMY HOLD-OFF. LOCATE ON A NORTH FACING SHADED WALL AWAY FROM ANY HEAT SOURCES AND SAFE FROM VANDALISM.
3. INCLUDE INTERNAL AIR SENSOR FOR HEATING CIRCUIT (T21) FOR MONITORING PURPOSES AND ALSO FOR HIGH LIMIT ECONOMY FUNCTION. LOCATE SENSORS WITHIN THE COLDEST CORRIDOR AWAY FROM DIRECT SUNLIGHT AND HEAT SOURCES.
4. REFER TO BMS SPECIFICATION FOR CONTROL DETAILS.
5. INCLUDE AUTO AIR VENTS AT ALL HIGH POINTS AND DRAIN POINTS AT ALL LOW POINTS WHETHER INDICATED OR NOT.
6. CONTRACTOR TO INCLUDE FOR PIPELINE EXPANSION AND CONTRACTION AS REQUIRED.



Revision	Status	Date	Description	By	Checked
P01	A4	2023-09-06	ISSUED FOR INFORMATION ONLY	PL	RL