

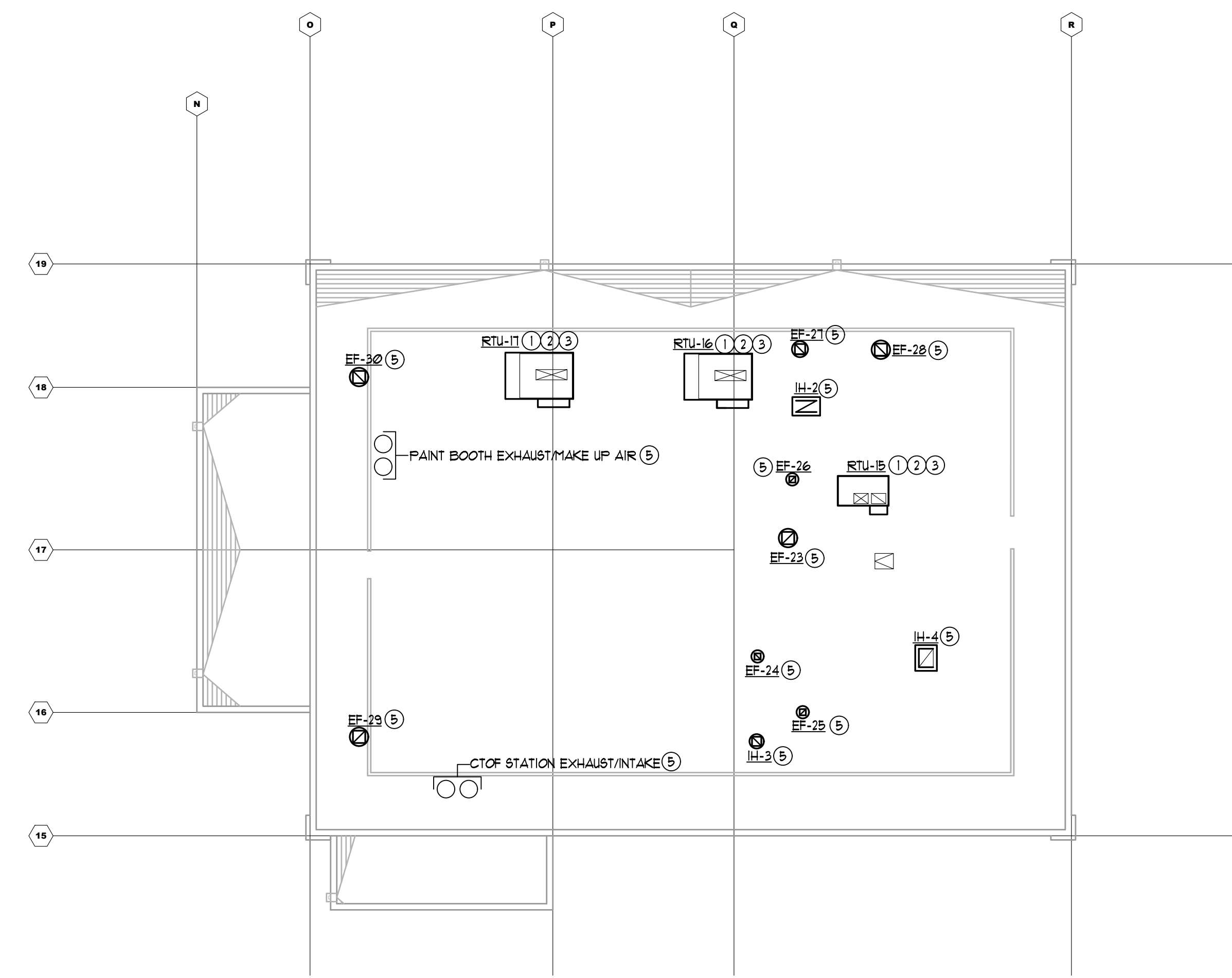
AM. CERRA, JR. P.E.
 1827 POWERS FERRY ROAD
 BLDG # 18, SUITE # 100
 ATLANTA, GEORGIA 30339
 770.980.0581

20241.01

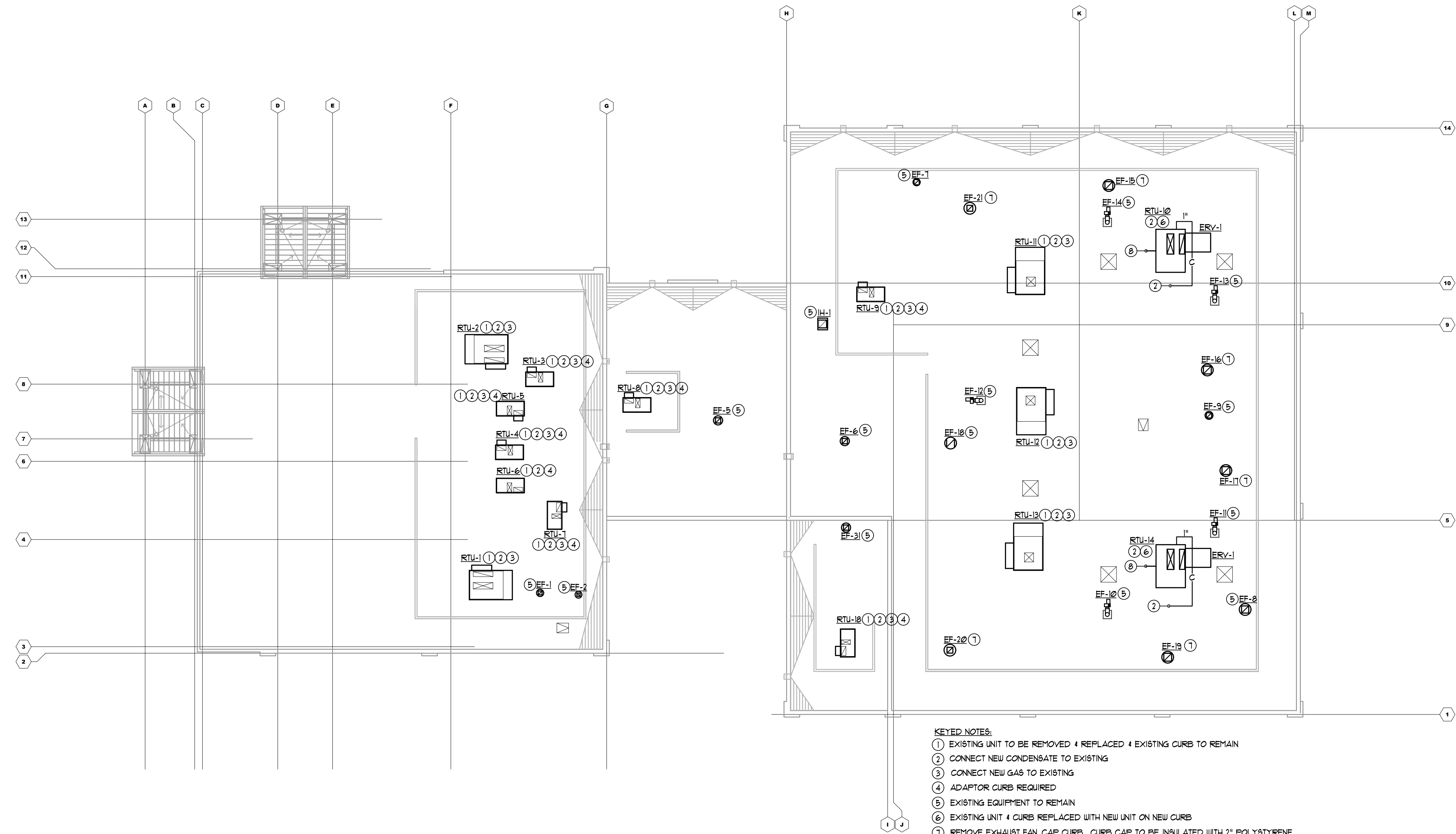


1/20/21

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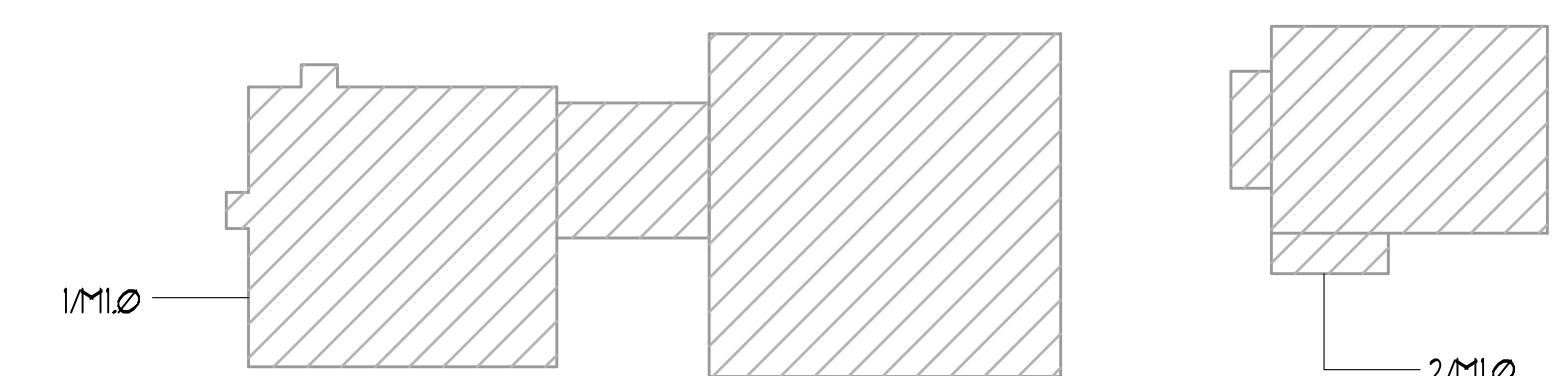


2 FQC ROOF PLAN - HVAC
 N M1.0 SCALE: 1/16" = 1'-0"



- KEYED NOTES:**
- ① EXISTING UNIT TO BE REMOVED & REPLACED & EXISTING CURB TO REMAIN
 - ② CONNECT NEW CONDENSATE TO EXISTING
 - ③ CONNECT NEW GAS TO EXISTING
 - ④ ADAPTOR CURBS REQUIRED
 - ⑤ EXISTING EQUIPMENT TO REMAIN
 - ⑥ EXISTING UNIT & CURB REPLACED WITH NEW UNIT ON NEW CURB
 - ⑦ REMOVE EXHAUST FAN CAP CURB. CURB CAP TO BE INSULATED WITH 2" POLYSTYRENE
 - ⑧ GAS PIPE ON THRU ROOF. SEE I/M21 FOR CONTINUATION

1 ROOF PLAN - HVAC
 N M1.0 SCALE: 1/16" = 1'-0"



KEY PLAN

RELEASED FOR CONSTRUCTION

APPROVAL

REVISIONS

| REV. NO. | DATE | DESCRIPTION | BY |
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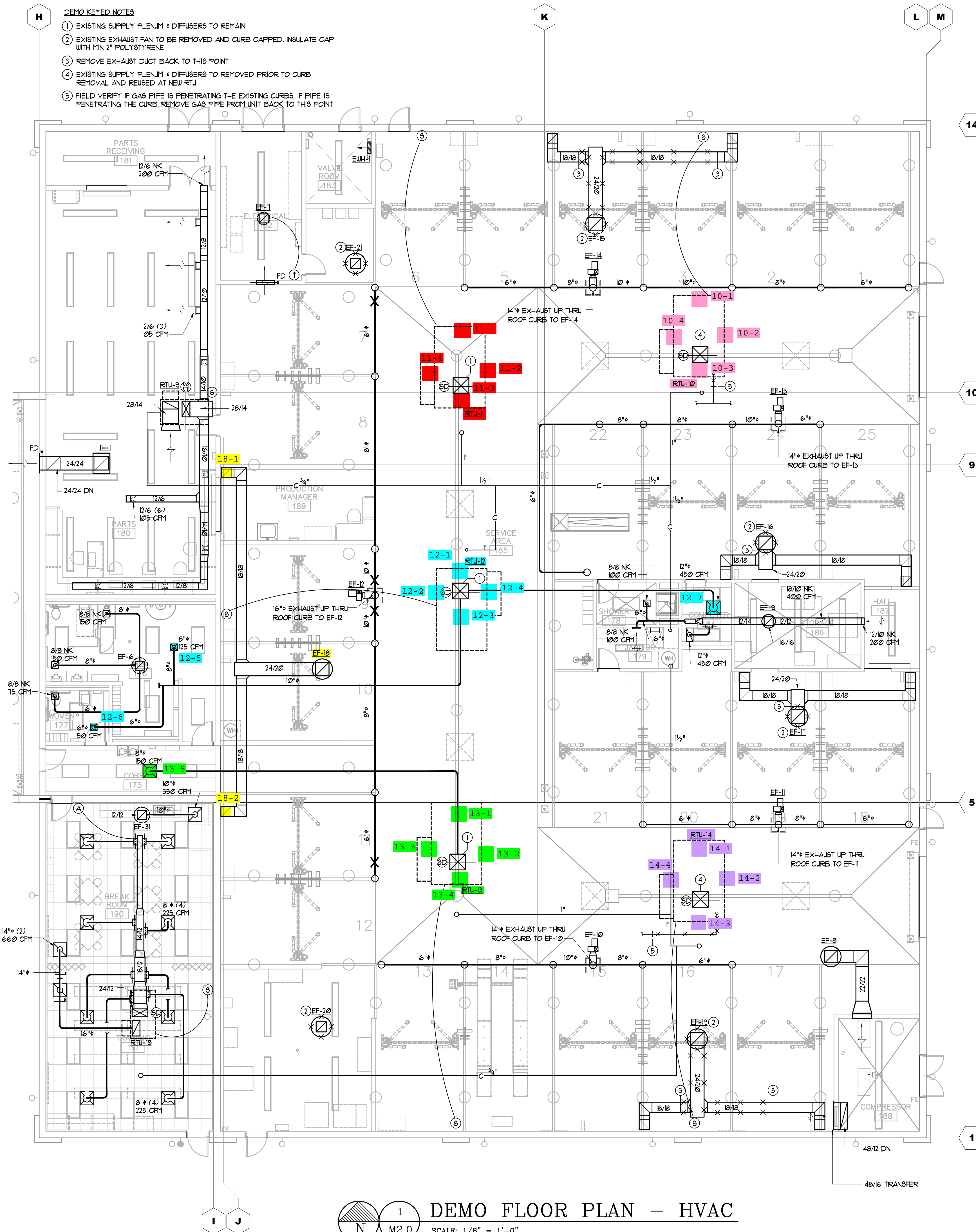
CARMAX
 THE AUTO SUPERSTORE
CARMAX THE AUTO SUPERSTORE WEST COAST, INC.
 18000 AUTOMALL DRIVE GREEN PARKWAY, RICHMOND, VA 23298
 (800) 242-0069
STORE NO. 7159
4300 MCHENRY AVE.
MODESTO, CALIFORNIA

PROJECT NO 20241

DATE 20 JAN 2021

SHEET TITLE
 ROOF PLANS - HVAC

SHEET NO **M1.0**



- DEMO KEYED NOTES**
- EXISTING SUPPLY FLENUM & DIFFUSERS TO REMAIN
 - EXISTING EXHAUST FAN TO BE REMOVED AND CURB CAPPED, INSULATE CAP WITH MIN 2" POLYSTYRENE
 - REMOVE EXHAUST DUCT BACK TO THIS POINT
 - EXISTING SUPPLY FLENUM & DIFFUSERS TO REMOVED PRIOR TO CURB REMOVAL AND REUSED AT NEW RTU
 - FIELD VERIFY IF GAS PIPE IS PENETRATING THE EXISTING CURB. IF PIPE IS PENETRATING THE CURB, REMOVE GAS PIPE FROM UNIT BACK TO THIS POINT

1 DEMO FLOOR PLAN - HVAC
SCALE: 1/8" = 1'-0"

AM. CERRA, JR. P.E.
1827 POWERS FERRY ROAD
BLDG # 18, SUITE # 100
ATLANTA, GEORGIA 30339
770.980.0581

20241.01



1/20/21

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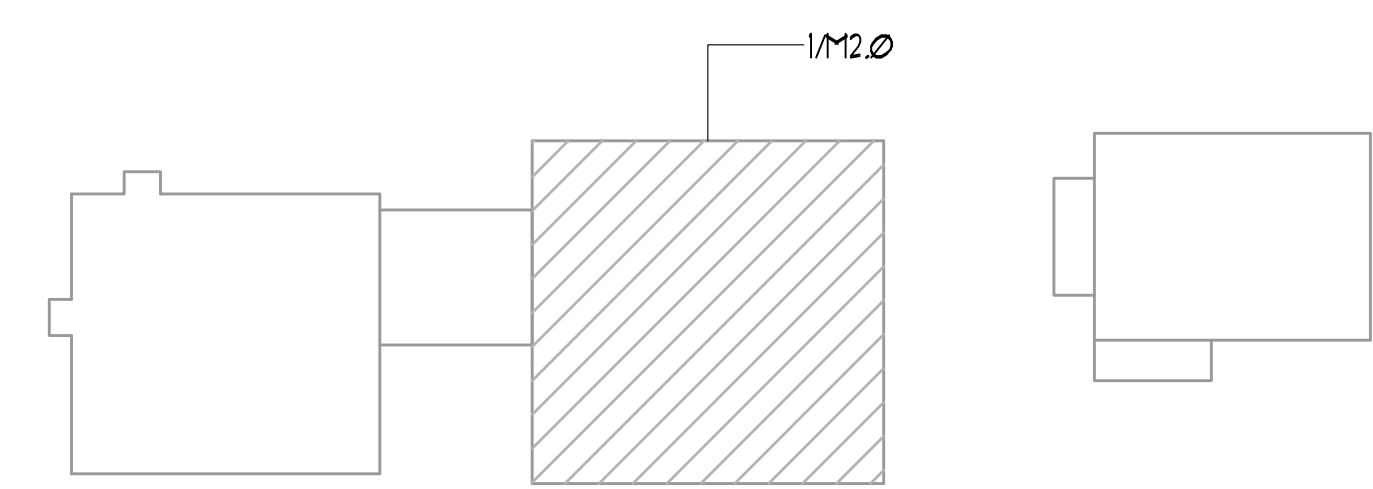
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CARMAX
THE AUTO SUPERSTORE
CARMAX THE AUTO SUPERSTORE WEST COAST, INC.
18000 HAZARD RD. GREEN PARKWAY, RICHMOND, VA 23138
STORE NO. 7159
4300 MCHENRY AVE.
MODESTO, CALIFORNIA

| | |
|-------------|-----------------------|
| PROJECT NO | 20241 |
| DATE | 20 JAN 2021 |
| SHEET TITLE | DEMO PART PLAN - HVAC |

SHEET NO **M2.0**



KEY PLAN



1/20/21

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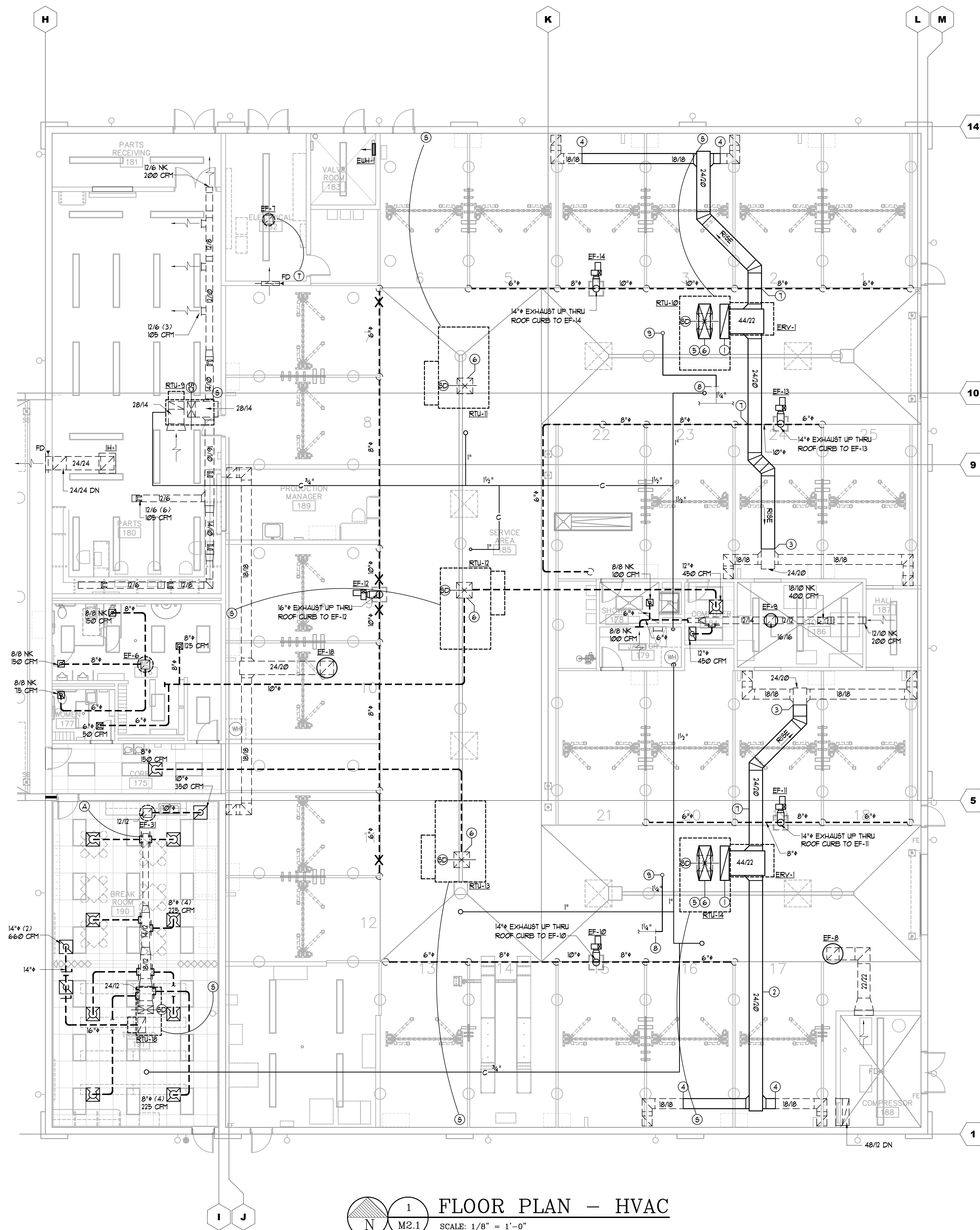
| SERVICE AREA AIR BALANCE | | | |
|--------------------------|--------------|-------|------------|
| ITEM | SERVES | O.A. | EXHAUST |
| RTU-10 (ERV) | SERVICE | 6000 | 5600 (LOW) |
| RTU-11 (BP) | SERVICE | 6000 | |
| RTU-12 (BP) | SERVICE | 6000 | |
| RTU-13 (BP) | SERVICE | 6000 | |
| RTU-14 (ERV) | SERVICE | 6000 | 5600 (LOW) |
| EF-6 | TOILET | | 400 |
| EF-7 | CO EXHAUST | | 1200 |
| EF-8 | COMP ROOM | | 3500 |
| EF-9 | DETAIL STOR. | | 1250 |
| EF-10 | CO EXHAUST | | 1500 |
| EF-11 | CO EXHAUST | | 1200 |
| EF-12 | CO EXHAUST | | 1800 |
| EF-13 | CO EXHAUST | | 1500 |
| EF-14 | CO EXHAUST | | 1800 |
| EF-15 | LOW EXH | | 3400 (LOW) |
| TOTAL | | 30000 | 28750 |

MINIMUM 1 CFM/SF EXHAUST AT THE FLOOR FOR EXEMPTION TO CLASS I DIVISION II PER NEC SERVICE NET AREA 14,300 SF
 TOTAL EXHAUST FROM ERV'S AND EF-15:
 215600' + 3400' + 14600 CFM

MINIMUM EXHAUST PER 2019 CALIFORNIA MECHANICAL CODE FOR REPAIR GARAGES PER TABLE 403.1.1 IS 15 CFM/SF
 MINIMUM EXHAUST = 15(14,300)
 MINIMUM EXHAUST = 21450 CFM

KEYED NOTES

- 1 FLENUM FULL SIZE OF UNIT CONNECTION
- 2 HOLD DUCT HIGH * BOTTOM OF BAR JOIST
- 3 CONNECT NEW 24/20 TO EXISTING 24/20
- 4 CONNECT NEW 18/18 TO EXISTING 18/18
- 5 EXISTING SUPPLY FLENUM 4 REGISTERS TO REMOVED PRIOR TO CURB REMOVAL AND REUSED AT NEW RTU
- 6 EXISTING SUPPLY FLENUM 4 REGISTERS TO REMAIN. CLEAN ALL REGISTERS + REPLACE DAMAGED REGISTERS WITH NEW
- 7 NEW EXHAUST DUCT UNDER EXISTING CARBON MONOXIDE EXHAUST DUCT
- 8 CONNECT NEW GAS PIPE TO EXISTING
- 9 GAS PIPE UP THRU ROOF. SEE 9/14/20 FOR DETAIL



1 FLOOR PLAN - HVAC
 SCALE: 1/8" = 1'-0"

RELEASED FOR CONSTRUCTION

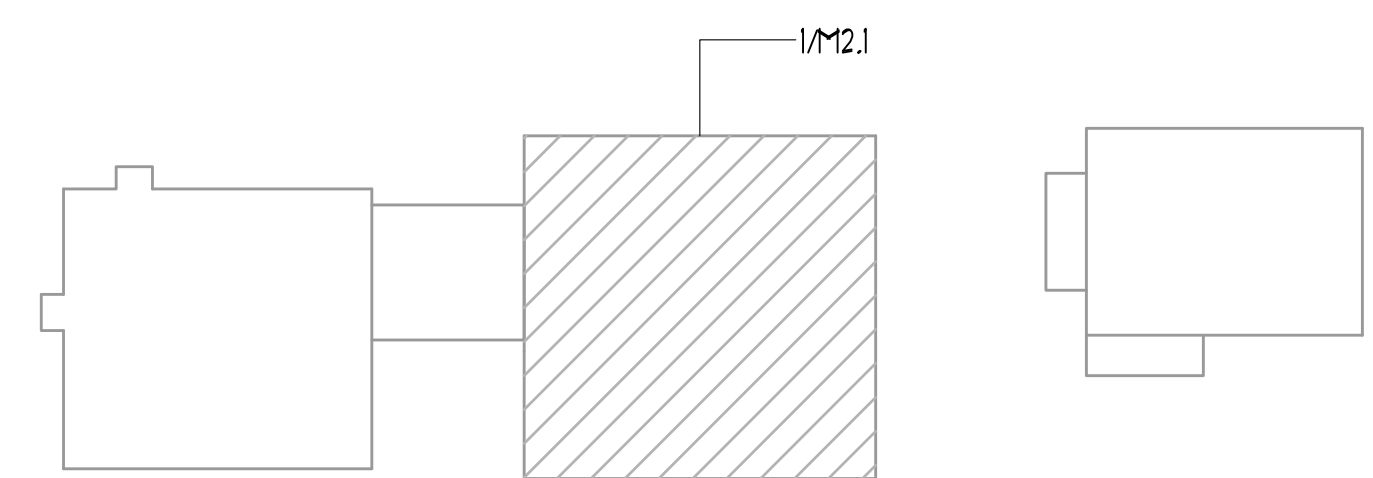
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 18000 HUNTERS GREEN PARKWAY, RICHMOND, VA 23238
 STORE NO. 7159
 4300 MCHENRY AVE.
 MODESTO, CALIFORNIA

| | |
|-------------|-------------------|
| PROJECT NO | 20241 |
| DATE | 20 JAN 2021 |
| SHEET TITLE | FLOOR PLAN - HVAC |
| SHEET NO | M2.1 |



KEY PLAN

HVAC GENERAL NOTES

- ALL CONTROL WIRING SHALL BE PERFORMED IN ACCORDANCE WITH THE LATEST EDITION OF NFPA 70. ALL WIRING SHALL BE CONCEALED.
- CONTRACTOR SHALL INSTALL ALL ROOF CURBS FOR ROOFTOP UNITS LEVEL TO HORIZON AT (4) CORNERS.
- AIR TEST AND BALANCE REQUIRED BY INDEPENDENT T4B CONTRACTOR, AABC OR NEBS CERTIFIED. SEE TEST AND BALANCE SCOPE ON THIS SHEET. SUBMIT REPORT TO ENGINEER FOR REVIEW.
- EXISTING SMOKE DETECTORS TO REMAIN AND BE REUSED.
- LENNOX START UP TECH SHALL PROGRAM THE PRODIGY BOARDS IN ALL NEW RTU'S. PRODIGY BOARDS SHALL BE PROGRAMMED PRIOR TO CSUSA RECOMMISSIONING THE NOVAR SYSTEM.
- CONTRACTOR SHALL PROVIDE CLEAN FILTERS IN ROOFTOP UNITS PRIOR TO AIR BALANCE AND AGAIN PRIOR TO OWNER ACCEPTANCE.
- ALL WORK SHALL BE PERFORMED IN ACCORDANCE WITH ALL APPLICABLE STATE AND LOCAL BUILDING CODES. ALL EQUIPMENT AND MATERIALS CAPABLE OF BEING UL LABELED OR LISTED SHALL BEAR THE UL LABEL.
- CONTRACTOR SHALL PROVIDE A GASKET BETWEEN BASE OF ROOF MOUNTED FANS AND ROOF CURBS TO PROVIDE AN AIRTIGHT JOINT.
- PROVIDE MISCELLANEOUS STEEL AND/OR WOOD BLOCKING AND SUPPORT AT ROOF CURBS AND OPENINGS AS REQUIRED TO SUPPORT ROOF AND EQUIPMENT. SPECIFIC REQUIREMENTS SHALL BE VERIFIED WITH STRUCTURAL ENGINEER AND APPROVED EQUIPMENT DRAWINGS PRIOR TO PLACEMENT.
- NEW SUPPLY AND EXHAUST DUCT SHALL BE 2" IN PRESSURE CLASS.
- NEW DUCT SHALL HAVE PAINT GRIP FINISH AND BE EITHER GALVANNEALED OR MILL PHOSPHATIZED.
- ANY NEW SUPPLY DUCT SHALL BE INTERNALLY INSULATED WITH 1" DUCT LINER EQUAL TO OENS CORNING ACCOUSTEX 15 LB DENSITY R4.9.
- NEW EXHAUST DUCT TO ERV'S IS NOT REQUIRED TO BE INSULATED.

ROOFTOP UNIT NOTES

- CARMAX AUTO SUPERSTORE, LLC HAS A NATIONAL ACCOUNT WITH LENNOX INDUSTRIES, INC. FOR PRICING AND DELIVERY OF PACKAGED ROOFTOP UNITS IN ACCORDANCE WITH THE FOLLOWING. NO SUBSTITUTIONS WILL BE ALLOWED.
 - ROOFTOP UNITS SHALL BE AS SCHEDULED.
 - THE ELECTRICAL PACKAGE SHALL INCLUDE:
 - UNIT DISCONNECT (INSTALLED AND WIRED)
 - BOTTOM GAS/POWER ENTRY
 - STANDARD LOW AMBIENT CONTROL
 - DUAL DRY GFCI TYPE OUTLETS (TO BE FIELD WIRED)
 - GLOBAL DRY BUILD ECONOMIZERS (IF AN POWERED EXHAUST (1ST AND LARGER UNLESS NOTED OTHERWISE)
 - GLOBAL DRY BUILD ECONOMIZERS (BAROMETRIC RELIEF (6T AND 8" SMALLER)
 - STAINLESS STEEL HEAT EXCHANGER AND FRESH AIR TEMPERING FOR BYPASS UNITS AND ERV UNITS
- THE LENNOX NATIONAL ACCOUNT CONTACT IS:

RON JOHNSON
104-671-2626
- HVAC EQUIPMENT PERFORMANCE CHECK (EPC)

UPON COMPLETION OF THE HVAC INSTALLATION AND STARTUP, THE OWNER'S SERVICE CONSULTANT AT THE OWNER'S EXPENSE, IS TO INSPECT THE JOB AND PREPARE AN EPC. THIS EPC WILL AID THE CONTRACTOR IN CHECKING EACH MACHINE FOR PROPER OPERATION, CHECKING THE CONTROL PANEL AND ADJUSTING CONTROLS AS NECESSARY.

THE OWNER'S SERVICE CONSULTANT:
COMFORT SYSTEMS
ATTN: VALERIE BEDEL
P: 317-246-9181
valerie@csusa.com

ALL PROBLEMS DISCOVERED WITH THE EQUIPMENT OR ITS INSTALLATION (EXCLUDING NOVAR INSTALLATION) SHALL BE CORRECTED BY THE HVAC SUBCONTRACTOR IN ACCORDANCE WITH THE OWNER'S SERVICE CONSULTANT.

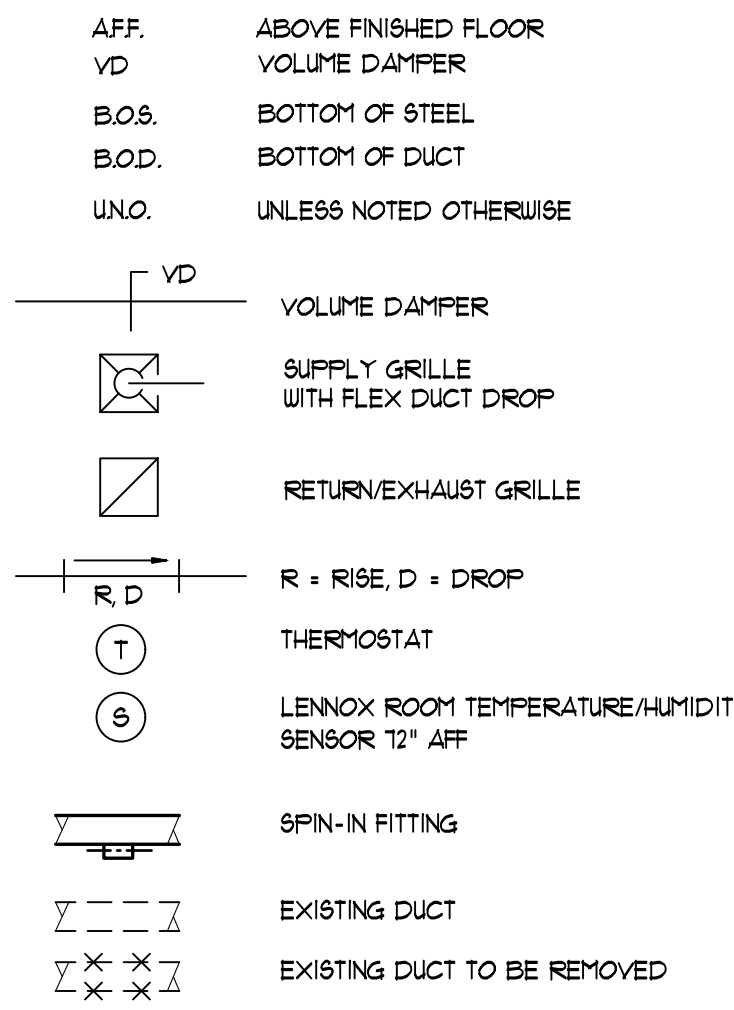
AFTER ALL PROBLEMS HAVE BEEN CORRECTED, CARMAX AUTO SUPERSTORE, LLC SHALL VERIFY ALL EQUIPMENT IS OPERATING PROPERLY THROUGH THE NOVAR CONTROLLERS.

PRIOR TO PERFORMANCE OF THE EPC, THE CONTRACTOR SHALL HAVE SET AND CONNECTED ALL COMPONENTS COMPLETED THE POWER WIRING, CONNECTED ALL PIPING, REMOVED ALL SHIPPING BLOCKS, COMPLETED THE STARTUP OF ALL UNITS AND FURNISHED THE PRE-EPC CHECKLIST TO THE OWNER'S SERVICE CONSULTANT.

THE EPC INCLUDES A FULL WRITTEN REPORT. COPIES WILL BE SENT TO THE GENERAL CONTRACTOR AND CARMAX AUTO SUPERSTORE, LLC. COPIES OF THE EPC SHALL BE INCORPORATED IN TO THE O & M MANUALS BY THE GENERAL CONTRACTOR.

 - RTU AIR FILTERS SHALL BE CAMEL FARR AEROPLEAT III (FEATED) 2" THICK RERV 13, OR EQUAL, MARK FILTERS WITH INSTALLATION DATE.
 - THE PACKAGE COMPONENTS WILL BE CLEARLY LABELED (IN LEGIBLE FORM) ON THE EXTERIOR OF ALL BOXES OR CRATES.
 - SUBMIT RTU SUBMITTALS IN PDF OR MSWORD FORMAT TO THE ENGINEER FOR APPROVAL.

HVAC LEGEND



PIPING GENERAL NOTES

- ANY NEW GAS PIPING SHALL BE ASTM A-100, SCHEDULE 40, BLACK STEEL WITH 80 LB. MALLEABLE IRON SCREWED FITTINGS.
- ANY NEW EXTERIOR GAS PIPE SHALL BE PAINTED WITH RUST PROHIBITIVE PAINT.

| CONTROLS SCOPE OF WORK: | |
|--|--|
| EXISTING RTU'S ARE ON LOGIC ONE BUS, SAVVY COMMUNICATIONS TO COM ALL RTU'S WITH ETH 20515 I/O IS BY THE INTEGRATED IOM IN THE SAVVY. | |
| 1. | ALL NEW RTU'S WILL BE BACNET. |
| 2. | THE GENERAL CONTRACTOR SHALL RETAIN COMFORT SYSTEMS USA (CSUSA) TO FURNISH AND INSTALL CONTROLS AS INDICATED BELOW. THE CONTACT AT CSUSA IS: VALERIE BEDEL, 317-246-9181 |
| 3. | PROVIDE PRE-CONSTRUCTION SCREEN SHOTS FROM NOVAR EMS MONITORING TO INCLUDE UNIT STATUS, MODULE COMMUNICATIONS STATUS AND ACTIVE ALARMS. |
| 4. | NOT USED |
| 5. | CONNECT NEW RTU'S W/PRODIGY BOARDS TO BACNET COMMUNICATION. |
| 6. | FOR NEW RTU'S REPLACE RTU NOVAR TEMPERATURE SENSORS WITH LENNOX SENSORS. |
| 7. | REPLACE/UPGRADE SAVVY 31 WITH ORP8 XCM105 PANEL. SAME BASE PLATE, MINIMAL RE-WIRING REQUIRED. |
| 8. | CONNECT BACNET NETWORK AS REQUIRED. |
| 9. | TURN OVER SAVVY 31 PANEL AND ETH'S TO CARMAX FOR FUTURE SERVICE CALL INVENTORY SHIP TO COMFORT SYSTEMS USA, ATTN VALERIE BEDEL, CARMAX EMS ACCOUNT CO-ORDINATOR |
| 10. | UPDATE SOFTWARE PER NEW CARMAX TEMPLATE |
| 11. | COMMISSION EMS SYSTEM |
| 12. | PROVIDE POST CONSTRUCTION SCREEN SHOTS FROM NOVAR EMS MONITORING TO INCLUDE UNIT STATUS, MODULE COMMUNICATIONS STATUS AND ACTIVE ALARMS. |
| 13. | LENNOX/CARMAX RTU SET UP SHEET IS TO BE COMPLETED UPON UNIT STARTUP. A COMPLETED SHEET IS TO BE LEFT IN EACH NEW RTU AND A COPY SUBMITTED WITH CLOSE OUT DOCUMENTATION FOR EACH NEW RTU. |
| 14. | FURNISH AND INSTALL ADDITIONAL CONTROL WIRE FOR CO2 SENSORS AND UNITS WITH HUMIDITROL. |
| 15. | ALL CONTROL COMMUNICATIONS BUS AND SENSOR WIRING NEW AND EXISTING, IS PART OF THE CONTROLS CONTRACTOR SCOPE OF WORK. REPLACE ANY DAMAGED WIRE. |

| TEST & BALANCE SCOPE | | | | | |
|------------------------|-----------------------|--------------|------------|-------------------------|---|
| MARK | TOTAL AIR ACROSS COIL | OUTSIDE AIR | BYPASS AIR | SUPPLY AIR TO REGISTERS | OTHER |
| RTU-1 THRU 9, 15, 4 18 | AS SCHEDULED | AS SCHEDULED | -- | -- | |
| RTU-11, 12, 4 13 | 10000 | 6000 | 1000 | 6000 | RTU-11: 4 REGISTERS @ 1500 CFM EACH RTU-12: 4 REGISTERS @ 1500 CFM EACH, 3 DIFFUSERS AS SHOWN ON I/P 2 RTU-13: 4 REGISTERS @ 1465 CFM EACH # 1 @ 1500 CFM |
| RTU-16 4 17 | 13000 | 6300 | 1000 | 6300 | RTU-16: 4 REGISTERS @ 1250 CFM EACH, 2 REGISTERS @ 550 CFM EACH # 1 DIFFUSER @ 2000 CFM RTU-17: 5 REGISTERS @ 1260 CFM EACH |
| RTU-10 4 14 | 6000 | -- | -- | 6000 | 4 REGISTERS @ 1500 CFM EACH |
| ERV-1 | -- | 6000 | -- | -- | 5000 CFM EXHAUST (RTU-10 4 14) |
| EF-10 | -- | -- | -- | -- | 2 @ 1000 CFM |

SUGGESTED TEST & BALANCE PROCEDURE FOR BYPASS UNITS:

- RTU-11 THRU 13
- CLOSE BYPASS DAMPER & MAKE AIR QTY 10000 CFM.
 - GRADUALLY OPEN BYPASS DAMPER UNTIL OUTSIDE AIR IS 6000 CFM. THIS MEANS 1000 CFM IS BEING BYPASSED IN THE CURB.
 - OUTSIDE AIR SHOULD EQUAL SUPPLY AIR TO THE REGISTERS.
 - TEST AND BALANCE CONTRACTOR TO NOTIFY COMFORT SYSTEMS AND INCLUDE IN T4B REPORT REGARDING MINIMUM POSITION OF OUTSIDE AIR DAMPER. SEE RTU NOTES FOR CONTACT INFO.
- RTU-16 4 17
- CLOSE BYPASS DAMPER & MAKE AIR QTY 13000 CFM.
 - GRADUALLY OPEN BYPASS DAMPER UNTIL OUTSIDE AIR IS 6300 CFM. THIS MEANS 1000 CFM IS BEING BYPASSED IN THE CURB.
 - OUTSIDE AIR SHOULD EQUAL SUPPLY AIR TO THE REGISTERS.
 - TEST AND BALANCE CONTRACTOR TO NOTIFY COMFORT SYSTEMS AND INCLUDE IN T4B REPORT REGARDING MINIMUM POSITION OF OUTSIDE AIR DAMPER. SEE RTU NOTES FOR CONTACT INFO.

EXISTING ROOFTOP UNIT SCHEDULE (SHOWN FOR REFERENCE ONLY)

| MARK | ZONE | EER | THERM EFF | VOLT/PH | FAN DATA | | | | COOLING DATA | | | GAS DATA | | MIN. O/A CFM | MODEL | WEIGHT | REMARKS ① | |
|--------|----------------|------|-----------|---------|----------|-----------|-----------|-----|--------------|---------|--------------|-----------|------------|--------------|--------|---------|-----------|----|
| | | | | | CFM | TOT IN UC | ESP IN UC | HP | EAT DB/AB | TOT MBH | SENSIBLE MBH | INPUT MBH | OUTPUT MBH | | | | | |
| RTU-1 | SHOOROOM | 11.8 | 80% | 480/3 | 6750 | 1025 | .8 | 5.0 | 11.1/63.5 | 182.6 | 155.6 | 260 | 208 | 650 | LENNOX | LGC180H | 2900 | |
| RTU-2 | SHOOROOM | 11.8 | 80% | 480/3 | 6750 | 1025 | .8 | 5.0 | 11.1/63.5 | 182.6 | 155.6 | 260 | 208 | 650 | LENNOX | LGC180H | 2900 | |
| RTU-3 | CUSTOMER | 11.2 | 80% | 480/3 | 1300 | .63 | .6 | 1.5 | 19.1/63.9 | 39.1 | 33.5 | 78 | 62.4 | 200 | LENNOX | LGA042H | 900 | |
| RTU-4 | BUSINESS | 11.0 | 80% | 480/3 | 2050 | .63 | .6 | 1.5 | 20.2/64.3 | 58.1 | 51.3 | 78 | 62.4 | 200 | LENNOX | LGA060H | 900 | |
| RTU-5 | BUYERS | 11.3 | 80% | 480/3 | 1500 | .63 | .6 | 1.5 | 21.2/64.1 | 45.8 | 31.3 | 78 | 62.4 | 200 | LENNOX | LGA048H | 900 | |
| RTU-6 | DATA/PBX | 11.2 | 80% | 480/3 | 960 | .63 | .6 | 1.5 | 75/67.1 | 34 | 23.8 | - | - | - | LENNOX | LCA036H | 900 | |
| RTU-7 | BREAK/CONF | 11.2 | 80% | 480/3 | 1300 | .63 | .6 | 1.5 | 13.8/63.8 | 45.1 | 36.2 | 78 | 62.4 | 200 | LENNOX | LGA048H | 900 | |
| RTU-8 | SERVICE WRITER | 11.3 | 80% | 480/3 | 1700 | .72 | .6 | 1.5 | 17.6/63.4 | 47 | 39.8 | 78 | 62.4 | 180 | LENNOX | LGA048H | 900 | |
| RTU-9 | PARTS | 11.3 | 80% | 480/3 | 1200 | .63 | .6 | 1.5 | 28.7/66.5 | 47.1 | 43.5 | 78 | 62.4 | 210 | LENNOX | LGA048H | 900 | |
| RTU-10 | SERVICE AREA | 10.2 | 80% | 480/3 | 7000 | 1.04 | .8 | 5.0 | 96.7/69.2 | 281 | 281 | 470 | 376 | 6000 | LENNOX | LGA300H | 4300 | ②③ |
| RTU-11 | SERVICE AREA | 10.2 | 80% | 480/3 | 7000 | 1.04 | .8 | 5.0 | 96.7/69.2 | 281 | 281 | 470 | 376 | 6000 | LENNOX | LGA300H | 4300 | ②③ |
| RTU-12 | SERVICE AREA | 10.2 | 80% | 480/3 | 7000 | 1.04 | .8 | 5.0 | 96.7/69.2 | 281 | 281 | 470 | 376 | 6000 | LENNOX | LGA300H | 4300 | ②③ |
| RTU-13 | SERVICE AREA | 10.2 | 80% | 480/3 | 7000 | 1.04 | .8 | 5.0 | 96.7/69.2 | 281 | 281 | 470 | 376 | 6000 | LENNOX | LGA300H | 4300 | ②③ |
| RTU-14 | SERVICE AREA | 10.2 | 80% | 480/3 | 7000 | 1.04 | .8 | 5.0 | 96.7/69.2 | 281 | 281 | 470 | 376 | 6000 | LENNOX | LGA300H | 4300 | ②③ |
| RTU-15 | FQC | 11.0 | 80% | 480/3 | 3200 | .86 | .6 | 2.0 | 28.2/66.1 | 117 | 112 | 130 | 104 | 900 | LENNOX | LGA120H | 1600 | |
| RTU-16 | PAINT AREA | 10.2 | 80% | 480/3 | 7300 | 1.04 | .8 | 5.0 | 96.7/69.2 | 281 | 281 | 470 | 376 | 6300 | LENNOX | LGA300H | 4300 | ③④ |
| RTU-17 | PAINT AREA | 10.2 | 80% | 480/3 | 7300 | 1.04 | .8 | 5.0 | 96.7/69.2 | 281 | 281 | 470 | 376 | 6300 | LENNOX | LGA300H | 4300 | ③④ |
| RTU-18 | BREAK/TRAIN | 11.0 | 80% | 480/3 | 1800 | .72 | .62 | 1.5 | 22.9/65.6 | 59.4 | 56.9 | 78 | 62.4 | 480 | LENNOX | LGA060H | 900 | |

① PROVIDE WITH FACTORY INSTALLED NOVAR CONTROL MODULE. LGA UNIT SERIES (MODEL 2051) ④ BYPASS 1000 CFM, 6300 CFM TO SPACE
 ② BYPASS 1000 CFM, 6000 CFM TO SPACE
 ③ BY-PASS CURB AND BY-PASS MIXING BOX

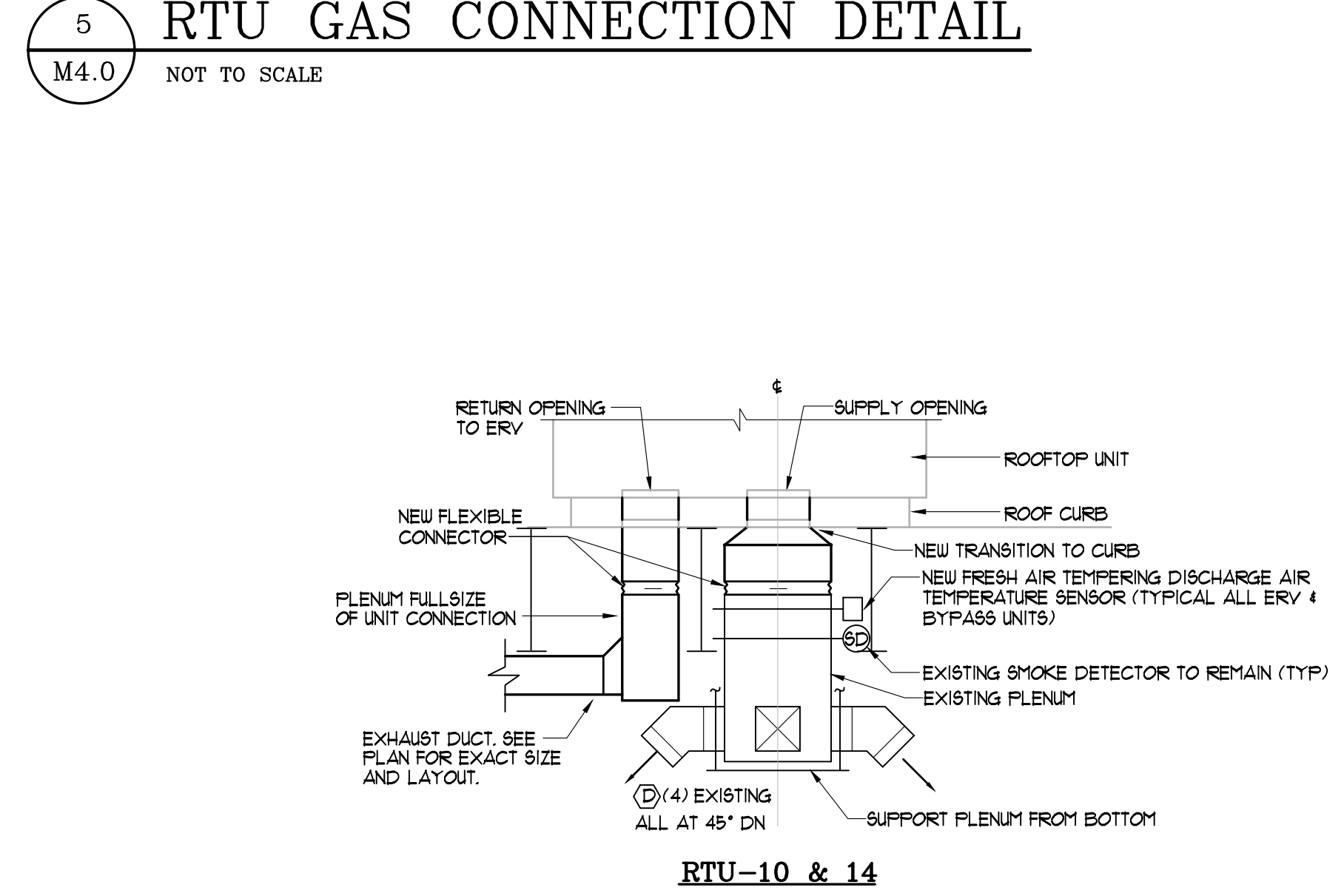
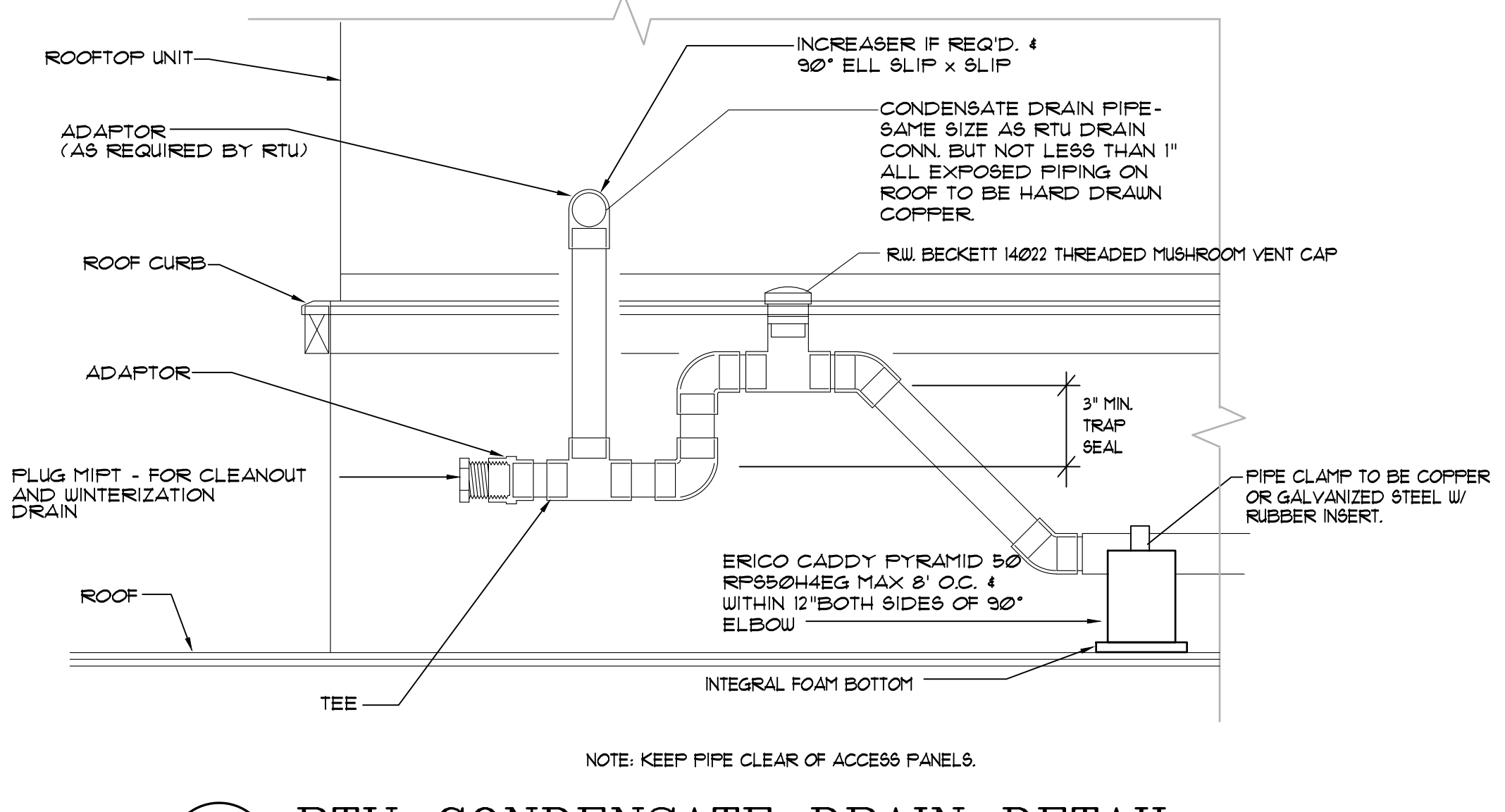
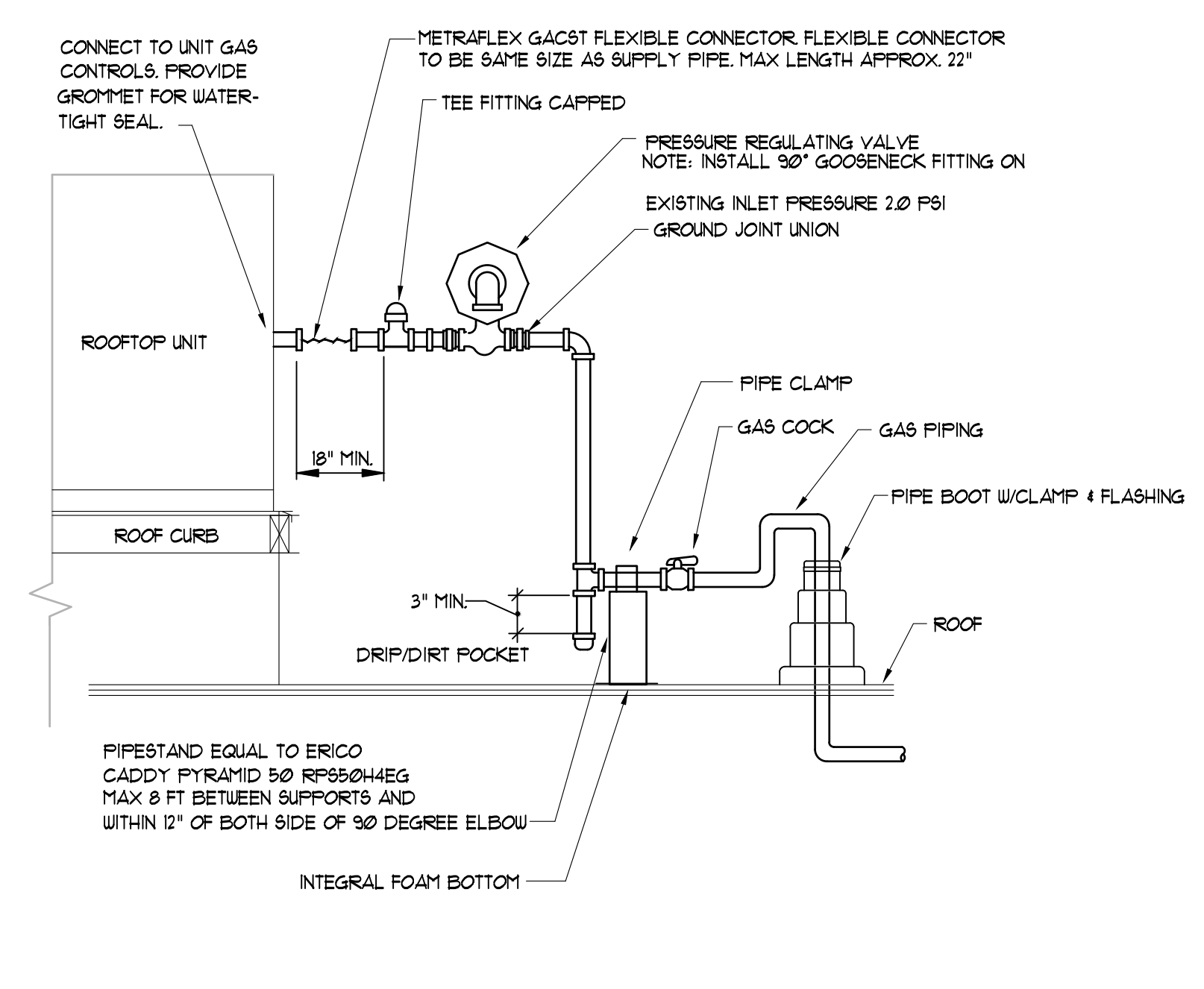
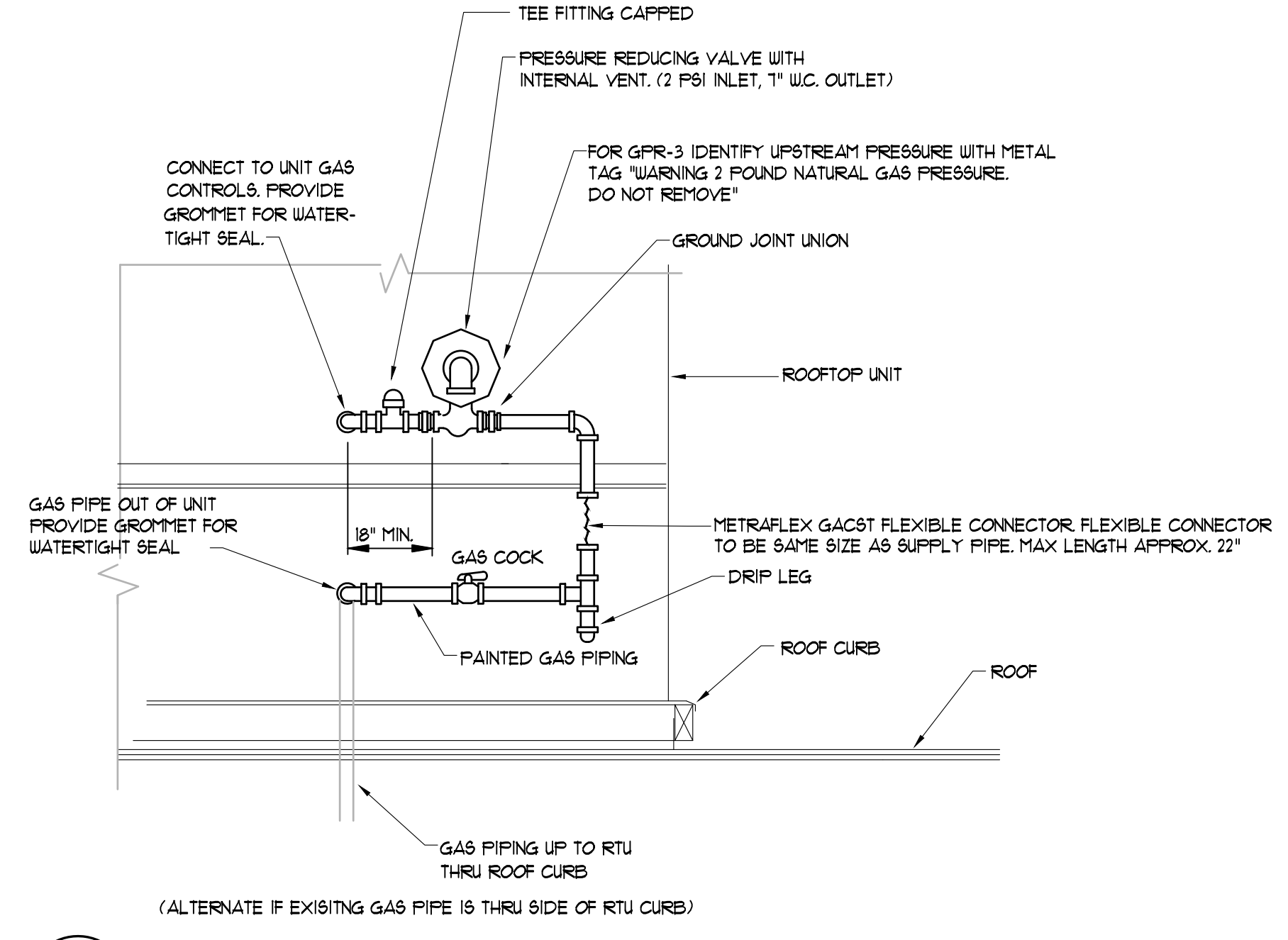
ROOFTOP UNIT SCHEDULE

| MARK | ZONE | EER | VOLT/PH | FAN DATA | | | | COOLING DATA ③ | | | GAS DATA | | MIN. O/A CFM | MODEL ① | WEIGHT | REMARKS ②④⑤⑥⑨⑩ | |
|--------|--------------------|------|---------|----------|-----------|-----------|-----|----------------|------------------|-----------|------------|-----|--------------|---------|-----------|----------------|------------------------|
| | | | | CFM | TOT IN UC | ESP IN UC | HP | EAT DB/AB | TOT SENSIBLE MBH | INPUT MBH | OUTPUT MBH | | | | | | |
| RTU-1 | SHOOROOM | 12.0 | 480/3 | 6750 | 11 | 200 | 5.0 | -- | -- | -- | 260 | 208 | 650 | LENNOX | LGH180H4M | 2650 | (14)(11) |
| RTU-2 | SHOOROOM | 12.0 | 480/3 | 6750 | 11 | 200 | 5.0 | -- | -- | -- | 260 | 208 | 650 | LENNOX | LGH180H4M | 2650 | (14)(11) |
| RTU-3 | CUSTOMER | 12.8 | 480/3 | 1300 | .75 | 60 | 3/4 | -- | -- | -- | 65 | 52 | 200 | LENNOX | LGH048H4E | 1000 | (2)(10) |
| RTU-4 | BUSINESS | 12.7 | 480/3 | 2050 | .82 | 60 | 1.0 | -- | -- | -- | 65 | 52 | 200 | LENNOX | LGH060H4E | 1100 | (2)(10) |
| RTU-5 | BUYERS | 12.8 | 480/3 | 1500 | .75 | 60 | 3/4 | -- | -- | -- | 65 | 52 | 200 | LENNOX | LGH048H4E | 1000 | (2)(10) |
| RTU-6 | DATA/PBX | 12.5 | 480/3 | 960 | 1.03 | 60 | 1/2 | -- | -- | -- | -- | -- | -- | LENNOX | LCH036H4E | 800 | (2) |
| RTU-7 | BREAK/CONF | 12.8 | 480/3 | 1300 | .75 | 60 | 3/4 | -- | -- | -- | 65 | 52 | 200 | LENNOX | LGH048H4E | 1000 | (1)(2)(10) |
| RTU-8 | SERVICE WRITER | 12.8 | 480/3 | 1700 | .75 | 60 | 3/4 | -- | -- | -- | 65 | 52 | 180 | LENNOX | LGH048H4E | 1000 | (2)(10) |
| RTU-9 | PARTS | 12.8 | 480/3 | 1200 | .75 | 60 | 3/4 | -- | -- | -- | 65 | 52 | 210 | LENNOX | LGH048H4E | 1000 | (2)(10) |
| RTU-10 | SERVICE AREA (ERV) | 12.0 | 480/3 | 6000 | 1.3 | 1.0 | 5.0 | 86/65 | 217 | 204 | 360 | 288 | 6000 | LENNOX | LGH240H4E | 2600 | (20)(3)(8)(10)(14)(16) |
| RTU-11 | SERVICE AREA (BP) | 11.6 | 480/3 | 7000 | 1.4 | 1.0 | 5.0 | 97/69 | 292 | 292 | 480 | 384 | 6000 | LENNOX | LGH300H4E | 4500 | (3)(5)(7)(8)(10)(14) |
| RTU-12 | SERVICE AREA (BP) | 11.6 | 480/3 | 7000 | 1.4 | 1.0 | 5.0 | 97/69 | 292 | 292 | 480 | 384 | 6000 | LENNOX | LGH300H4E | 4500 | (3)(5)(7)(8)(10)(14) |
| RTU-13 | SERVICE AREA (BP) | 11.6 | 480/3 | 7000 | 1.4 | 1.0 | 5.0 | 97/69 | 292 | 292 | 480 | 384 | 6000 | LENNOX | LGH300H4E | 4500 | (3)(5)(7)(8)(10)(14) |
| RTU-14 | SERVICE AREA (ERV) | 12.0 | 480/3 | 6000 | 1.3 | 1.0 | 5.0 | 86/65 | 217 | 204 | 360 | 288 | 6000 | LENNOX | LGH240H4E | 2600 | (20)(3)(8)(10)(14)(16) |
| RTU-15 | FQC | 12.0 | 480/3 | 3200 | 1.03 | 60 | 2.0 | -- | -- | -- | 130 | 108 | 900 | LENNOX | LGH120H4E | 1600 | (6)(14)(16) |
| RTU-16 | PAINT AREA (BP) | 11.6 | 480/3 | 7300 | 1.4 | 1.0 | 5.0 | 97/69 | 295 | 295 | 480 | 384 | 6300 | LENNOX | LGH300H4E | 4500 | (3)(7)(8)(10)(14)(16) |
| RTU-17 | PAINT AREA (BP) | 11.6 | 480/3 | 7300 | 1.4 | 1.0 | 5.0 | 97/69 | 295 | 295 | 480 | 384 | 6300 | LENNOX | LGH300H4E | 4500 | (3)(7)(8)(10)(14)(16) |
| RTU-18 | BREAK/TRAIN | 12.1 | 480/3 | 1800 | .80 | 60 | 1.0 | -- | -- | -- | 65 | 52 | 480 | LENNOX | LGH060H4E | 1100 | (2)(16) ⑪ |

① ONLY ACCEPTABLE MANUFACTURER IS LENNOX. SEE 'ROOFTOP UNIT NOTES'
 ② FIELD ADJUST SUPPLY FAN RPM TO PROVIDE AIR QUANTITIES AS SCHEDULED ABOVE. INSTALL FIELD-SUPPLIED MOTOR AND/OR DRIVE AS REQ'D
 ③ INSTALL F.A.T. DISCHARGE AIR TEMPERATURE SENSOR. SHIPPED LOOSE IN RTU CABINET, INSTALL SENSOR IN SUPPLY IN SUPPLY DUCT APPROX 3FT BELOW ROOF DECK. SEE DETAIL 6/M4.0
 ④ BACNET CONTROL, NEW TEMP SENSOR
 ⑤ BYPASS 1000 CFM IN CURB, 6000 CFM TO SPACE
 ⑥ RETURN AIR ADAPTER PLATE
 ⑦ REUSE EXISTING BY-PASS CURB, NEW MIXING BOX
 ⑧ FRESH AIR TEMPERING, 100% OUTSIDE AIR
 ⑨ 105°F CONDENSER AIR
 ⑩ MECHANICAL CONTRACTOR SHALL BE RESPONSIBLE FOR THE CONNECTION OF WIRING HARNESS SHIPPED LOOSE IN RTU THAT ARE ASSOCIATED WITH OUTSIDE AIR DAMPER. THIS WILL INCLUDE CONTROL INTERLOCK WIRING FOR ERV'S AND OUTSIDE AIR DAMPER OPERATIONS FOR UNITS WITH BYPASS CURBS & MIXING BOXES
 ⑪ PROVIDE WITH DEMAND VENTILATION, CO2 SENSOR, MODULATING OUTSIDE AIR DAMPER OUTSIDE AIR DAMPER CLOSED, ON A CALL FOR VENTILATION OUTSIDE AIR DAMPER STARTS TO OPEN AT 700 PPM AND AT 1000 PPM MOVES TO 1/2 OPEN TO GIVE OUTSIDE AIR QUANTITY AS INDICATED IN SCHEDULE ABOVE. INSTALL CO2 SENSOR ADJACENT TO TEMP SENSOR
 ⑫ ADAPTER CURB
 ⑬ PROVIDE WITH 24" CLIP-LOCK CURB
 ⑭ 2 STAGE HEAT
 ⑮ PROVIDE WITH SEISMIC CURB CLIPS. SEE DETAIL 6/M4.0
 ⑯ PROVIDE WITH ENERGY RECOVERY WHEEL. SEE SCHEDULE THIS SHEET.
 ⑰ GLOBAL ECONOMIZER WITH POWERED EXHAUST
 ⑱ GLOBAL ECONOMIZER WITH BAROMETRIC RELIEF
 ⑲ BYPASS 1000 CFM IN CURB, 6300 CFM TO SPACE
 ⑳ DOES NOT INCLUDE WEIGHT OF ERV. SEE ERV SCHEDULE BELOW FOR ERV WEIGHT
 ㉑ DRAIN PAN OVERFLOW SWITCH MODEL Z1806R30A1

ENERGY RECOVERY WHEEL SCHEDULE

| MARK | SERVES | OUTSIDE AIR | | | | | | ③ EXHAUST AIR | | | | MODEL | WEIGHT | REMARKS |
|------|--------|-------------|---------|-----|-----------|--------------|-----------------------|---------------|--|--|--|-------|--------|---------|
| | | FAN HP | VOLT/PH | CFM | EAT, F db | L.A.T., F db | COOLING DATA TOT SENS | | | | | | | |



RUSKIN ROOFTOP SYSTEMS

SPECIFICATION DATA FOR
LENNOX
LGA / LCA 156 - 360
LHA 180-240

RRS MODEL: 50-307-33
BYPASS MIXING BOX

Features:
1. Heavy gauge construction.
2. Color coordinated with the unit.
3. Fully insulated with 1" fiberglass insulation 1.5 lb. density.
4. Access doors on both sides.
5. Factory wired and tested.
6. Low risk obstructed dampers.
7. Mixing Box must be sealed weather tight to RTU in field during installation.

FOR PRICES SEE: FORM LK-CM-101

| RRS PART# | LENNOX UNIT# | A | B | C | NET WEIGHT |
|-----------|------------------|---------|---------|---------|------------|
| 50-307-32 | LGA/LCA 156-360 | 89 1/2" | 50" | 30 1/2" | 550 |
| 50-307-33 | LGA/LCA 300H-360 | 81 1/2" | 53 1/2" | 30" | 600 |

1625 Diplomat Drive, Carrollton, Texas 75006-6848 Phone (972) 247-7447 (800) 952-4822 Fax (972) 243-0940

ROOFTOP SYSTEMS, INC.

SPECIFICATION DATA FOR
CARMAX
LGA / LCA 156 - 360
LHA 180-240

RSI MODEL: 50-275-32
ROOF CURB
W/ BYPASS MIXING BOX SUPPORT

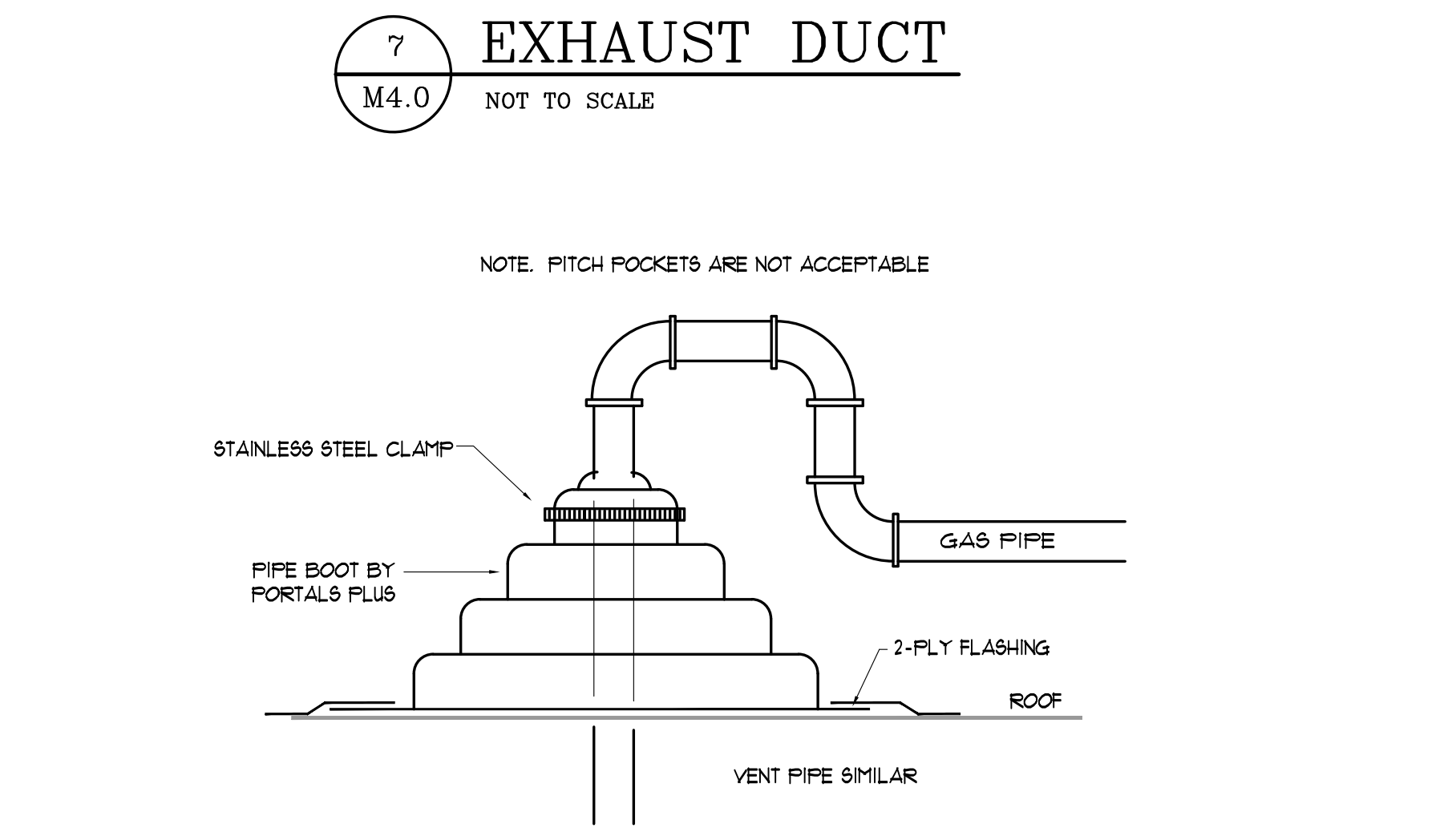
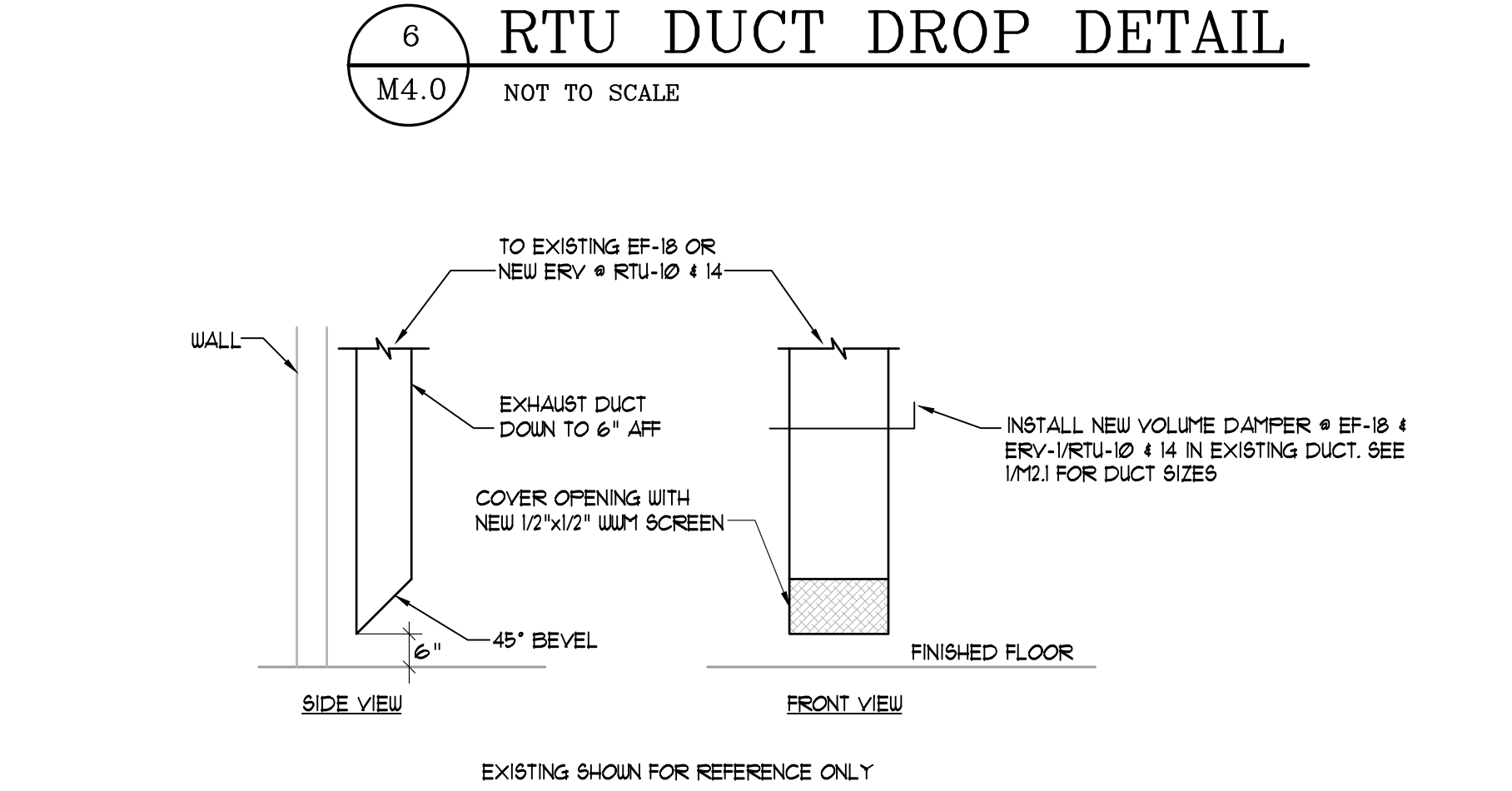
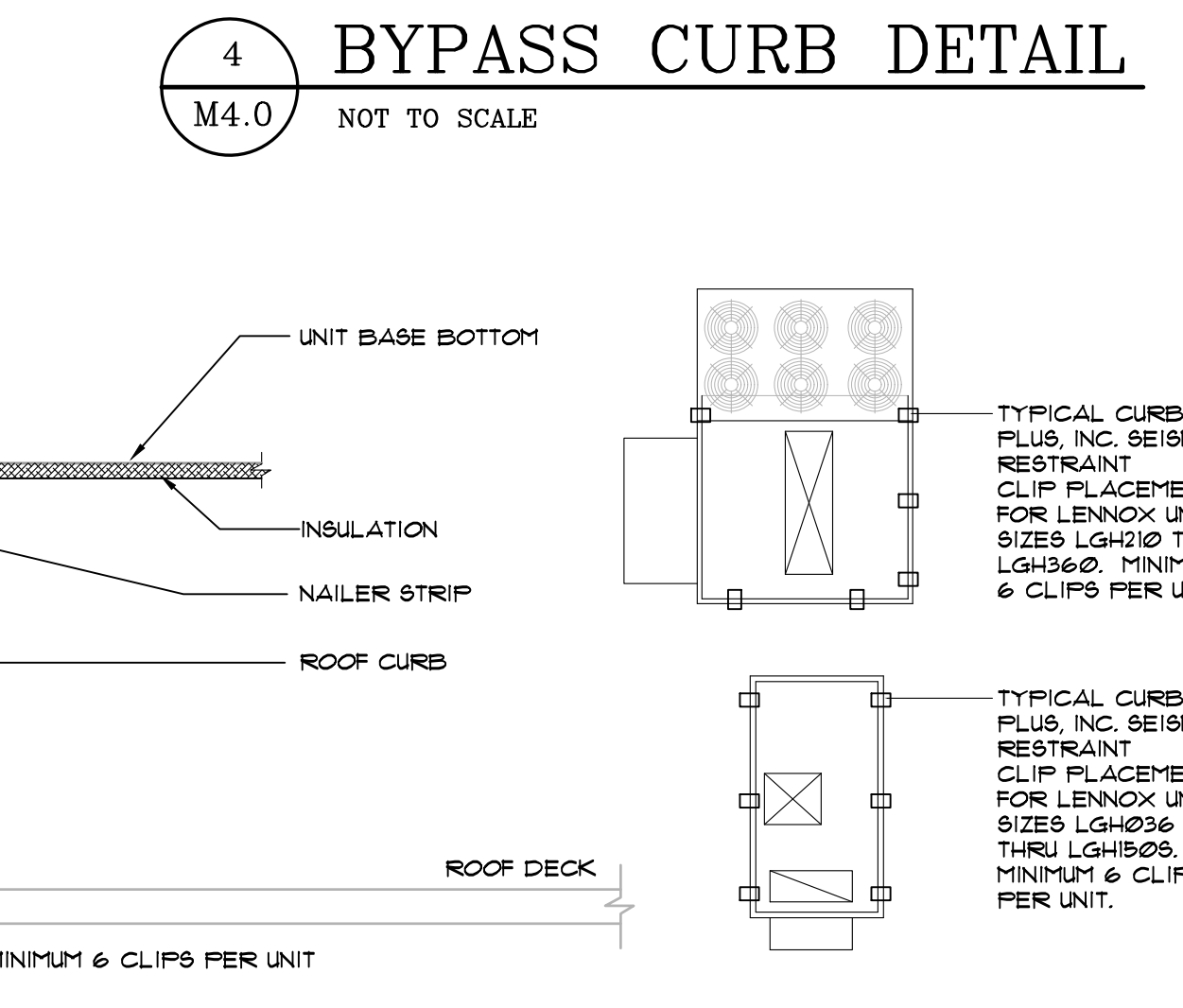
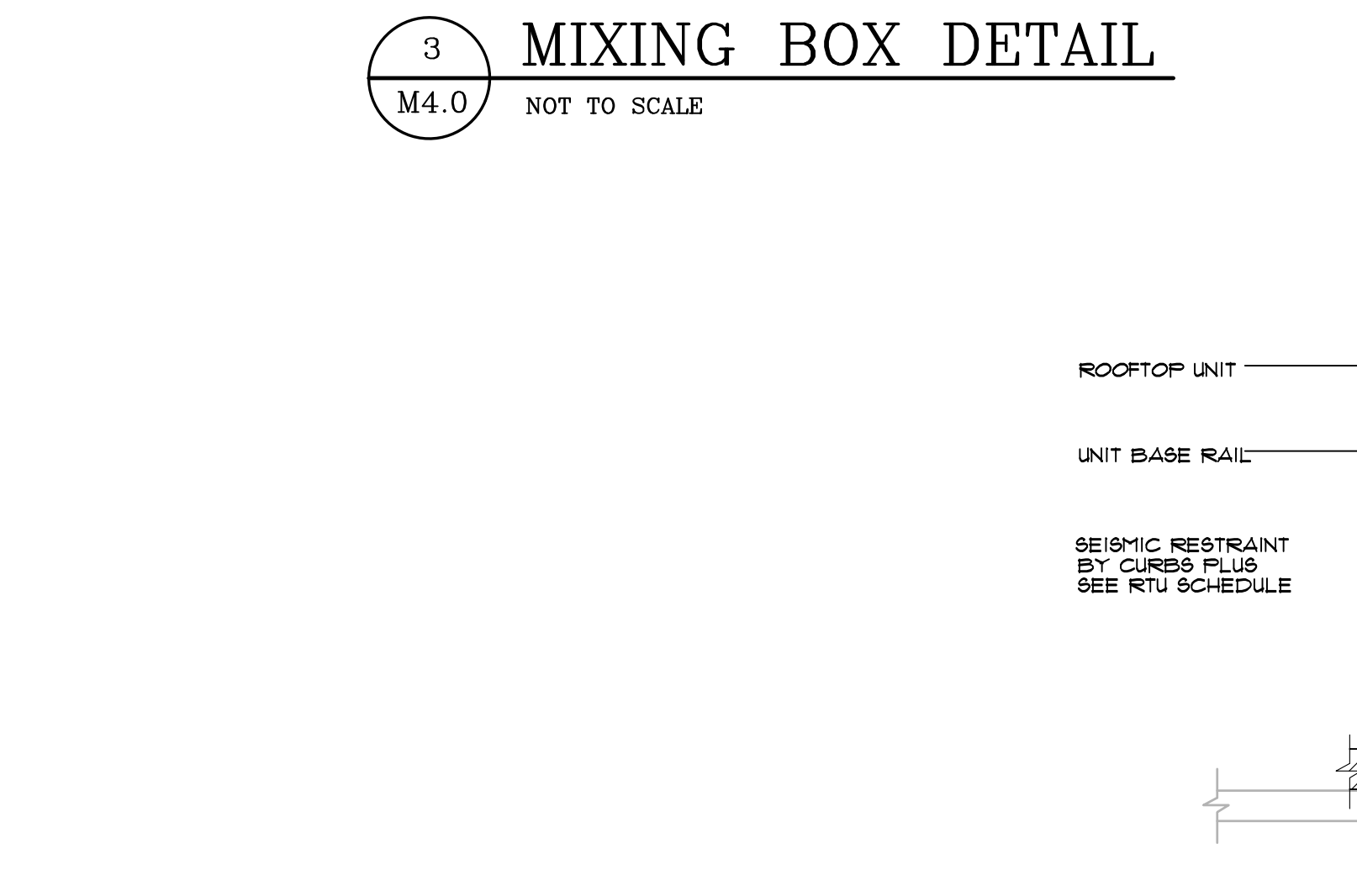
Features:
1. Roof curb is built to NRCA standards.
2. Roof curb is constructed of 16 gauge G90 steel.
3. Curb and mixing box support ships completely welded in one piece.
4. Full perimeter 2 x 4 wood nailer.
5. Supply plenum completely insulated and assembled.
6. Net weight of curb is 650 lbs.

NOTE: BYPASS CURBS ARE EXISTING TO REMAIN. SHOWN FOR GENERAL INFORMATION ONLY.

FOR PRICES SEE: FORM LK-CM-101

SEPTEMBER 27, 2006 FORM LKCMHRS32 SUPERSEDES 12-04-02

2465 Motter Lane, Carrollton, Texas 75006-6510 Phone (972) 247-7447 (800) 952-4822 Fax (972) 243-0940



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RELEASED FOR CONSTRUCTION

APPROVAL

REVISIONS

| REV. NO. | DATE | DESCRIPTION | BY |
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CARMAX
THE AUTO SUPERSTORE
STORE NO. 7159
4300 MCHENRY AVE.
MODESTO, CALIFORNIA