

PROJECT: HABC Douglass Homes
1500 E. Lexington St.
Baltimore, MD 21231

AS-BUILT DRAWINGS

Page	Description	Page Number
TITLE PAGE	Title Page	
RISER	Riser Diagram	M1
SEQUENCE OF OPERATIONS	Sequence per TAC	M2
FLOW DIAGRAM FOR BUILDING HEAT	Flow Diagram for Building Heat	M3
FLOW DIAGRAM FOR BUILDING HEAT/DHW	Flow Diagram for Building Heat/DHW	M4
POINTS LIST BUILDINGS 101 - 103	Controller Points for Bldgs 101 - 103	M5
POINTS LIST BUILDINGS 104 - 105	Controller Points for Bldg 104 - 105	M6
POINTS LIST BUILDING 106	Controller Points Bldg 106	M7
POINTS LIST BUILDINGS 107 - 109	Controller Points Bldgs 107 - 109	M8
POINTS LIST BUILDINGS 110 - 112	Controller Points Bldgs 110 - 112	M9
POINTS LIST BUILDINGS 201 - 203	Controller Points Bldgs 201 - 203	M10
POINTS LIST BUILDINGS 204 - 205	Controller Points Bldgs 204 - 205	M11
POINTS LIST BUILDING 206	Controller Points Bldg 206	M12
POINTS LIST BUILDINGS 207 - 210	Controller Points Bldgs 207 - 210	M13
POINTS LIST BUILDINGS 211 - 213	Controller Points Bldgs 211 - 213	M14
POINTS LIST BUILDINGS 301 - 303	Controller Points Bldgs 301 - 303	M15
POINTS LIST BUILDINGS 304 - 305	Controller Points Bldgs 304 - 305	M16
POINTS LIST BUILDING 306 A	Controller Points Bldg 306 A	M17
POINTS LIST BUILDING 306 B	Controller Points Bldg 306 B	M18

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Heating
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Refrigeration
Automatic Temperature Controls
Facility Management Systems
Fire Management
Security Management
Building Operations and Management
Water Treatment
Electrical Equipment
Emergency Generator / Lighting Equipment
Industrial Controls / Recording / Indication Equipment

PROJECT TITLE					
HABC DOUGLASS HOMES					
ARCHITECT			ENGINEER		
Phone:			Phone:		
MECHANICAL CONTRACTOR			ELECTRICAL CONTRACTOR		
Phone:			Phone:		
REFERENCE DRAWING	NO.	REVISION-LOCATION	ECN	DATE	BY
Branch Information			Johnson Controls, Inc. 60 Loveton Circle, Sparks MD 21152 - 0889 Phone: 410-584-1160 Fax: 410-472-4928		
SALES ENGINEER	PROJECT MANAGER	APPLICATION ENGINEER	DATE	CONTRACT NUMBER	
	MT		1/5/2015	4052-0449	



If a shield is used, it should be earth grounded at one and only one point for the entire bus segment. (Preferably in the NCE Panel.) The shield screws on the controllers are simply a convenient way to continue the daisy chain of the bus. They are not attached to earth ground.

Drawing Title											
Riser Diagram – AS BUILT											
		REFERENCE DRAWING		NO.		REVISION LOCATION		ECN		DATE BY	
Sales Engineer		Project Manager		Application Engineer		DRAWN		APPROVED			
		MT				BY DATE		BY DATE			
Project Title		Johnson Controls		Branch Information Johnson Controls Inc. 60 Loveton Circle, Sparks, MD 21152 Phone: 410-584-1160 Toll Free: 1-866-860-8109		CONTRACT NUMBER		4052-0449			
HABC DOUGLASS HOMES						DRAWING NUMBER		M1			

Sequence Of Operations
Existing Per the Pritchett Control Drawings
of the Douglass Homes AS- Builts 12-30-11

SEQUENCE OF OPERATIONS FOR DOMESTIC HOT WATER

THE STEAM CONTROL VALVES WILL BE CONTROLLED BY (DDC) PROPORTIONALLY ELECTRONIC ACTUATORS (2 IN EACH CONVERTER BUILDING). THE VALVES WILL MODULATE TO MAINTAIN DHW TANK TEMPERATURE SETPOINT OF 125 DEGREES (ADJUSTABLE) AS SENSED BY THE DHW TANK TEMPERATURE SENSOR. THE SUPPLY STEAM PRESSURE TRANSDUCER WILL MONITOR SUPPLY STEAM PRESSURE TO DHW TANK. THE DOMESTIC HOT WATER SUPPLY AND RETURN TEMPERATURES WILL BE MONITORED. AN ALARM WILL BE GENERATED WHENEVER THE TEMPERATURE TRAVELS 10 DEGREES (ADJUSTABLE) ABOVE OR BELOW ITS SETPOINT.

THE DHW CIRCULATING PUMPS ARE MANUALLY OPERATED CONSTANT VOLUME PUMPS ARE RUN 24/7.

SEQUENCE OF OPERATION FOR BUILDING STEAM HEATING

WHEN THE OAT DROPS BELOW 60 DEGREES F (ADJUSTABLE) THE CONTROL VALVES FOR EACH BUILDING WILL BE ENABLED FOR PROPOTIONAL CONTROL OF THE STEAM SUPPLY TO THE HEATING ZONE.

THE PROPORTIONALLY CONTROLLED ZONE VALVES WILL MODULATE TO MAINTAIN MINIMUM STEAM PRESSURE (3 TO 5 PSI ADJUSTABLE), AS SENSED BY THE PRESSURE TRANSDUCER. A TEMPERATURE SENSOR LOCATED AT THE END OF THE LINE OF EACH BUILDING WILL VERIFY THE CIRCULATION OF STEAM THROUGHOUT THE BUILDING AND TO ALL RISERS.

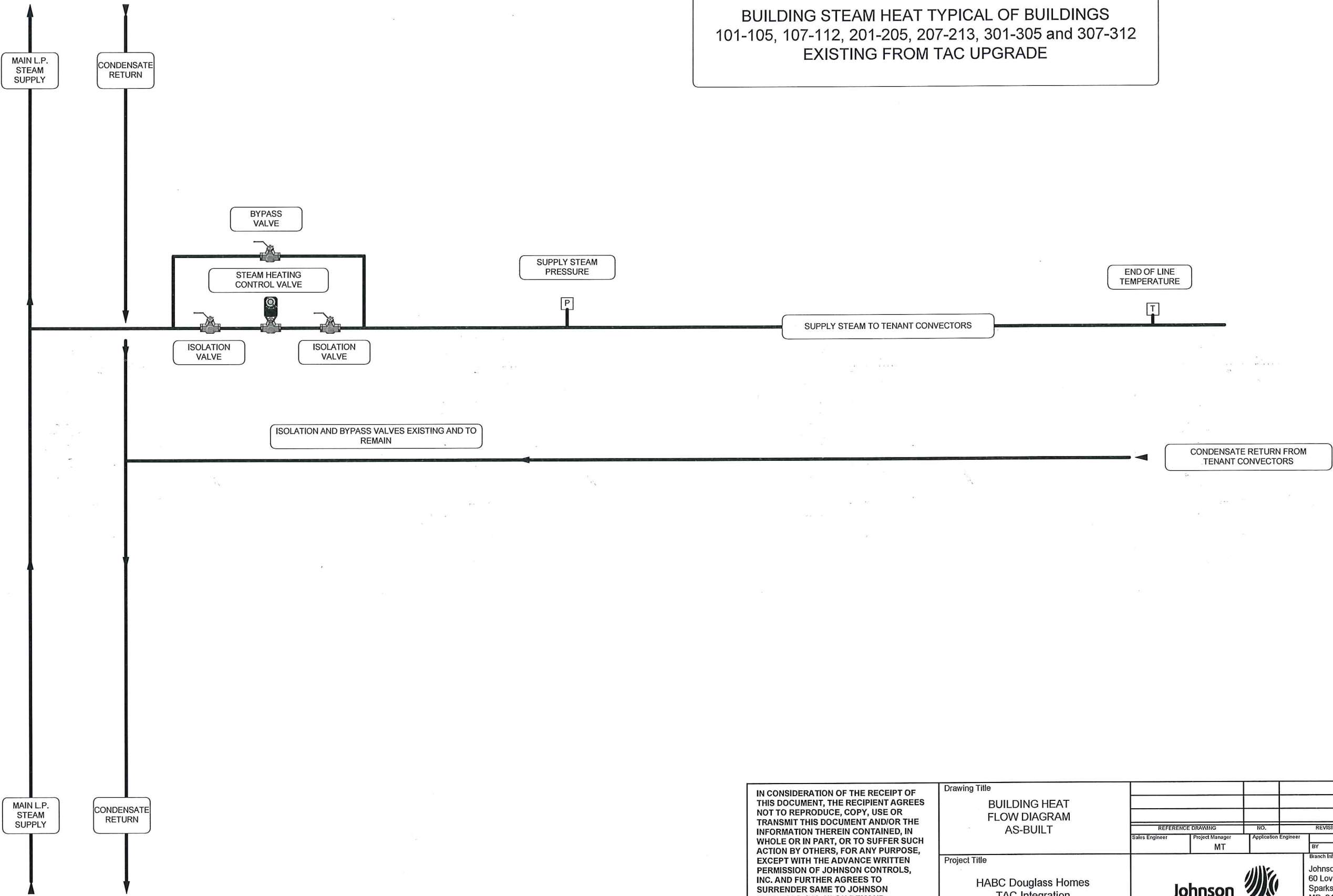
IN ORDER TO ADEQUATELY SUPPLY THE MINIMUM STEAM PRESSURE TO EACH BUILDING. THERE WILL BE A TIMED STAGGERED SEQUENCE THAT WILL STAGE THE OPERATION OF THE STEAM CONTROL VALVES OPEN. FOR EXAMPLE, AT 45 DEGREES O.A.T. THE FIRST CLUSTER OF BUILDINGS WILL BE ENABLED FOR HEAT FOR 7.5 MINUTES/ EVERY 30 MINUTES. AFTER 7.5 MINUTES THE SECOND CLUSTER OF BUILDINGS IS ENABLED FOR 7.5 MINUTES, ETC. THIS STAGING CONTINUES THROUGHOUT THE ENTIRE DEVELOPMENT. AT 20 DEGREES O.A.T. THE VALVES WILL PROPORTIONALLY FOR 20 MINUTES/ EVERY 30 MINUTES.

WHEN THE OAT EXCEEDS 60 DEGREES F (ADJUSTABLE SETPOINT) THE STEAM CONTROL VALVES WILL BE INDEXED TO CLOSE.

WATER DETECTORS, LOCATED IN EVERY DHW TANK ROOM WILL ALARM WHEN FLOOD CONDITIONS OCCUR.

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	Sequence Of Operations As-Builts							
	REFERENCE DRAWING	NO.	REVISION/LOCATION		ECN	DATE	BY	
Sales Engineer	Project Manager	Application Engineer	DRAWN		APPROVED			
	MT		BY	DATE	BY	DATE		
Project Title		Branch Information		CONTRACT NUMBER				
HABC Douglass Homes				Johnson Controls, Inc. 60 Loveton Circle, Sparks MD 21152 - 0889 Phone: 410-584-1160 Fax: 410-472-4928				
				4052-0449				
				DRAWING NUMBER M-2				

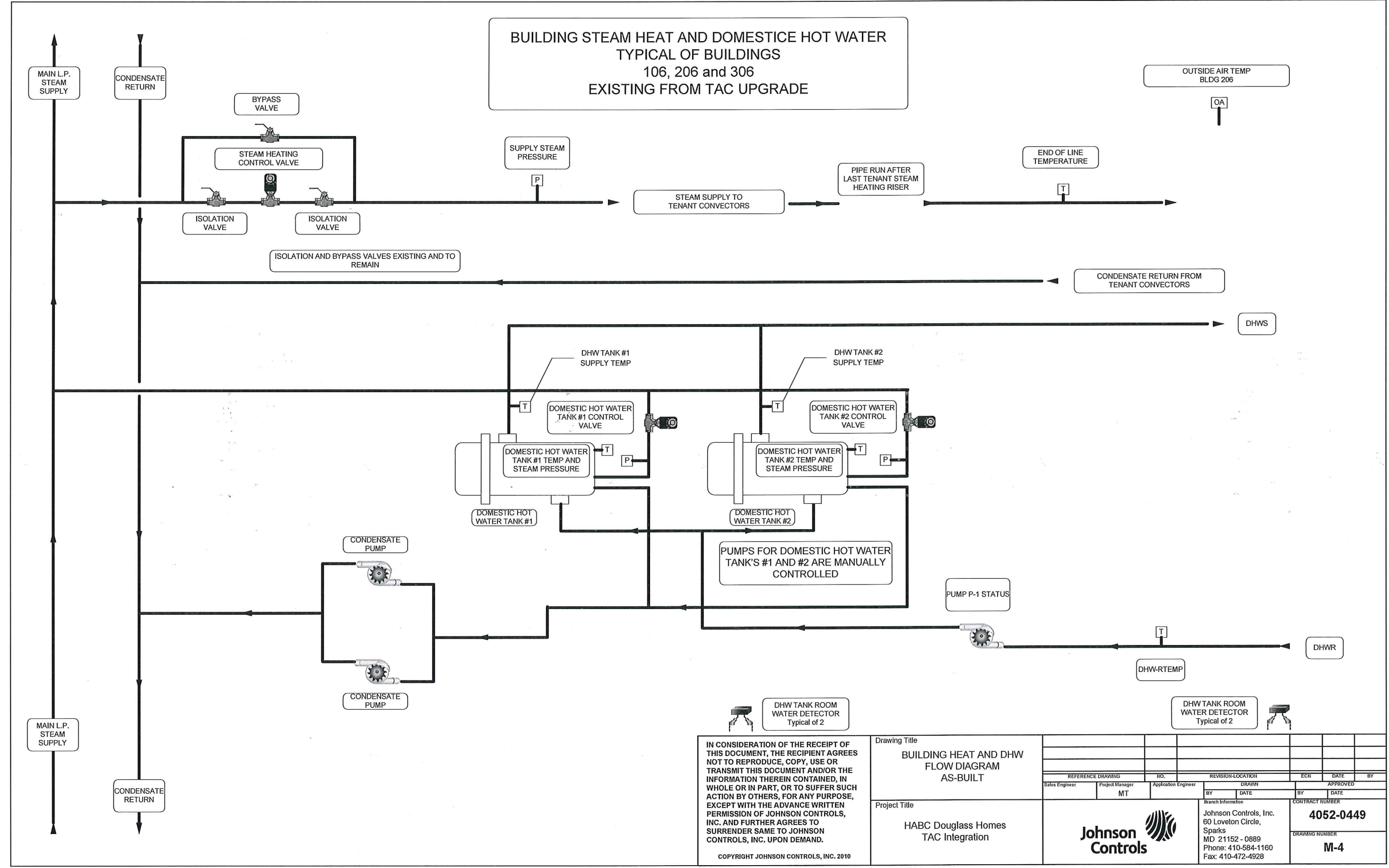
BUILDING STEAM HEAT TYPICAL OF BUILDINGS
101-105, 107-112, 201-205, 207-213, 301-305 and 307-312
EXISTING FROM TAC UPGRADE



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Drawing Title		BUILDING HEAT		FLOW DIAGRAM		AS-BUILT					
Project Title		HABC Douglass Homes		TAC Integration							
Sales Engineer		Project Manager		Application Engineer		Branch Information		CONTRACT NUMBER			
MT						Johnson Controls, Inc. 60 Loveton Circle, Sparks MD 21152 - 0889 Phone: 410-584-1160 Fax: 410-472-4928		4052-0449			
						DRAWINGS NUMBER		M-3			



 DHW TANK ROOM WATER DETECTOR Typical of 2		 DHW TANK ROOM WATER DETECTOR Typical of 2											
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	BUILDING HEAT AND DHW FLOW DIAGRAM AS-BUILT												
		REFERENCE DRAWING		NO.		REVISION-LOCATION		ECN		DATE		BY	
		Sales Engineer		Project Manager		Application Engineer		DRAWN		APPROVED			
Project Title	MT				BY		DATE		BY		DATE		
HABC Douglass Homes TAC Integration		Johnson Controls 		Branch Information		Johnson Controls, Inc. 60 Loveton Circle, Sparks MD 21152 - 0889 Phone: 410-584-1160 Fax: 410-472-4928				CONTRACT NUMBER			
								4052-0449					
								DRAWING NUMBER					
								M-4					

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE1	Zone 1	Building 101	HWS Temp at End		AI	1	AI-1
DouglassNCE1	Zone 1	Building 101	Steam Pressure		AI	2	AI-2
DouglassNCE1	Zone 1	Building 101	D101_1 STEAM VALVE		AO	1	AO-1
DouglassNCE1	Zone 1	Building 101	D101_1 STEAM VALVE E		BV	1	BV-1
DouglassNCE1	Zone 1	Building 101	D101_1 LOOP ACTION		BV	2	BV-2
DouglassNCE1	Zone 1	Building 101	D101_1 HWS TEMP END		AV	1	AV-1
DouglassNCE1	Zone 1	Building 101	D101_1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE1	Zone 1	Building 101	D101_1 DEFAULT SETPO		AV	4	AV-4
DouglassNCE1	Zone 1	Building 101	D101_1 STEAM PSI SP		AV	3	AV-3
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE1	Zone 1	Building 102	HWS-T	Pipe 1 Temperature	AI	9341	HWS-T
DouglassNCE1	Zone 1	Building 102	STM-P	Steam Pressure	AI	1288	STM-P
DouglassNCE1	Zone 1	Building 102	Heating Valve SL-O	0% Closed = 100% Open	AO	10260	Heating Valve SL-O
DouglassNCE1	Zone 1	Building 102	Heating Valve SLP-SP	Sideloop Pressure Setpoint	AV	10263	Heating Valve SLP-SP
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE1	Zone 1	Building 103	HWS Temp at End		AI	1	AI-1
DouglassNCE1	Zone 1	Building 103	Steam Pressure		AI	2	AI-2
DouglassNCE1	Zone 1	Building 103	D103_1 STEAM VALVE		AO	1	AO-1
DouglassNCE1	Zone 1	Building 103	D103_1 STEAM VALVE E		BV	1	BV-1
DouglassNCE1	Zone 1	Building 103	D103_1 LOOP ACTION		BV	2	BV-2
DouglassNCE1	Zone 1	Building 103	D103_1 HWS TEMP END		AV	1	AV-1
DouglassNCE1	Zone 1	Building 103	D103_1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE1	Zone 1	Building 103	D103_1 STEAM PSI SP		AV	3	AV-3
DouglassNCE1	Zone 1	Building 103	D103_1 DEFAULT SETPO		AV	4	AV-4

REVISION INFORMATION	Drawing Title								
	HABC DOUGLASS BUILDINGS 101-103								
NUMBER									
DATE	01/07/15								
TIME									
FILE NAME									
Project Title			HABC DOUGLASS POINTS LIST				Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982		CONTRACT NUMBER 4052-0449 DRAWING NUMBER M-5

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE1	Zone 1	Building 104	HWS Temp at End		AI	1	AI-1
DouglassNCE1	Zone 1	Building 104	Steam Pressure		AI	2	AI-2
DouglassNCE1	Zone 1	Building 104	D104 1 STEAM VALVE		AO	1	AO-1
DouglassNCE1	Zone 1	Building 104	D104 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE1	Zone 1	Building 104	D104 1 LOOP ACTION		BV	2	BV-2
DouglassNCE1	Zone 1	Building 104	D104 1 HWS TEMP END		AV	1	AV-1
DouglassNCE1	Zone 1	Building 104	D104 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE1	Zone 1	Building 104	D104 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE1	Zone 1	Building 104	D104 1 DEFAULT SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE1	Zone 1	Building 105	HWS Temp at End		AI	1	AI-1
DouglassNCE1	Zone 1	Building 105	Steam Pressure		AI	2	AI-2
DouglassNCE1	Zone 1	Building 105	D105 1 STEAM VALVE		AO	1	AO-1
DouglassNCE1	Zone 1	Building 105	D105 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE1	Zone 1	Building 105	D105 1 LOOP ACTION		BV	2	BV-2
DouglassNCE1	Zone 1	Building 105	D105 1 HWS TEMP END		AV	1	AV-1
DouglassNCE1	Zone 1	Building 105	D105 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE1	Zone 1	Building 105	D105 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE1	Zone 1	Building 105	D105 1 DEFAULT SETPO		AV	4	AV-4

REVISION INFORMATION	Drawing Title										
	HABC DOUGLASS BUILDINGS 104-105										
NUMBER											
DATE	01/07/15										
TIME											
FILE NAME											
Project Title			HABC DOUGLASS POINTS LIST						Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982		
									CONTRACT NUMBER 4052-0449		
									DRAWING NUMBER M-6		

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE1	Zone 1	Building 106	HWS Temp at End		AI	1	AI-1
DouglassNCE1	Zone 1	Building 106	Steam Pressure		AI	2	AI-2
DouglassNCE1	Zone 1	Building 106	D106 1 STEAM VALVE		AO	1	AO-1
DouglassNCE1	Zone 1	Building 106	D106 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE1	Zone 1	Building 106	D106 1 LOOP ACTION		BV	2	BV-2
DouglassNCE1	Zone 1	Building 106	D106 1 HWS TEMP END		AV	1	AV-1
DouglassNCE1	Zone 1	Building 106	D106 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE1	Zone 1	Building 106	D106 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE1	Zone 1	Building 106	D106 1 DEFAULT SETPO		AV	4	AV-4
DouglassNCE1	Zone 1	Building 106 DHW	DHW Tank 2 Steam Pressure	DHW Tank 2 Steam Pressure	AI		DHW Tank 2 Steam Pressure
DouglassNCE1	Zone 1	Building 106 DHW	DHW Tank 2 Supply Temp	DHW Tank 2 Supply Temperature	AI		DHW Tank 2 Supply Temp
DouglassNCE1	Zone 1	Building 106 DHW	DHW Tank 2 Temperature	DHW Tank 2 Temperature	AI		DHW Tank 2 Temperature
DouglassNCE1	Zone 1	Building 106 DHW	DHW TANK2 VALVE CMD	DHW Tank #2 Valve Command	AO		DHW TANK2 VALVE CMD
DouglassNCE1	Zone 1	Building 106 DHW	High Water Alarm #1	High Water Alarm #1	BI		High Water Alarm 1
DouglassNCE1	Zone 1	Building 106 DHW	High Water Alarm #2	High Water Alarm #2	BI		High Water Alarm 2
DouglassNCE1	Zone 1	Building 106 DHW	Hot water setpoint	CS Input (Float)	AV		hot water setpoint
DouglassNCE1	Zone 1	Building 106 DHW	SYSTEM-EN	System Enable	BV		SYSTEM-EN
DouglassNCE1	Zone 1	Building 106 DHW	TUNING-RESET	Application Tuning Reset	BV		TUNING-RESET
DouglassNCE1	Zone 1	Building 106 DHW	DHW Tank #1 Control		AI	1	AI-1
DouglassNCE1	Zone 1	Building 106 DHW	DHW Supply Steam Pre		AI	2	AI-2
DouglassNCE1	Zone 1	Building 106 DHW	DHW Supply Temperatu		AI	4	AI-4
DouglassNCE1	Zone 1	Building 106 DHW	DHW Return Temperatu		AI	5	AI-5
DouglassNCE1	Zone 1	Building 106 DHW	D106 2 DHW1 VALVE		AO	1	AO-1
DouglassNCE1	Zone 1	Building 106 DHW	DHW Pump (P-1) Statu		BI	3	BI-3
DouglassNCE1	Zone 1	Building 106 DHW	D106 2 DHW1 TANK TEM		AV	1	AV-1
DouglassNCE1	Zone 1	Building 106 DHW	D106 2 DHW1 STEAM PS		AV	2	AV-2
DouglassNCE1	Zone 1	Building 106 DHW	D106 2 DHW1 SUPPLY T		AV	5	AV-5
DouglassNCE1	Zone 1	Building 106 DHW	D106 2 DHW1 RETURN T		AV	6	AV-6
DouglassNCE1	Zone 1	Building 106 DHW	D106 2 DHW1 SP		AV	7	AV-7
DouglassNCE1	Zone 1	Building 106 DHW	D106 2 DHW1 DEFAULT		AV	8	AV-8
DouglassNCE1	Zone 1	Building 106 DHW	D106 2 DHW1 TEMP L 2		AV	11	AV-11
DouglassNCE1	Zone 1	Building 106 DHW	D106 2 DHW1 TEMP L 1		AV	12	AV-12

REVISION INFORMATION NUMBER DATE 01/07/15 TIME FILE NAME	Drawing Title									
	HABC DOUGLASS BUILDINGS 106									
Project Title		REFERENCE DRAWING Sales Engineer Project Manager Application Engineer		NO. REVISION/LOCATION		ECN DATE		BY DATE		
HABC DOUGLASS POINTS LIST				Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982		4052-0449 CONTRACT NUMBER		M-7 DRAWING NUMBER		

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE1	Zone 1	Building 107	HWS Temp at End		AI	1	AI-1
DouglassNCE1	Zone 1	Building 107	Steam Pressure		AI	2	AI-2
DouglassNCE1	Zone 1	Building 107	D107 1 STEAM VALVE		AO	1	AO-1
DouglassNCE1	Zone 1	Building 107	D107 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE1	Zone 1	Building 107	D107 1 LOOP ACTION		BV	2	BV-2
DouglassNCE1	Zone 1	Building 107	D107 1 HWS TEMP END		AV	1	AV-1
DouglassNCE1	Zone 1	Building 107	D107 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE1	Zone 1	Building 107	D107 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE1	Zone 1	Building 107	D107 1 DEFAULT SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE1	Zone 1	Building 108	HWS-T	Pipe 1 Temperature	AI	9341	HWS-T
DouglassNCE1	Zone 1	Building 108	STM-P	Steam Pressure	AI	1288	STM-P
DouglassNCE1	Zone 1	Building 108	Heating Valve SL-O	Sideloop Output	AO	10260	Heating Valve SL-O
DouglassNCE1	Zone 1	Building 108	Heating Valve SLP-SP	Sideloop Pressure Setpoint	AV	10263	Heating Valve SLP-SP
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE1	Zone 1	Building 109	HWS Temp at End		AI	1	AI-1
DouglassNCE1	Zone 1	Building 109	Steam Pressure		AI	2	AI-2
DouglassNCE1	Zone 1	Building 109	D109 1 STEAM VALVE		AO	1	AO-1
DouglassNCE1	Zone 1	Building 109	D109 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE1	Zone 1	Building 109	D109 1 LOOP ACTION		BV	2	BV-2
DouglassNCE1	Zone 1	Building 109	D109 1 HWS TEMP END		AV	1	AV-1
DouglassNCE1	Zone 1	Building 109	D109 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE1	Zone 1	Building 109	D109 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE1	Zone 1	Building 109	D109 1 DEFAULT SETPO		AV	4	AV-4

REVISION INFORMATION	Drawing Title									
	HABC DOUGLASS BUILDINGS 107-109									
NUMBER			REFERENCE DRAWING		NO.	REVISION-LOCATION		ECN	DATE	BY
DATE			Sales Engineer	Project Manager	Application Engineer	DRAWN		APPROVED		
01/07/15						BY	DATE	BY	DATE	
TIME			Project Title				Branch Information		CONTRACT NUMBER	
			HABC DOUGLASS POINTS LIST				Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982		4052-0449	
FILE NAME									DRAWING NUMBER M-8	

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE1	Zone 1	Building 110	HWS Temp at End		AI	1	AI-1
DouglassNCE1	Zone 1	Building 110	Steam Pressure		AI	2	AI-2
DouglassNCE1	Zone 1	Building 110	D110 1 STEAM VALVE		AO	1	AO-1
DouglassNCE1	Zone 1	Building 110	D110 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE1	Zone 1	Building 110	D110 1 LOOP ACTION		BV	2	BV-2
DouglassNCE1	Zone 1	Building 110	D110 1 HWS TEMP END		AV	1	AV-1
DouglassNCE1	Zone 1	Building 110	D110 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE1	Zone 1	Building 110	D110 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE1	Zone 1	Building 110	D110 1 DEFAULT SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE1	Zone 1	Building 111	HWS Temp at End		AI	1	AI-1
DouglassNCE1	Zone 1	Building 111	Steam Pressure		AI	2	AI-2
DouglassNCE1	Zone 1	Building 111	D111 1 STEAM VALVE		AO	1	AO-1
DouglassNCE1	Zone 1	Building 111	D111 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE1	Zone 1	Building 111	D111 1 LOOP ACTION		BV	2	BV-2
DouglassNCE1	Zone 1	Building 111	D111 1 HWS TEMP END		AV	1	AV-1
DouglassNCE1	Zone 1	Building 111	D111 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE1	Zone 1	Building 111	D111 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE1	Zone 1	Building 111	D111 1 DEFAULT SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE1	Zone 1	Building 112	HWS Temp at End		AI	1	AI-1
DouglassNCE1	Zone 1	Building 112	Steam Pressure		AI	2	AI-2
DouglassNCE1	Zone 1	Building 112	D112 1 STEAM VALVE		AO	1	AO-1
DouglassNCE1	Zone 1	Building 112	D112 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE1	Zone 1	Building 112	D112 1 LOOP ACTION		BV	2	BV-2
DouglassNCE1	Zone 1	Building 112	D112 1 HWS TEMP END		AV	1	AV-1
DouglassNCE1	Zone 1	Building 112	D112 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE1	Zone 1	Building 112	D112 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE1	Zone 1	Building 112	D112 1 DEFAULT SETPO		AV	4	AV-4

REVISION INFORMATION	Drawing Title													
	HABC DOUGLASS BUILDINGS 110-112													
NUMBER														
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Project Title			HABC DOUGLASS POINTS LIST						Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982			CONTRACT NUMBER 4052-0449 DRAWING NUMBER M-9		

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE2	Zone 2	Building 201	HWS Temp at End		AI	1	AI-1
DouglassNCE2	Zone 2	Building 201	Steam Pressure		AI	2	AI-2
DouglassNCE2	Zone 2	Building 201	D201_1_STEAM_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	Building 201	D201_1_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	Building 201	D201_1_LOOP_ACTION		BV	2	BV-2
DouglassNCE2	Zone 2	Building 201	D201_1_HWS_TEMP_END		AV	1	AV-1
DouglassNCE2	Zone 2	Building 201	D201_1_STEAM_PRESSUR		AV	2	AV-2
DouglassNCE2	Zone 2	Building 201	D201_1_STEAM_PSI_SP		AV	3	AV-3
DouglassNCE2	Zone 2	Building 201	D201_1_DEFAULT_SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE2	Zone 2	Building 202	HWS Temp at End		AI	1	AI-1
DouglassNCE2	Zone 2	Building 202	Steam Pressure		AI	2	AI-2
DouglassNCE2	Zone 2	Building 202	D202_1_STEAM_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	Building 202	D202_1_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	Building 202	D202_1_LOOP_ACTION		BV	2	BV-2
DouglassNCE2	Zone 2	Building 202	D202_1_HWS_TEMP_END		AV	1	AV-1
DouglassNCE2	Zone 2	Building 202	D202_1_STEAM_PRESSUR		AV	2	AV-2
DouglassNCE2	Zone 2	Building 202	D202_1_STEAM_PSI_SP		AV	3	AV-3
DouglassNCE2	Zone 2	Building 202	D202_1_DEFAULT_SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE2	Zone 2	Building 203	HWS Temp at End		AI	1	AI-1
DouglassNCE2	Zone 2	Building 203	Steam Pressure		AI	2	AI-2
DouglassNCE2	Zone 2	Building 203	D203_1_STEAM_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	Building 203	D203_1_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	Building 203	D203_1_LOOP_ACTION		BV	2	BV-2
DouglassNCE2	Zone 2	Building 203	D203_1_HWS_TEMP_END		AV	1	AV-1
DouglassNCE2	Zone 2	Building 203	D203_1_STEAM_PRESSUR		AV	2	AV-2
DouglassNCE2	Zone 2	Building 203	D203_1_STEAM_PSI_SP		AV	3	AV-3
DouglassNCE2	Zone 2	Building 203	D203_1_DEFAULT_SETPO		AV	4	AV-4

REVISION INFORMATION	Drawing Title												
	HABC DOUGLASS BUILDINGS 201 - 203												
NUMBER													
DATE	01/07/15												
TIME													
FILE NAME													
Project Title			HABC DOUGLASS POINTS LIST						Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982			CONTRACT NUMBER 4052-0449 DRAWING NUMBER M-10	

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE2	Zone 2	Building 204	HWS Temp at End		AI	1	AI-1
DouglassNCE2	Zone 2	Building 204	Steam Pressure		AI	2	AI-2
DouglassNCE2	Zone 2	Building 204	D204_1_STEAM_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	Building 204	D204_1_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	Building 204	D204_1_LOOP_ACTION		BV	2	BV-2
DouglassNCE2	Zone 2	Building 204	D204_1_HWS_TEMP_END		AV	1	AV-1
DouglassNCE2	Zone 2	Building 204	D204_1_STEAM_PRESSUR		AV	2	AV-2
DouglassNCE2	Zone 2	Building 204	D204_1_STEAM_PSI_SP		AV	3	AV-3
DouglassNCE2	Zone 2	Building 204	D204_1_DEFAULT_SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE2	Zone 2	Building 205	HWS Temp at End		AI	1	AI-1
DouglassNCE2	Zone 2	Building 205	Steam Pressure		AI	2	AI-2
DouglassNCE2	Zone 2	Building 205	D205_1_STEAM_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	Building 205	D205_1_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	Building 205	D205_1_LOOP_ACTION		BV	2	BV-2
DouglassNCE2	Zone 2	Building 205	D205_1_HWS_TEMP_END		AV	1	AV-1
DouglassNCE2	Zone 2	Building 205	D205_1_STEAM_PRESSUR		AV	2	AV-2
DouglassNCE2	Zone 2	Building 205	D205_1_STEAM_PSI_SP		AV	3	AV-3
DouglassNCE2	Zone 2	Building 205	D205_1_DEFAULT_SETPO		AV	4	AV-4

REVISION INFORMATION	Drawing Title										
	HABC DOUGLASS BUILDINGS 204 - 205										
NUMBER											
DATE	01/07/15										
TIME											
FILE NAME											
Project Title			HABC DOUGLASS POINTS LIST						Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982		
									CONTRACT NUMBER 4052-0449		
									DRAWING NUMBER M-11		

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE2	Zone 2	Building 206	HWS Temp at End		AI	1	AI-1
DouglassNCE2	Zone 2	Building 206	Steam Pressure		AI	2	AI-2
DouglassNCE2	Zone 2	Building 206	D206_1_STEAM_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	Building 206	D206_1_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	Building 206	D206_1_LOOP_ACTION		BV	2	BV-2
DouglassNCE2	Zone 2	Building 206	D206_1_HWS_TEMP_END		AV	1	AV-1
DouglassNCE2	Zone 2	Building 206	D206_1_STEAM_PRESSUR		AV	2	AV-2
DouglassNCE2	Zone 2	Building 206	D206_1_STEAM_PSI_SP		AV	3	AV-3
DouglassNCE2	Zone 2	Building 206	D206_1_DEFAULT_SETPO		AV	4	AV-4
DouglassNCE2	Zone 2	Building 206 DHW	DHW Tank 2 Steam Pressure	DHW Tank 2 Steam Pressure	AI		DHW Tank 2 Steam Pressure
DouglassNCE2	Zone 2	Building 206 DHW	DHW Tank 2 Supply Temp	DHW Tank 2 Supply Temperature	AI		DHW Tank 2 Supply Temp
DouglassNCE2	Zone 2	Building 206 DHW	DHW Tank 2 Temperature	DHW Tank 2 Temperature	AI		DHW Tank 2 Temperature
DouglassNCE2	Zone 2	Building 206 DHW	OA-T	Outdoor Air Temperature	AI		OA-T
DouglassNCE2	Zone 2	Building 206 DHW	DHW_TANK2_VALVE CMD	DHW Tank #2 Valve Command	AO		DHW_TANK2_VALVE CMD
DouglassNCE2	Zone 2	Building 206 DHW	High Water Alarm #1	High Water Alarm #1	BI		High Water Alarm 1
DouglassNCE2	Zone 2	Building 206 DHW	High Water Alarm #2	High Water Alarm #2	BI		High Water Alarm 2
DouglassNCE2	Zone 2	Building 206 DHW	hot water setpoint	CS Input (Float)	AV		hot water setpoint
DouglassNCE2	Zone 2	Building 206 DHW	SYSTEM-EN	System Enable	BV		SYSTEM-EN
DouglassNCE2	Zone 2	Building 206 DHW	TUNING-RESET	Application Tuning Reset	BV		TUNING-RESET
DouglassNCE2	Zone 2	Building 206 DHW	DHW Tank#1 Control T		AI	1	AI-1
DouglassNCE2	Zone 2	Building 206 DHW	DHW Supply Steam Pre		AI	2	AI-2
DouglassNCE2	Zone 2	Building 206 DHW	DHW Supply Temperatu		AI	4	AI-4
DouglassNCE2	Zone 2	Building 206 DHW	DHW Return Temperatu		AI	5	AI-5
DouglassNCE2	Zone 2	Building 206 DHW	D206_2_DHW1_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	Building 206 DHW	DHW Pump (P-1) Statu		BI	3	BI-3
DouglassNCE2	Zone 2	Building 206 DHW	D206_2_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	Building 206 DHW	D206_2_DHW1_TEMP_L_2		BV	2	BV-2
DouglassNCE2	Zone 2	Building 206 DHW	D206_2_DHW1_PUMP1_ST		BV	3	BV-3
DouglassNCE2	Zone 2	Building 206 DHW	D206_2_DHW1_STEAM_2		BV	5	BV-5
DouglassNCE2	Zone 2	Building 206 DHW	D206_2_DHW1_TANK_TEM		AV	1	AV-1
DouglassNCE2	Zone 2	Building 206 DHW	D206_2_DHW1_STEAM_PS		AV	2	AV-2
DouglassNCE2	Zone 2	Building 206 DHW	D206_2_DHW1_SUPPLY_T		AV	5	AV-5
DouglassNCE2	Zone 2	Building 206 DHW	D206_2_DHW1_RETURN_T		AV	6	AV-6
DouglassNCE2	Zone 2	Building 206 DHW	D206_2_DHW1_SP		AV	7	AV-7
DouglassNCE2	Zone 2	Building 206 DHW	D206_2_DHW1_DEFAULT_		AV	8	AV-8
DouglassNCE2	Zone 2	Building 206 DHW	D206_2_DHW1_STEAM_SP		AV	9	AV-9

REVISION INFORMATION	Drawing Title									
	HABC DOUGLASS BUILDINGS 206									
NUMBER										
DATE	01/07/15									
TIME										
FILE NAME										
Project Title			HABC DOUGLASS POINTS LIST						Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982	
									CONTRACT NUMBER 4052-0449	
									DRAWING NUMBER M-12	

HwSys Name	Loop Zone	Building #	Name	Description	Obj Type	NetPt Addr	SwObj Name
DouglassNCE2	Zone 2	207	HWS Temp at End		AI	1	AI-1
DouglassNCE2	Zone 2	207	Steam Pressure		AI	2	AI-2
DouglassNCE2	Zone 2	207	D207_1_STEAM_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	207	D207_1_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	207	D207_1_LOOP_ACTION		BV	2	BV-2
DouglassNCE2	Zone 2	207	D207_1_HWS_TEMP_END		AV	1	AV-1
DouglassNCE2	Zone 2	207	D207_1_STEAM_PRESSUR		AV	2	AV-2
DouglassNCE2	Zone 2	207	D207_1_STEAM_PSI_SP		AV	3	AV-3
DouglassNCE2	Zone 2	207	D207_1_DEFAULT_SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Type	NetPt Addr	SwObj Name
DouglassNCE2	Zone 2	208	HWS Temp at End		AI	1	AI-1
DouglassNCE2	Zone 2	208	Steam Pressure		AI	2	AI-2
DouglassNCE2	Zone 2	208	D208_1_STEAM_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	208	D208_1_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	208	D208_1_LOOP_ACTION		BV	2	BV-2
DouglassNCE2	Zone 2	208	D208_1_HWS_TEMP_END		AV	1	AV-1
DouglassNCE2	Zone 2	208	D208_1_STEAM_PRESSUR		AV	2	AV-2
DouglassNCE2	Zone 2	208	D208_1_STEAM_PSI_SP		AV	3	AV-3
DouglassNCE2	Zone 2	208	D208_1_DEFAULT_SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Type	NetPt Addr	SwObj Name
DouglassNCE2	Zone 2	209	HWS Temp at End		AI	1	AI-1
DouglassNCE2	Zone 2	209	Steam Pressure		AI	2	AI-2
DouglassNCE2	Zone 2	209	D209_1_STEAM_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	209	D209_1_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	209	D209_1_LOOP_ACTION		BV	2	BV-2
DouglassNCE2	Zone 2	209	D209_1_HWS_TEMP_END		AV	1	AV-1
DouglassNCE2	Zone 2	209	D209_1_STEAM_PRESSUR		AV	2	AV-2
DouglassNCE2	Zone 2	209	D209_1_STEAM_PSI_SP		AV	3	AV-3
DouglassNCE2	Zone 2	209	D209_1_DEFAULT_SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Type	NetPt Addr	SwObj Name
DouglassNCE2	Zone 2	210	HWS Temp at End		AI	1	AI-1
DouglassNCE2	Zone 2	210	Steam Pressure		AI	2	AI-2
DouglassNCE2	Zone 2	210	D210_1_STEAM_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	210	D210_1_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	210	D210_1_LOOP_ACTION		BV	2	BV-2
DouglassNCE2	Zone 2	210	D210_1_HWS_TEMP_END		AV	1	AV-1
DouglassNCE2	Zone 2	210	D210_1_STEAM_PRESSUR		AV	2	AV-2
DouglassNCE2	Zone 2	210	D210_1_STEAM_PSI_SP		AV	3	AV-3
DouglassNCE2	Zone 2	210	D210_1_DEFAULT_SETPO		AV	4	AV-4

REVISION INFORMATION	Drawing Title									
NUMBER	HABC DOUGLASS BUILDINGS 207-210									
DATE	01/07/15									
TIME										
FILE NAME										
Project Title			HABC DOUGLASS POINTS LIST						Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982	
CONTRACT NUMBER			4052-0449			DRAWING NUMBER			M-13	

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE2	Zone 2	211	HWS Temp at End		AI	1	AI-1
DouglassNCE2	Zone 2	211	Steam Pressure		AI	2	AI-2
DouglassNCE2	Zone 2	211	D211_1_STEAM_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	211	D211_1_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	211	D211_1_LOOP_ACTION		BV	2	BV-2
DouglassNCE2	Zone 2	211	D211_1_HWS_TEMP_END		AV	1	AV-1
DouglassNCE2	Zone 2	211	D211_1_STEAM_PRESSUR		AV	2	AV-2
DouglassNCE2	Zone 2	211	D211_1_STEAM_PSI_SP		AV	3	AV-3
DouglassNCE2	Zone 2	211	D211_1_DEFAULT_SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE2	Zone 2	212	HWS Temp at End		AI	1	AI-1
DouglassNCE2	Zone 2	212	Steam Pressure		AI	2	AI-2
DouglassNCE2	Zone 2	212	D212_1_STEAM_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	212	D212_1_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	212	D212_1_LOOP_ACTION		BV	2	BV-2
DouglassNCE2	Zone 2	212	D212_1_HWS_TEMP_END		AV	1	AV-1
DouglassNCE2	Zone 2	212	D212_1_STEAM_PRESSUR		AV	2	AV-2
DouglassNCE2	Zone 2	212	D212_1_STEAM_PSI_SP		AV	3	AV-3
DouglassNCE2	Zone 2	212	D212_1_DEFAULT_SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE2	Zone 2	213	HWS Temp at End		AI	1	AI-1
DouglassNCE2	Zone 2	213	Steam Pressure		AI	2	AI-2
DouglassNCE2	Zone 2	213	D213_1_STEAM_VALVE		AO	1	AO-1
DouglassNCE2	Zone 2	213	D213_1_STEAM_VALVE_E		BV	1	BV-1
DouglassNCE2	Zone 2	213	D213_1_LOOP_ACTION		BV	2	BV-2
DouglassNCE2	Zone 2	213	D213_1_HWS_TEMP_END		AV	1	AV-1
DouglassNCE2	Zone 2	213	D213_1_STEAM_PRESSUR		AV	2	AV-2
DouglassNCE2	Zone 2	213	D213_1_STEAM_PSI_SP		AV	3	AV-3
DouglassNCE2	Zone 2	213	D213_1_DEFAULT_SETPO		AV	4	AV-4

REVISION INFORMATION	Drawing Title										
	HABC DOUGLASS BUILDINGS 211-213										
NUMBER											
DATE	01/07/15										
TIME											
FILE NAME											
Project Title			HABC DOUGLASS POINTS LIST						Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982		
									CONTRACT NUMBER 4052-0449		
									DRAWING NUMBER M-14		

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE3	Zone 3	301	HWS Temp at End		AI	1	AI-1
DouglassNCE3	Zone 3	301	Steam Pressure		AI	2	AI-2
DouglassNCE3	Zone 3	301	D301 1 STEAM VALVE		AO	1	AO-1
DouglassNCE3	Zone 3	301	D301 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE3	Zone 3	301	D301 1 LOOP ACTION		BV	2	BV-2
DouglassNCE3	Zone 3	301	D301 1 HWS TEMP END		AV	1	AV-1
DouglassNCE3	Zone 3	301	D301 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE3	Zone 3	301	D301 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE3	Zone 3	301	D301 1 DEFAULT SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE3	Zone 3	302	HWS Temp at End		AI	1	AI-1
DouglassNCE3	Zone 3	302	Steam Pressure		AI	2	AI-2
DouglassNCE3	Zone 3	302	D302 1 STEAM VALVE		AO	1	AO-1
DouglassNCE3	Zone 3	302	D302 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE3	Zone 3	302	D302 1 LOOP ACTION		BV	2	BV-2
DouglassNCE3	Zone 3	302	D302 1 HWS TEMP END		AV	1	AV-1
DouglassNCE3	Zone 3	302	D302 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE3	Zone 3	302	D302 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE3	Zone 3	302	D302 1 DEFAULT SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE3	Zone 3	303	HWS Temp at End		AI	1	AI-1
DouglassNCE3	Zone 3	303	Steam Pressure		AI	3	AI-3
DouglassNCE3	Zone 3	303	D303 1 STEAM VALVE		AO	1	AO-1
DouglassNCE3	Zone 3	303	D303 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE3	Zone 3	303	D303 1 LOOP ACTION		BV	2	BV-2
DouglassNCE3	Zone 3	303	D303 1 HWS TEMP END		AV	1	AV-1
DouglassNCE3	Zone 3	303	D303 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE3	Zone 3	303	D303 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE3	Zone 3	303	D303 1 DEFAULT SETPO		AV	4	AV-4

REVISION INFORMATION	Drawing Title										
	HABC DOUGLASS BUILDINGS 301-303										
NUMBER											
DATE	01/07/15										
TIME											
FILE NAME											
Project Title			HABC DOUGLASS POINTS LIST						Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982		
									CONTRACT NUMBER 4052-0449		
									DRAWING NUMBER M-15		

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE3	Zone 3	304	HWS Temp at End		AI	1	AI-1
DouglassNCE3	Zone 3	304	Steam Pressure		AI	2	AI-2
DouglassNCE3	Zone 3	304	D304 1 STEAM VALVE		AO	1	AO-1
DouglassNCE3	Zone 3	304	D304 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE3	Zone 3	304	D304 1 LOOP ACTION		BV	2	BV-2
DouglassNCE3	Zone 3	304	D304 1 HWS TEMP END		AV	1	AV-1
DouglassNCE3	Zone 3	304	D304 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE3	Zone 3	304	D304 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE3	Zone 3	304	D304 1 DEFAULT SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE3	Zone 3	305	HWS Temp at End		AI	1	AI-1
DouglassNCE3	Zone 3	305	Steam Pressure		AI	2	AI-2
DouglassNCE3	Zone 3	305	D305 1 STEAM VALVE		AO	1	AO-1
DouglassNCE3	Zone 3	305	D305 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE3	Zone 3	305	D305 1 LOOP ACTION		BV	2	BV-2
DouglassNCE3	Zone 3	305	D305 1 HWS TEMP END		AV	1	AV-1
DouglassNCE3	Zone 3	305	D305 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE3	Zone 3	305	D305 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE3	Zone 3	305	D305 1 DEFAULT SETPO		AV	4	AV-4

REVISION INFORMATION	Drawing Title									
	HABC DOUGLASS BUILDINGS 304-305									
NUMBER										
DATE	01/07/15									
TIME										
FILE NAME										
Project Title			HABC DOUGLASS POINTS LIST				Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982		CONTRACT NUMBER 4052-0449	
									DRAWING NUMBER M-16	

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE3	Zone 3	306	HWS Temp at End		AI	1	AI-1
DouglassNCE3	Zone 3	306	Steam Pressure		AI	2	AI-2
DouglassNCE3	Zone 3	306	D306 1 STEAM VALVE		AO	1	AO-1
DouglassNCE3	Zone 3	306	D306 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE3	Zone 3	306	D306 1 LOOP ACTION		BV	2	BV-2
DouglassNCE3	Zone 3	306	D306 1 HWS TEMP END		AV	1	AV-1
DouglassNCE3	Zone 3	306	D306 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE3	Zone 3	306	D306 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE3	Zone 3	306	D306 1 DEFAULT SETPO		AV	4	AV-4
DouglassNCE3	Zone 3	306 DHW	DHW Tank#1 Control T		AI	1	AI-1
DouglassNCE3	Zone 3	306 DHW	DHW Supply Steam Pre		AI	2	AI-2
DouglassNCE3	Zone 3	306 DHW	DHW Supply Temperatu		AI	3	AI-3
DouglassNCE3	Zone 3	306 DHW	D306 3 DHW2 VALVE		AO	1	AO-1
DouglassNCE3	Zone 3	306 DHW	Water Detector 1		BI	5	BI-5
DouglassNCE3	Zone 3	306 DHW	Water Detector 2		BI	6	BI-6
DouglassNCE3	Zone 3	306 DHW	D306 3 STEAM VALVE E		BV	1	BV-1
DouglassNCE3	Zone 3	306 DHW	D306 3 DHW2 TEMP L 1		BV	2	BV-2
DouglassNCE3	Zone 3	306 DHW	D306 3 DHW2 STEAM 2		BV	3	BV-3
DouglassNCE3	Zone 3	306 DHW	D306 3 DHW2 WATER 1		BV	5	BV-5
DouglassNCE3	Zone 3	306 DHW	D306 3 DHW2 WATER DE		BV	6	BV-6
DouglassNCE3	Zone 3	306 DHW	D306 3 DHW2 TANK TEM		AV	1	AV-1
DouglassNCE3	Zone 3	306 DHW	D306 3 DHW2 STEAM PS		AV	2	AV-2
DouglassNCE3	Zone 3	306 DHW	D306 3 DHW2 SUPPLY T		AV	3	AV-3
DouglassNCE3	Zone 3	306 DHW	D306 3 DHW2 SP		AV	7	AV-7
DouglassNCE3	Zone 3	306 DHW	D306 3 DHW2 DEFAULT		AV	8	AV-8
DouglassNCE3	Zone 3	306 DHW	D306 3 DHW2 STEAM SP		AV	9	AV-9

REVISION INFORMATION	Drawing Title									
	HABC DOUGLASS BUILDINGS 306-1									
NUMBER										
DATE	01/07/15									
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FILE NAME										
Project Title			HABC DOUGLASS POINTS LIST				Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982		CONTRACT NUMBER 4052-0449 DRAWING NUMBER M-17	

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE3	Zone 3	306 DHW	DHW Tank#1 Control T		AI	1	AI-1
DouglassNCE3	Zone 3	306 DHW	DHW Supply Steam Pre		AI	2	AI-2
DouglassNCE3	Zone 3	306 DHW	DHW Supply Temperatu		AI	4	AI-4
DouglassNCE3	Zone 3	306 DHW	DHW Return Temperatu		AI	5	AI-5
DouglassNCE3	Zone 3	306 DHW	D306 2 DHW1 VALVE		AO	1	AO-1
DouglassNCE3	Zone 3	306 DHW	DHW Pump (P-1) Statu		BI	3	BI-3
DouglassNCE3	Zone 3	306 DHW	D306 2 STEAM VALVE E		BV	1	BV-1
DouglassNCE3	Zone 3	306 DHW	D306 2 DHW1 TEMP L 2		BV	2	BV-2
DouglassNCE3	Zone 3	306 DHW	D306 2 DHW1 PUMP1 ST		BV	3	BV-3
DouglassNCE3	Zone 3	306 DHW	D306 2 DHW1 STEAM 2		BV	5	BV-5
DouglassNCE3	Zone 3	306 DHW	D306 2 DHW1 TANK TEM		AV	1	AV-1
DouglassNCE3	Zone 3	306 DHW	D306 2 DHW1 SUPPLY T		AV	5	AV-5
DouglassNCE3	Zone 3	306 DHW	D306 2 DHW1 RETURN T		AV	6	AV-6
DouglassNCE3	Zone 3	306 DHW	D306 2 DHW1 SP		AV	7	AV-7
DouglassNCE3	Zone 3	306 DHW	D306 2 DHW1 STEAM SP		AV	9	AV-9

REVISION INFORMATION	Drawing Title								
	HABC DOUGLASS BUILDINGS 306-2								
NUMBER									
DATE									
01/07/15									
TIME									
FILE NAME									
Project Title			HABC DOUGLASS POINTS LIST				Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982		CONTRACT NUMBER 4052-0449 DRAWING NUMBER M-18

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE3	Zone 3	307	HWS Temp at End		AI	1	AI-1
DouglassNCE3	Zone 3	307	Steam Pressure		AI	2	AI-2
DouglassNCE3	Zone 3	307	D307 1 STEAM VALVE		AO	1	AO-1
DouglassNCE3	Zone 3	307	D307 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE3	Zone 3	307	D307 1 LOOP ACTION		BV	2	BV-2
DouglassNCE3	Zone 3	307	D307 1 HWS TEMP END		AV	1	AV-1
DouglassNCE3	Zone 3	307	D307 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE3	Zone 3	307	D307 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE3	Zone 3	307	D307 1 DEFAULT SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE3	Zone 3	308	HWS Temp at End		AI	1	AI-1
DouglassNCE3	Zone 3	308	Steam Pressure		AI	2	AI-2
DouglassNCE3	Zone 3	308	D308 1 STEAM VALVE		AO	1	AO-1
DouglassNCE3	Zone 3	308	D308 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE3	Zone 3	308	D308 1 LOOP ACTION		BV	2	BV-2
DouglassNCE3	Zone 3	308	D308 1 HWS TEMP END		AV	1	AV-1
DouglassNCE3	Zone 3	308	D308 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE3	Zone 3	308	D308 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE3	Zone 3	308	D308 1 DEFAULT SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE3	Zone 3	309	HWS Temp at End		AI	1	AI-1
DouglassNCE3	Zone 3	309	Steam Pressure		AI	2	AI-2
DouglassNCE3	Zone 3	309	D309 1 STEAM VALVE		AO	1	AO-1
DouglassNCE3	Zone 3	309	D309 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE3	Zone 3	309	D309 1 LOOP ACTION		BV	2	BV-2
DouglassNCE3	Zone 3	309	D309 1 HWS TEMP END		AV	1	AV-1
DouglassNCE3	Zone 3	309	D309 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE3	Zone 3	309	D309 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE3	Zone 3	309	D309 1 DEFAULT SETPO		AV	4	AV-4

REVISION INFORMATION	Drawing Title									
	HABC DOUGLASS BUILDINGS 307-309									
NUMBER										
DATE	01/07/15									
TIME										
FILE NAME										
Project Title			HABC DOUGLASS POINTS LIST		Johnson Controls		Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982		CONTRACT NUMBER 4052-0449 DRAWING NUMBER M-19	

HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE3	Zone 3	310	HWS Temp at End		AI	1	AI-1
DouglassNCE3	Zone 3	310	Steam Pressure		AI	2	AI-2
DouglassNCE3	Zone 3	310	D310 1 STEAM VALVE		AO	1	AO-1
DouglassNCE3	Zone 3	310	D310 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE3	Zone 3	310	D310 1 LOOP ACTION		BV	2	BV-2
DouglassNCE3	Zone 3	310	D310 1 HWS TEMP END		AV	1	AV-1
DouglassNCE3	Zone 3	310	D310 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE3	Zone 3	310	D310 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE3	Zone 3	310	D310 1 DEFAULT SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE3	Zone 3	311	HWS Temp at End		AI	1	AI-1
DouglassNCE3	Zone 3	311	Steam Pressure		AI	2	AI-2
DouglassNCE3	Zone 3	311	D311 1 STEAM VALVE		AO	1	AO-1
DouglassNCE3	Zone 3	311	D311 1 STEAM VALVE E		BV	1	BV-1
DouglassNCE3	Zone 3	311	D311 1 LOOP ACTION		BV	2	BV-2
DouglassNCE3	Zone 3	311	D311 1 HWS TEMP END		AV	1	AV-1
DouglassNCE3	Zone 3	311	D311 1 STEAM PRESSUR		AV	2	AV-2
DouglassNCE3	Zone 3	311	D311 1 STEAM PSI SP		AV	3	AV-3
DouglassNCE3	Zone 3	311	D311 1 DEFAULT SETPO		AV	4	AV-4
HwSys Name	Loop Zone	Building #	Name	Description	Obj Typ	NetPt Addr	SwObj Name
DouglassNCE3	Zone 3	312	Heating Valve SL-O	0% Closed = 100% Open	AO	10260	Heating Valve SL-O
DouglassNCE3	Zone 3	312	Heating Valve SLP-SP	Sideloop Pressure Setpoint	AV	10263	Heating Valve SLP-SP
DouglassNCE3	Zone 3	312	HWS-T	Pipe 1 Temperature	AI	9341	HWS-T
DouglassNCE3	Zone 3	312	STM-P	Steam Pressure	AI	1288	STM-P

REVISION INFORMATION	Drawing Title										
	HABC DOUGLASS BUILDINGS 310-312										
NUMBER											
DATE	01/07/15										
TIME											
FILE NAME											
Project Title			HABC DOUGLASS POINTS LIST						Branch Information Johnson Controls Inc. 60 Loveton Circle Sparks MD 21152 Phone: 410-584-1160 Fax: 410-472-4982		
									CONTRACT NUMBER 4052-0449		
									DRAWING NUMBER M-20		