

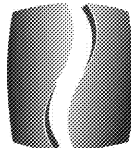
Order Plans

LEGEND	
SYMBOLS	DESCRIPTION
X1	DIFFUSER, GRILLE, REGISTER OR LOUVER TAG
X2	X1 = TYPE, X2 = CFM
☒	POSITIVE PRESSURE (AIR GOES OUT) DIFFUSER OR REGISTER, 4-WAY AIR PATTERN (UNLESS OTHERWISE NOTED)
☑	NEGATIVE PRESSURE (AIR GOES IN) GRILLE
→	POSITIVE PRESSURE AIRFLOW (TYP. SUPPLY)
←	NEGATIVE PRESSURE AIRFLOW (TYP. RETURN/EXHAUST)
	FLEXIBLE DUCT
⌈	MANUAL VOLUME DAMPER (MVD)
⌋	BACKDRAFT DAMPER (BDD)
↓	VERTICAL (TYP. WALL) FIRE DAMPER
↓SD	VERTICAL (TYP. WALL) COMBINATION FIRE/SMOKE DAMPER
→	HORIZONTAL (TYP. FLOOR/CEILING) FIRE DAMPER
→SD	HORIZONTAL (TYP. FLOOR/CEILING) COMBINATION FIRE/SMOKE DAMPER
⊖	THERMOSTAT
⊕	HUMIDISTAT
⊙	REMOTE TEMPERATURE SENSOR
▭	INTERNALLY LINED DUCT
○	DUCT UP
⊗	DUCT UP
⊘	DUCT DOWN
▭	SUPPLY DUCT
⊠	EQUIPMENT TYPE
⊠	EQUIPMENT NUMBER, WHERE A LETTER IS USED, THERE ARE MULTIPLE INSTANCES.

ABBREVIATIONS			
AFF	ABOVE FINISHED FLOOR	MA	MAKE-UP AIR
BDD	BACKDRAFT DAMPER	MAU	MAKE-UP AIR UNIT
AHU	AIR HANDLING UNIT	MAV	MANUAL AIR VENT
CO2	CARBON DIOXIDE	MBH	1,000 BTU PER HR
D	CONDENSATE DRAIN	MFCU	MINE FAN COIL UNIT
DB	DRY BULB	MHP	MINE HEAT PUMP
EA	EXHAUST AIR	MVD	MANUAL VOLUME DAMPER
EAT	ENTERING AIR TEMPERATURE	MC	MECHANICALLY CLEANED
EDH	ELECTRIC DUCT HEATER	NO	NOT TO BE OPENED
EF	EXHAUST FAN	OV	OUTSIDE
ESP	EXTERNAL STATIC PRESSURE	ORD	OPPOSED BLADE VOLUME DAMPER
EW	ELECTRIC WIRE	PIU	POWER INDUCTION UNIT
F	FIRE SEPARATION	RA	RETURN AIR
FCU	FAN COIL UNIT	RH	RELIEF HOOD
FD	FIRE DAMPER	RTU	ROOFTOP UNIT
FSD	COMBINATION FIRE/SMOKE DAMPER	SA	SUPPLY AIR
H	HUMIDISTAT	SP	STATIC PRESSURE
H	INTAKE HOOD	UC	UNDER CUT DOOR
J	LEAVING AIR TEMPERATURE	VAV	VARIABLE AIR VOLUME
LWT	LEAVING WATER TEMPERATURE	WB	WET BULB
M	MOTOR	WL	WALL LOUVER

SPECIFICATIONS	
<p>APPLICABLE CODES:</p> <p>INTERNATIONAL FIRE CODE (IFC), 2012 EDITION 2014 IFC GA AMENDMENTS INTERNATIONAL PLUMBING CODE (IPC), 2012 EDITION 2014 & 2015 IPC GA AMENDMENTS INTERNATIONAL MECHANICAL CODE (IMC), 2012 EDITION 2014 & 2015 IMC GA AMENDMENTS INTERNATIONAL FIRE GAS CODE (IFGC), 2012 EDITION 2014 & 2015 IFGC GA AMENDMENTS INTERNATIONAL ENERGY CONSERVATION CODE (IECC), 2009 EDITION 2011 SUPPLEMENTS AND AMENDMENTS 2012 SUPPLEMENTS AND AMENDMENTS</p> <p>SHOP DRAWINGS:</p> <p>SUBMIT SHOP DRAWINGS FOR REVIEW. PDF FILES PREFERRED. SHOP DRAWINGS SHALL BE BOUND INTO VOLUMES (FLESS, WITH EACH VOLUME FILE) CONTAINING ONE COPY OF ALL SHOP DRAWINGS. ALL SHOP DRAWINGS SHALL BE SUBMITTED SIMULTANEOUSLY; NO SHOP DRAWINGS WILL BE CHECKED UNTIL ALL HAVE BEEN SUBMITTED.</p> <p>SUBMITTALS SHALL BE SUPPORTED BY DESCRIPTIVE MATERIAL, SUCH AS CATALOG CUTS, DIAGRAMS, PERFORMANCE CURVES AND CHARTS PUBLISHED BY THE MANUFACTURER, TO SHOW CONFORMANCE TO SPECIFICATION AND DRAWING REQUIREMENTS; MODEL NUMBERS ALONE WILL NOT BE ACCEPTABLE. ALL LITERATURE SHALL CLEARLY INDICATE THE SPECIFIED MODEL NUMBER, DIMENSIONS, ARRANGEMENT, RATING AND CHARACTERISTICS OF THE PROPOSED EQUIPMENT. CAPACITIES AND RATINGS SHALL BE BASED ON CONDITIONS INDICATED OR SPECIFIED HEREIN. ANY DEVIATIONS FROM SPECIFIED EQUIPMENT (PARTICULARLY THOSE WHICH REQUIRE COORDINATION WITH OTHER TRADES) SHALL BE CLEARLY NOTED IN A CONCISE LIST ON A SEPARATE SHEET.</p> <p>TEST AND BALANCE:</p> <p>THE CONTRACTOR SHALL RETAIN THE SERVICES OF AN INDEPENDENT TEST AND BALANCE AGENCY THAT IS INDEPENDENT OF ANY CONTRACTOR, SUB-CONTRACTOR, OR MANUFACTURER TO PERFORM THE TESTING AND BALANCING AND PREPARE REPORTS TO THE GENERAL CONTRACTOR. THE INDEPENDENT TEST AND BALANCE AGENCY SHALL HAVE A CERTIFIED MEMBER OF THE NATIONAL ENVIRONMENTAL BALANCING BUREAU (NEBB).</p> <p>TEST AND BALANCE SHALL ALSO PROVIDE QUOTE TO PERFORM BALANCING FOR COMFORT SIX MONTHS AFTER THE SPACE IS OCCUPIED.</p> <p>P-TAR COM OR EQUIVALENT.</p> <p>GUARANTEE:</p> <p>GUARANTEE THAT EACH PIECE OF APPARATUS SHALL BE OF THE CUSTOMARY STANDARD AND QUALITY FURNISHED BY THE DESIGNER/MANUFACTURER FOR THAT CATALOG NUMBER.</p> <p>GUARANTEE THAT THE AIR SYSTEMS SHALL OPERATE WITHOUT AERODYNAMIC NOISE GENERATED FROM THE FACILITY INSTALLATION OF DUCT WORK OR ANY COMPONENT OF THE AIR DISTRIBUTION SYSTEM.</p> <p>GUARANTEE THAT ALL SYSTEMS AND COMPONENTS SHALL BE PROVIDED WITH ONE YEAR WARRANTY FROM THE TIME OF DATE OF SUBSTANTIAL COMPLETION. THE WARRANTY SHALL COVER ALL MATERIALS AND WORKMANSHIP. DURING THIS WARRANTY PERIOD, DEFECTS IN MATERIALS AND WORKMANSHIP SHALL BE CORRECTED BY REPAIR OR REPLACEMENT WITHOUT INCLURING ADDITIONS TO THE CONTRACT.</p> <p>GENERAL NOTES:</p> <p>REFER TO ARCHITECTURAL REFLECTED PLANS FOR EXACT LOCATION OF ALL CEILING MOUNTED EQUIPMENT.</p> <p>ALL DUCT DIMENSIONS INDICATED IN THE DOCUMENTS ARE INSIDE-CLEAR DIMENSIONS.</p> <p>PORTIONS OF DUCTWORK OR PIPING VISIBLE THROUGH GRILLES AND REGISTERS IN FINISHED AREAS SHALL BE FINISHED FLAT BLACK PAINT, INCLUDING BEHIND ALL GRILLES.</p> <p>ALL WIRING IN THE CEILING PLENUM SHALL BE IN PLENUM RATED CABLE.</p> <p>MOUNTING FRAME OF CEILING MOUNTED AIR DISTRIBUTION DEVICES SHALL BE COMPATIBLE WITH CEILING TYPE. REFER TO ARCHITECTURAL DRAWINGS FOR CEILING TYPE.</p> <p>FIRE SEPARATIONS MUST BE PROTECTED WHEN APPLICABLE.</p> <p>PROVIDE NEW STRAPS (MFRV 7 OR BETTER PER OWNER) FOR ALL APPLICABLE HVAC EQUIPMENT AT THE END OF CONSTRUCTION.</p> <p>MATERIAL IN PLENUM MUST MEET FIRE AND SMOKE SPREAD AS REQUIRED BY NFPA 90A.</p> <p>ALL ROOF PENETRATIONS TO BE 12" APART AND AT LEAST 12" AWAY FROM CURBS, WALLS, AND DRAIN SLOPS TO PROVIDE ROOFING CONTRACTOR WITH SUFFICIENT ACCESS FOR FLASHING EACH ROOF PENETRATION.</p> <p>SUBSTITUTIONS MUST BE APPROVED IN WRITING BY ARCHITECT PRIOR TO BID SUBMISSION.</p> <p>CONTRACTOR SHALL REVIEW ALL CONTRACT DOCUMENTS AND SHALL BE FAMILIAR WITH THE SCOPE AND REQUIREMENTS OF THIS PROJECT. ANY DISCREPANCIES OR LACK OF CLARITY IN THE DOCUMENTS SHALL BE IDENTIFIED TO THE ARCHITECT OR ENGINEER PRIOR TO THE SUBMISSION OF PRICING BIDS. WITH A SUBMITTED BID, CONTRACTOR IS ACCEPTING THESE DOCUMENTS AS SUFFICIENT DEFINITION OF THE SCOPE OF WORK, AND ANY ADDITIONAL COSTS BASED ON UNCLARITY OF CONTRACT DOCUMENTS WILL NOT BE CONSIDERED.</p> <p>THE CONTRACTOR SHALL REFERENCE THE FULL SET OF CONSTRUCTION DOCUMENTS DURING PRICING AND CONSTRUCTION FOR COORDINATION BETWEEN DISCIPLINES RELATIVE TO THE MECHANICAL SCOPE.</p>	


SPECIFICATIONS	
<p>DIFFUSERS, GRILLES, & REGISTERS:</p> <p>EGGCRATE GRILLE:</p> <p>RETURN GRILLES SHALL BE TITUS MODEL 508 FOR THE SIZES AND MOUNTING TYPES AS SHOWN ON THE PLANS AND OUTLET SCHEDULE. RETURN GRILLES MUST PROVIDE A FREE AREA OF AT LEAST 90%. OUTER BORDERS SHALL BE CONSTRUCTED OF HEAVY EXTRUDED ALUMINUM WITH A THICKNESS OF 0.040-0.050 INCH AND SHALL HAVE COUNTERSINK SCREW HOLES FOR A NEAT APPEARANCE. BORDER WIDTH SHALL BE 1/4 INCHES ON ALL SIDES AND SHALL BE INTERLOCKED AT THE FOUR CORNERS AND MECHANICALLY STAKED TO FORM A RIGID FRAME. CHOICE OF THREE SIZES OF ALUMINUM GRILLE: 1/2 X 1/2 X 1/2 INCH, 1/2 X 1/2 X 1 INCH, OR 1 X 1 X 1 INCH SHALL BE AVAILABLE.</p> <p>OPTIONAL OPPOSED-BLADE VOLUME DAMPER SHALL BE CONSTRUCTED OF HEAVY GAUGE STEEL OR ALUMINUM. DAMPER MUST BE OPERABLE FROM THE FACE OF THE GRILLE.</p> <p>DOUBLE DEFLECTION REGISTERS:</p> <p>ALUMINUM SUPPLY GRILLES SHALL BE OF THE SIZES AND MOUNTING TYPES SHOWN ON THE PLANS AND OUTLET SCHEDULE. THE DEFLECTION BLADES SHALL BE AVAILABLE PARALLEL TO THE LONG OR SHORT DIMENSION OF THE GRILLE OR REGISTER. CONSTRUCTION SHALL BE OF ALUMINUM WITH A 1/4-INCH WIDE BORDER ON ALL SIDES. SIZES 24 X 24 INCHES AND BELOW SHALL HAVE ROLL-FORMED BORDERS WITH A MINIMUM THICKNESS OF 0.032 INCH. SIZES 24 X 24 INCHES AND ABOVE SHALL BE CONSTRUCTED USING CONTINUOUS ALUMINUM EXTRUSIONS WITH A MINIMUM THICKNESS OF 0.040 THROUGH 0.050 INCH AND SHALL BE INTERLOCKED AT THE FOUR CORNERS AND MECHANICALLY STAKED TO FORM A RIGID FRAME. SCREWS SHALL BE COUNTERSUNK FOR A NEAT APPEARANCE.</p> <p>DEFLECTION BLADES SHALL BE CONTOURED TO A SPECIFICALLY DESIGNED AND TESTED CROSS-SECTION TO MEET PUBLISHED TEST PERFORMANCE. BLADES SHALL BE 1/4-INCH ON 1/4-INCH CENTERS. BLADES SHALL HAVE FRICTION POINTS ON THE SURFACE TO ALLOW INDIVIDUAL BLADE ADJUSTMENT WITHOUT LOSING STRENGTH. BLADES SHALL BE HELD THROUGH THE FRAME AND HELD TIGHT WITH STEEL TENSION WIRE INTERLOCKED TO THE FRAME ON BOTH ENDS OF EACH SIDE. FRICTION POINTS ARE NOT ACCEPTABLE.</p> <p>OPTIONAL OPPOSED BLADE VOLUME DAMPER SHALL BE CONSTRUCTED OF HEAVY GAUGE STEEL OR ALUMINUM. DAMPER MUST BE OPERABLE FROM THE FACE OF THE GRILLE.</p> <p>THE GRILLE FINISH SHALL BE #26 WHITE. THE FINISH SHALL BE AN ANODIC ACRYLIC PAINT, BAKED AT 315°F FOR 30 MINUTES. THE FINISH SHALL BE HD TO #. THE PAINT MUST PASS A 100-HOUR ASTM B117 CORROSIVE ENVIRONMENTS SALT SPRAY TEST WITHOUT CREPEAGE, BLISTERING OR DETERIORATION OF FILM. THE PAINT MUST PASS A 250-HOUR ASTM D870 WATER IMMERSION TEST. THE PAINT MUST ALSO PASS THE ASTM D2794 REVERSE IMPACT CRACKING TEST WITH A 50-INCH POUND FORCE APPLIED.</p> <p>THE MANUFACTURER SHALL PROVIDE PUBLISHED PERFORMANCE DATA FOR THE GRILLE. THE DATA SHALL BE TESTED IN ACCORDANCE WITH ANSI/ASHRAE STANDARD 70-2006.</p> <p>ROUNDER DIFFUSER:</p> <p>ARCHITECTURAL SQUARE PANEL CEILING DIFFUSERS SHALL BE OF THE SIZES AND MOUNTING TYPES SHOWN ON THE PLANS AND OUTLET SCHEDULE. THE FACE PANEL IS REMOVABLE BY MEANS OF FOUR HANGER BRACKETS. THE EXPOSED SURFACE OF THE FACE PANEL SHALL BE SMOOTH, FLAT, AND FREE OF VISIBLE FASTENERS.</p> <p>THE BACK OF THE FACE PANEL SHALL HAVE AN AERODYNAMICALLY SHAPED, ROLLED EDGE TO INSURE A TIGHT HORIZONTAL DISCHARGE PATTERN. CEILING DIFFUSERS WITH A 24 X 24-INCH FULL FACE SHALL HAVE NO LESS THAN AN 1/8 X 1/8-INCH FACE PANEL. SIZE. CEILING DIFFUSERS WITH A 12 X 12-INCH FULL FACE SHALL HAVE NO LESS THAN A 9 X 9-INCH FACE PANEL. SIZE.</p> <p>THE BACKPANEL SHALL BE ONE PIECE PRECISION DIE-STAMPED AND SHALL INCLUDE AN INTEGRALLY DRAWN INLET. THE DIFFUSER NECK SHALL HAVE A MINIMUM OF 1 1/4-INCH DEPTH AVAILABLE FOR DUCT CONNECTION.</p> <p>THE FINISH SHALL BE #26 WHITE. THE FINISH SHALL BE AN ANODIC ACRYLIC PAINT, BAKED AT 315°F FOR 30 MINUTES. THE FINISH SHALL BE HD TO #.</p> <p>THE PAINT MUST PASS A 100-HOUR ASTM B117 CORROSIVE ENVIRONMENTS SALT SPRAY TEST WITHOUT CREPEAGE, BLISTERING OR DETERIORATION OF FILM. THE PAINT MUST PASS A 250-HOUR ASTM D870 WATER IMMERSION TEST. THE PAINT MUST ALSO PASS THE ASTM D2794 REVERSE IMPACT CRACKING TEST WITH A 50-INCH POUND FORCE APPLIED.</p> <p>OPTIONAL ROUND DAMPER SHALL BE CONSTRUCTED OF HEAVY GAUGE STEEL. DAMPER MUST BE AVAILABLE TO RESTRICT THE DISCHARGE AIR IN CERTAIN DIRECTIONS.</p> <p>OPTIONAL MOLDED INSULATION BLANKET SHALL BE AVAILABLE. THE INSULATION WILL BE R-6, FOAM-BACKED, AND PROVIDE AN ADDITIONAL 1-INCH GAP AROUND THE NECK TO INSTALL INSULATED FLEX DUCT.</p> <p>THE MANUFACTURER SHALL PROVIDE PUBLISHED PERFORMANCE DATA FOR THE SQUARE PANEL DIFFUSER. THE DIFFUSER SHALL BE TESTED IN ACCORDANCE WITH ANSI/ASHRAE STANDARD 70-1994.</p>	



PHILLIPS


KEYPLAN

CONSULTANT



PROFICIENT ENGINEERING
6991 Peachtree Industrial Blvd Building 700
Peachtree Corners, Georgia 30092
404.333.9759
PROJECT # 112289

SEAL



ISSUE & REVISION RECORD

#	DATE	DESCRIPTION
06.10.2019	30% DESIGN REVIEW SET	
08.15.2019	80% REVIEW SET	
08.23.2019	PERMIT SET	

PROJECT

Fairfield
BY MARRIOTT
INN & SUITES

DAWSONVILLE, GEORGIA

PROTOTYPE VERSION 2016
REV 7.12.21.16

4 STORY, 92 UNITS
w/ INDOOR POOL

FAIRFIELD
DAWSON FOREST ROAD
DAWSONVILLE, GA
30534

CLIENT

RIMROCK COMPANIES
10000 RIVERSIDE AVE
SUITE 22201
JACKSONVILLE, FL 32204

PHILLIPS JOB NUMBER 1972101

ISSUE DATE 08/23/2019

DRAWN BY/CHECKED BY TW . JD

DRAWING TITLE
GENERAL

SHEET NUMBER

M-0.1

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