

GENERAL NOTES

—THIS DRAWING SHOWS ONLY THOSE CONNECTIONS REQUIRED TO PROPERLY INSTALL THE FOOD SERVICE EQUIPMENT FURNISHED BY THE FOOD SERVICE EQUIPMENT CONTRACTOR (FSEC) OR DIRECTLY CONNECTED TO THE OPERATION OF THE FOOD AND BEVERAGE FACILITY. IT DOES NOT SHOW RESTROOM, LIGHT FIXTURES, OR HEATING CONNECTIONS, ETC. AS THESE ARE TO BE FOUND ON THE ARCHITECTURAL PLANS, FURNISHED BY OTHERS. SIZES SHOWN FOR CUSTOMER AND EMPLOYEE RESTROOMS TO BE VERIFIED BY OTHER CONTRACTORS AND INSTALLED TO MEET ALL CURRENT LOCAL, STATE AND FEDERAL CODES.

—THESE CONNECTIONS SHOULD BE STUBBED IN AND ALLOWANCES MUST BE MADE FOR VALVES, TRAPS, L'S, T'S ETC. FURNISHED BY OTHER CONTRACTORS.

—IF THE SPOT IS MARKED "BT" (BRANCH TO) THE SPOT INDICATES WHERE THE STUB-IN SHOULD TERMINATE OR BE CAPPED SO IT CAN BE BRANCHED TO CONNECTION POINT IN FIXTURE AT TIME OF FINAL CONNECTION.

—THE EQUIPMENT FURNISHED BY THE FSEC SHALL BE DELIVERED, UNCRATED, ERECTED AND SET IN PLACE READY TO RECEIVE ALL ELECTRICAL AND MECHANICAL CONNECTIONS BY OTHER CONTRACTORS UNLESS OTHERWISE QUOTED TO THE OWNER.

—THE MECHANICAL AND ELECTRICAL CONTRACTORS SHALL FURNISH ALL NECESSARY LABOR AND MATERIALS INCLUDING SWITCHES, PLUG-IN RECEPTACLES, WIRING, PIG-TAILS, PLUGS, CORDS, DISCONNECT SWITCHES, INTER-WIRING, FLOOR DRAINS, FLOOR SINKS, SAFE WASTE SINKS, GREASE TRAPS, STEAM TRAPS, PRESSURE REDUCING VALVES, SHUT-OFF VALVES, PRESSURE TYPE WATER VACUUM BREAKERS, PIPING AND ALL FITTINGS NECESSARY FOR THE OPERATION OF THE EQUIPMENT SHOWN ON THE DRAWINGS AT NO COST TO THE FSEC.

—Any existing exhaust hood system(s) marked as "existing" and/or "reused" are shown for reference purposes only. It is the responsibility of the owner and respective contractors to evaluate the existing hood system(s) and verify that all components and material are in approved working condition per manufacture specification for correct operation while complying with all national, state and local codes and ordinances.

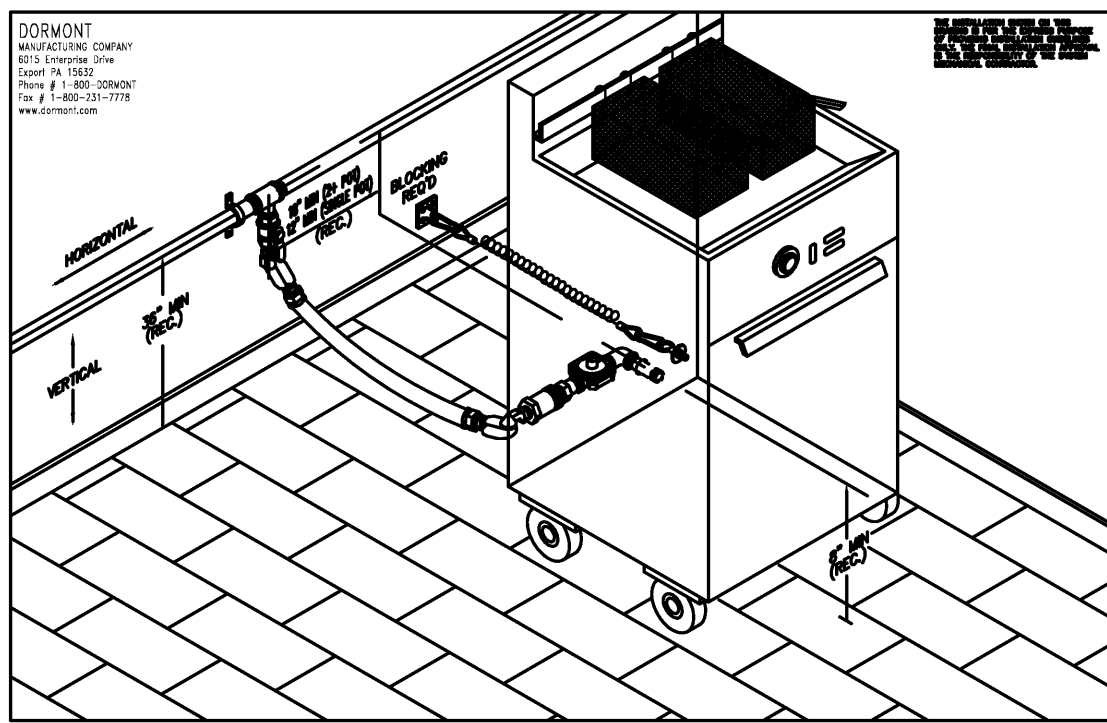
—Any existing equipment that is marked as "existing" and/or "reused" are shown for references purposes only. All utility information and dimensions are the responsibility of the owner and respective contractors and must be verified prior to the reinstall of any of "existing" and/or "reused" equipment. All "existing" and/or "reused" equipment and their utilities must be installed and comply with manufacture specification for correct operation while following all national, state and local codes and ordinances.

SYMBOLS & ABBREVIATIONS LEGEND

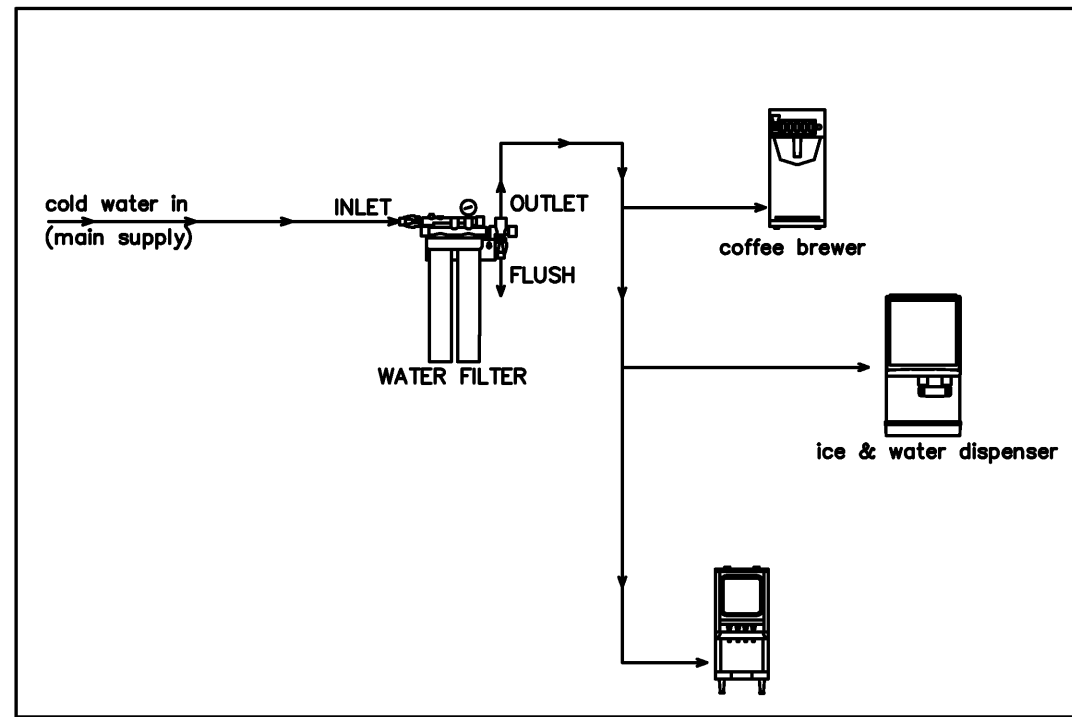
HW	●	HOT WATER
CW	●	COLD WATER
W	○	WASTE — DIRECT CONNECTION
IW	○	INDIRECT WASTE DRAIN
HO	⊙	HUB OUTLET
FD	□	FLOOR DRAIN
FTFD	□	FUNNEL TYPE FLOOR DRAIN
SWS	⊠	SAFE WASTE SINK 1" A.F.F.
GT	⊠	GREASE TRAP
G	+	GAS
ECC	▼	ELECTRICAL CONDUIT CONNECTION
DR	⊠	DUPLEX RECEPTACLE
SPO	⊠	SPECIAL PLUG OUTLET
LIGHT	⊠	LIGHT
SW	⊠	SWITCH
SS	○	STEAM SUPPLY
SR	⊠	STEAM RETURN
SU	⊠	STUB UP
A.F.F.	⊠	ABOVE FINISHED FLOOR
D.F.A.	⊠	DROP FROM ABOVE
BTU	⊠	BRITISH THERMAL UNIT
C.F.M.	⊠	CUBIC FEET PER MIN.
BT	⊠	BRANCH TO
KW	⊠	KILOWATT
HP	⊠	HORSE POWER
PH	⊠	PHASE
AMP	⊠	AMPERE
GC	⊠	GENERAL CONTRACTOR
MC	⊠	MECHANICAL CONTRACTOR
PC	⊠	PLUMBING CONTRACTOR
EC	⊠	ELECTRICAL CONTRACTOR
FSEC	⊠	FOODSERVICE EQUIPMENT CONTRACTOR

MECHANICAL NOTES

- MC = MECHANICAL CONTRACTOR
PC = PLUMBING CONTRACTOR
- MC & PC TO VERIFY REQUIREMENTS FOR EQUIPMENT NOT SUPPLIED BY F.S.E.C.
- MECHANICAL ENGINEER TO VERIFY IF DRAIN WATER TEMPERING KIT IS REQUIRED FOR FOOD SERVICE EQUIPMENT THAT HAS A DISCHARGE ABOVE 140 F. IF REQUIRED, A 1/2" COLD WATER LINE WILL BE NECESSARY FOR DRAIN WATER TEMPERING KIT.
- PC TO COORDINATE WITH F.S.E.C. AND INSTALL AUTOMATIC GAS SHUT OFF VALVE (FURNISHED BY FSEC) IN A 1/2" REMOVABLE SECTION OF PIPE UP THE MAIN FOOD SERVICE EQUIPMENT GAS SUPPLY LINE AS CLOSE AS POSSIBLE TO THE COOKING EQUIPMENT. THE AUTOMATIC GAS SHUT OFF VALVE IS TO BE IN AN ACCESSIBLE AREA ABOVE A CUPBOARD CEILING. GENERAL CONTRACTOR IS TO PROVIDE ACCESS PANELS AS REQUIRED FOR THE AUTOMATIC GAS SHUT OFF VALVE. (NOT APPROVED IF COILING AREA BEING USED AS A RETURN AIR PLenum) TO MEET ALL CODE REQUIREMENTS.
- MC TO VERIFY ALL VENTILATION AND DUCT WORK THAT IS REQUIRED.
- ALL UTILITIES SHOWN WITH SYMBOLS IDENTIFIED ON WALL TO BE CONCEALED IN WALLS. DO NOT STUB OUT OF FLOORS AND RUN EXPOSED ON WALLS.
- UTILITIES, SWITCHES, ETC., NOT SHOWN ON THIS PLAN FOR EXHAUST FANS, MAKE-UP AIR UNITS, ETC. TO BE IDENTIFIED WITH ARCHITECTURAL DRAWINGS.
- OWNER & CONTRACTORS SHALL VERIFY ALL EXISTING DIMENSIONS, EQUIPMENT SIZES, AND CONDITIONS PRIOR TO DIMENSIONING ANY WORK. ALL EXISTING EQUIPMENT SHOWN ON THE DRAWINGS ARE USED AS GUIDELINES FROM INFORMATION PROVIDED AND MUST BE VERIFIED.



DETAIL #2
TYPICAL INSTALLATION FOR COUNTER-MOUNTED EQUIPMENT
USING DORMONT QUICK DISCONNECT KIT MODEL #1675KIT2S48
(REGULATOR & ELBOWS ARE NOT INCLUDED IN GAS CONNECTOR KIT)



HOT WATER REQUIREMENTS FOR EACH KITCHEN (FOODSERVICE AREAS ONLY)					
FIXTURE	QTY.	RISE - F'	GPM (EACH)	GPM (TOTAL)	BTU
20 x 20 sink	3	70	15	45	32,799
DRY SINKING	1	100	22.2	22.2	23,116
HAND SINKS	2	70	5	10	7,289
PRESSURE FAUCET	1	100	45	45	46,856
TOTALS			122.2	110,060	

NOTE: ALL WATERING TEMPERING VALVES REQUIRED TO BE FURNISHED BY MECHANICAL CONTRACTOR
HOT WATER REQUIREMENTS ARE CALCULATED AT 80% EFFICIENCY

MECHANICAL SCHEDULE

M1	HO
M2	FD
M3	12" X 12" SWS
M4	GT (SEE MECHANICAL NOTE #2)
M5	FTFD
M6	12" x 12" SWS (CAPABLE OF ACCOMMODATING 180+ DEGREE WATER) (SEE MECHANICAL NOTE #3)
M7	8" x 8" SWS
M8	8" x 8" SWS (CAPABLE OF ACCOMMODATING 180+ DEGREE WATER) (SEE MECHANICAL NOTE #3)
M9	NOT USED
M10	1/2" H & CW AND 1 1/2" W 1'-2" AFF BT BUILT-IN HAND SINK ITEM #6 (VERIFY-BY OTHERS)
M11	3/4" CW 1'-2" AFF BT WATER FILTER ITEM #11
M12	3/4" CW 1'-2" AFF BT WATER FILTER ITEM #11
M13	1/2" CW (3/8" CONNECTION) BRANCH FROM M-12 BT ICE & WATER DISPENSER ITEM #1
M14	3/4" W BT SWS (M 7) ICE & WATER DISPENSER ITEM #1
M15	1/2" CW (3/8" CONNECTION) BRANCH FROM M-12 BT JUICE MACHINE ITEM #2 (VERIFY- BY VENDOR)
M16	1/2" CW (3/8" CONNECTION) BRANCH FROM M-11 BT COFFEE BREWER ITEM #5 (VERIFY-BY VENDOR)
M17	1 1/2" W BT SWS (M 6) SOILED SINK IN COUNTER W/SINK ITEM #12 (VERIFY-BY VENDOR)
M18	(2) 1/2" W BT SWS (M 7) HOT FOOD WELLS ITEM #7
M19	1/2" H & CW SU BT ISLAND W/SINK ITEM #8 (VERIFY-BY OTHERS)
M20	1 1/2" W BT SWS (M 7) ISLAND W/SINK ITEM #8 (VERIFY-BY OTHERS)
M21	1/2" HW 1'-2" AFF BT PRE-RINSE ITEM #20
M22	1/2" CW 1'-2" AFF BT PRE-RINSE ITEM #20
M23	3/4" W BT SWS (M 6) UNDERCOUNTER DISHMACHINE ITEM #13
M24	3/4" HW 1'-2" AFF BT UNDERCOUNTER DISHMACHINE ITEM #13
M25	1 1/2" W BT SWS (M 7) COUNTER W/SINK ITEM #12 (VERIFY-BY VENDOR)
M26	1/2" H & CW 1'-2" AFF BT COUNTER W/SINK ITEM #12 (VERIFY-BY VENDOR)
M27	3/4" G 318,000 BTU 1'-6" AFF BT RANGE W/GRIDDLE ITEM #18
M28	NOT USED
M29	NOT USED
M30	3/4" CW 1'-2" AFF BT WATER FILTER ITEM #28
M31	1/2" H & CW AND 1 1/2" W 1'-2" AFF BT BUILT-IN HAND SINK ITEM #35 (VERIFY-BY OTHERS)
M32	3/4" CW 1'-2" AFF BT WATER FILTER ITEM #29
M33	1/2" CW (3/8" CONNECTION) BRANCH FROM M-32 BT ICE & WATER DISPENSER ITEM #30
M34	3/4" W BT SWS (M 7) ICE & WATER DISPENSER ITEM #30
M35	1/2" CW (3/8" CONNECTION) BRANCH FROM M-32 BT JUICE MACHINE ITEM #31 (VERIFY- BY VENDOR)
M36	1/2" CW (3/8" CONNECTION) BRANCH FROM M-30 BT COFFEE BREWER ITEM #34 (VERIFY-BY VENDOR)
M37	1 1/2" W BT SWS (M 6) SOILED SINK IN COUNTER W/SINK ITEM #42 (VERIFY-BY VENDOR)
M38	(2) 1/2" W BT SWS (M 7) HOT FOOD WELLS ITEM #36
M39	1/2" H & CW SU BT ISLAND W/SINK ITEM #37 (VERIFY-BY VENDOR)
M40	1 1/2" W BT SWS (M 7) ISLAND W/SINK ITEM #37 (VERIFY-BY VENDOR)
M41	1/2" HW 1'-2" AFF BT PRE-RINSE ITEM #41
M42	1/2" CW 1'-2" AFF BT PRE-RINSE ITEM #41
M43	3/4" W BT SWS (M 6) UNDERCOUNTER DISHMACHINE ITEM #43
M44	3/4" HW 1'-2" AFF BT UNDERCOUNTER DISHMACHINE ITEM #43
M45	1 1/2" W BT SWS (M 7) COUNTER W/SINK ITEM #42 (VERIFY-BY VENDOR)
M46	1/2" H & CW 1'-2" AFF BT COUNTER W/SINK ITEM #42 (VERIFY-BY VENDOR)
M47	3/4" G 318,000 BTU 1'-6" AFF BT RANGE W/GRIDDLE ITEM #48

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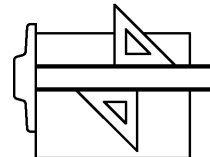
FOODSERVICE mechanical
requirements
02/21/12 ISSUED FOR BIDS

THORNAPPLE MANOR
HASTINGS, MICHIGAN

DRAWN BY: JMK
DATE: 02/21/12
CHECKED BY: wjz
SCALE: 1/4" =

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JOB NO#

2397

SHEET

FSE-2

SHEET 2 OF 5