Report By:

National TAB
1329 E. KEMPER ROAD
SUITE 4210
CINCINNATI, OH 45246

Report: TAB Report

Function: Test, Adjust, & Balance

Date: 02/16/2026

Completed By: National TAB

PROJECT

08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

18785 E 39TH ST S

INDEPENDENCE, MO 64057

Client

CHICK-FIL-A

5200 BUFFINGTON ROAD

ATLANTA, GA 30349-2998

National TAB

Project: 08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

Table Of Contents

Project Summary

The summary below provides a quick understanding of our scope of work and general testing procedures. Enclosed in the report is further detail about your building performance including recommendations, asset data, and pictures. Our focus is to work with the trades to remedy any issues or deficiencies during the actual field balancing and not after the balancing has occurred to achieve a positive environment and outcome. The level of success is determined by the availability of the trades, possible parts needed, or time constraints.

Inspections and Commissioning Light
The HVAC equipment, ductwork, and other building assets were inspected per Chick Fil A requirements. The results of this inspection is included in checklists within the report. Operational tests were also performed on the HVAC controls to ensure occupied and unoccupied sequence of operation.

RTU's (Roof Top Units) w/ Diffusers
Each of the RTU's were measured at their terminal devices or via traverse to establish a total flow for that unit. Each RTU was adjusted to within tolerance of the engineer's design flow. Each outlet was then adjusted to within tolerance of the design flow. Outside air was measured by reading the intake air opening with a velocity grid and multiplying by the free area. The outside air damper was adjusted until the airflow was within the design requirements. Any equipment that fell outside of that tolerance is noted throughout the report.

Kitchen Exhaust Hood & Associated Fans (Halton)
Each kitchen exhaust fan was measured by taking static pressure at the exhaust plenum and comparing to OEM performance data. The total flow of the exhaust was then adjusted to tolerance of the engineer's design flow.

General Exhaust Fans w/ Grilles
The general exhaust fans were measured by reading each air device with a flow hood. The total airflow for each fan is equivalent to the sum of these readings. Fan speed was then adjusted so that the airflow was within tolerance of design. Each terminal device was balanced to within tolerance of the design volume using the installed volume dampers. Any equipment that fell outside of this tolerance is noted throughout the report.

Final Building Tests
After completing the test and balance the final building pressure was measured. It was confirmed that the building pressure fell within acceptable tolerances and that the pressure measurement coincides with the actual and design net airflow. Any deviations from these standards are noted throughout the report.
The hood capture was tested at the perimeter of the hood and the cook top level with the equipment heat on to ensure satisfactory hood capture and containment.

NATIONAL TAB

AIR BALANCE SCHEDULE

UNIT	AREA SERVED	HVAC SUPPLY		HVAC RETURN		HVAC OUTDOOR		OA %		HOOD MAKE-UP		HOOD EXHAUST		GENERAL EXH.	
		DESIGN	ACTUAL	DESIGN	ACTUAL	DESIGN	ACTUAL	DESIGN	ACTUAL	DESIGN	ACTUAL	DESIGN	ACTUAL	DESIGN	ACTUAL
AC-1	KITCHEN	8125	8270	7125	7251	1000	1019	12.3%	12.3%						
AC-2	DINING A	2830	2868	2080	2074	750	794	26.5%	27.7%						
AC-3	DINING B	5000	4723	3645	3343	1355	1325	27.1%	28.1%						
AC-4	PLAY AREA	1800	1803	1500	1504	300	299	16.7%	16.6%						
EF-1	KITCHEN HD											1913	1799		
EF-2	KITCHEN HD											1402	1429		
EF-3	RESTROOMS													375	387
TOTALS		17755	17664	14350	14172	3405	3437			0	0	3315	3228	375	387

NET BUILDING AIRFLOW CALCULATION

TOTALS	DESIGN	ACTUAL
TOTAL OA	3405	3437
TOTAL EXHAUST	3690	3615
NET AIRFLOW	-285	-178

DOOR TESTED	BUILDING PRESSURE MEASUREMENTS (IN. H20)
FRONT	-0.0187
SIDE	-0.0125
REAR	-0.007
AVERAGE	**-0.0127**

FINAL CHECKS

ACTUAL NET AIRFLOW COINCIDES WITH DESIGN: ✓

MEASURED PRESSURES COINCIDES WITH ACTUAL NET AIRFLOW: ✓

PRESSURE FALLS WITHIN IMC TOLERANCE OF +/- 0.02" W.C. ✓

NOTES:

CheckList List

- 01: INSPECTION: TRANE RTU'S
- 02: INSPECTION: EXHAUST FANS
- 03: INSPECTION: CONTROLS
- 04: INSPECTION: HOOD/GREASE DUCT
- 05: INSPECTION: HVAC DUCTWORK
- 06: INSPECTION: OTHER
- 07: INSPECTION: WIF/WIC
- 08: TAB CHECKS
- 09: TRANE SETTINGS
- 10: CONTROLS COMMISSIONING
- 11: FINAL CHECKS
- 12: CLOSEOUT

CheckList Information

Name :	01: INSPECTION: TRANE RTU'S	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	08/05/2025 - Natasha Louw - National TAB		

CheckList Item Details

OVERALL INSPECTIONS	
-Units are level? (Use a bubble level)	Pass
Comment:	
-OA filters are installed?	Pass
Comment:	
-Reliatel: Are the heat exchanger baffles located at the very end of the discharge (against screen)	N/A
Comment:	
-All doors and panels are free from damage?	Pass
Comment:	
-Any other physical damage to note?	Pass
Comment:	
-Clean filters installed inside the units?	Pass
Comment:	
MECHANICAL CHECKS	

-Reliatel: Is the high static drive kit installed on units where it is specified? (Typically kitchen RTU)	N/A
Comment:	

-Reliatel: Is the belt a sufficient size that is included with the high static drive kit?	N/A
Comment:	

-GFI outlet (if installed) is wired and operational?	Fail
Comment: AC3 GFI OUTLET COVER NOT INSTALLED.	

-Is the smoke detector installed/relocated to the correct compartment per remark in the RTU schedule?	Pass
Comment:	

-Grommets installed for GFI outlet wiring? (If applicable)	N/A
Comment: NOT ACCESSIBLE	

-Gas piping installed and valves turned on?	Pass
Comment:	

-Gas piping grommets are installed?	Fail
Comment: AC1 MISSING GROMMET	

-Gas piping is painted with coat Aluminum base paint (should also have a coat of zinc rust primer but likely won't be visible). As per Plumbing specs	Pass
Comment:	

-Piping (condensate and gas) does not obstruct doors or access panels?	Pass
Comment:	

-Hail Guards are installed on the condenser coils	Pass
Comment:	

-Condenser coil is clean and fins are straight?	Pass
Comment:	
-Economizers are functional?	Pass
Comment:	
-Economizer wiring harness is plugged in correctly (Wire colors match on each side of plug)	Yes
Comment:	
-Evaporator coil is clean and fins are straight?	Pass
Comment:	
-Turn off unit and spot check high voltage wiring lugs are tight, no loose wires, etc.	Pass
Comment:	
-Are the power exhaust fan installed on units where specified?	Pass
Comment:	
-Take cover off of the power exhaust fan. Does the blower spin freely and do all wires appear to be landed?	Pass
Comment:	
-Inside the mixed air compartment is the power exhaust shroud assembled correctly including the backdraft damper?	Pass
Comment:	
PLENUM CURB CHECKS (OPEN SUPPLY AIR SIDE PANEL)	
-Do the joints of the curb appear to be sealed well? Is there any gaps or leakage noticeable where the RTU meets the curb?	Pass
Comment:	
-RTU/curb crossmembers are not conflicting? I.e., is the hat channel placement correct on the cross member?	Pass
Comment:	

-Is the insulation secured in place with stick-pins and adhesive? Make sure insulation doesn't peel back.	Pass
Comment:	
-Is there sheet metal angle "nozing" covering insulation at ductwork drops/connections?	N/A
Comment:	
-No high or low voltage wiring is visible inside the discharge air plenum? (Should be MC cable or routed through conduit only)	Pass
Comment:	
CONDENSATE DRAINS - CHECK THAT THEY MATCH DETAIL IN THE PLUMBING DRAWINGS	
-Condensate drains are installed and have union on both sides of P-trap? (per plumbing drawings)	Pass
Comment:	
-Cleanout plug is installed for the lower T fitting	Pass
Comment:	
-Higher T fitting is open to the atmosphere and the top of the opening is below the pipe connection to the RTU?	Pass
Comment:	
-Do condensate lines for each RTU match the sizing shown on the plumbing rooftop drawing? (There should be no reduction in size at any point including the P-trap.)	Pass
Comment:	
-Condensate drains are properly pitched to drain away from the units?	Pass
Comment:	
-Condensate drains have at least 2" rise between connection to unit and the pipe after the P-trap?	Pass
Comment:	
GENERAL LOW VOLTAGE WIRING	
-Grommets are installed around penetrations for wiring that is not in conduit?	N/A

Comment:

NOT ACCESSIBLE

-Are there any flash codes present on the economizer?	Pass

Comment:

-Are any there any loose wires inside the unit that have not been connected to sensors?	Pass

Comment:

RELIATEL LOW VOLTAGE WIRING

-Wires landed to R, G, Y1, Y2, W1, W2, C on thermostat terminal strip?	N/A

Comment:

-Wires landed at P and P1 on the Reliatel Economizer Module and at P and P1 in the Suncoast panel	N/A

Comment:

-Wire from " - " terminal at the humidity sensor landed to terminal 19 "RH-" on the NLTB board.	N/A

Comment:

-Wire from " + " terminal at the humidity sensor landed to terminal 18 "RH-" on the NLTB board.	N/A

Comment:

-Wire for humidstats is landed at 24VAC R terminal on the “Sensor” strip?	N/A

Comment:

-Wire landed to terminal 6 "ESTOP" on the LTB1 terminal strip.	N/A

Comment:

-Is the factory 24V jumper between terminal 5 and 6 removed on the LTB board for ESTOP? (Note: the jumper looks like a small metal bar)	N/A

Comment:

SYMBIO WIRING

-Wires landed at J20 for economizer operation and at P and P1 in the Suncoast panel	Pass
Comment:	
-Wire landed from DI1 in Suncoast panel to EM Stop at terminal J18	Pass
Comment:	
-Wires landed at R, Y1, W1/O, G, W2, Y2, and GND at J21 terminals	Pass
Comment:	
-Wire from "+" terminal at the humidity sensor is landed to 24VDC terminal at J23	Pass
Comment:	
-Wire from "-" terminal at the humidity sensor is landed to "Humidity" terminal at J23	Pass
Comment:	
OTHER	
-Laminated copy of the control wiring is included in each RTU electrical cabinet as per the Controls M Sheet	Pass
Comment:	
-Has mechanical contractor provided a second set of filters for owner (should be stored in space somewhere)	Fail
Comment:	
-Annunciators are the specified Suncoast Keyless type?	Pass
Comment:	
-All annunciators are labeled?	Pass
Comment:	
SEISMIC DETAILS	
-Seismic clips attached to both sides of the unit and secured with screws if specified in the RTU schedule remarks?	Pass

Comment:

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CheckList Information

Name :	02: INSPECTION: EXHAUST FANS	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	08/05/2025 - Natasha Louw - National TAB		

CheckList Item Details

RESTROOM EXHAUST FAN

-Rectangular duct is lined?	Pass
Comment:	
-Round duct is externally insulated?	Pass
Comment:	
-Backdraft damper is installed in duct and operates correctly?	Pass
Comment:	
-Flexible conduit is run up through duct to raceway in fan?	Pass
Comment:	
-Fan is secured to the curb with screws?	Pass
Comment:	
-Speed controller installed and wired?	Pass
Comment:	

UTILITY SET GREASE FANS

-1’ high nozzle is installed? If the fan is within 10' of parapet walls, RTU's, or condensing units, ensure that it extends at least 2" above them.	Pass
Comment:	
-Cook: Joint between the nozzle and the exhaust fan collar has welded bead (not tack weld) so that grease will not accumulate? Caulking not preferred as it falls off.	Pass
Comment:	
-Halton: Gravity damper on discharge nozzle moves freely?	N/A
Comment:	
-G2 drip guard is installed and drain is piped to center of the guard?	Pass
Comment:	
-Transitions from duct to fan, and from fan to nozzle, are bolted and either have fire caulking or gasket?	Pass
Comment:	
-Service disconnect is installed on the outside of the fan and functional?	Pass
Comment:	
-Cook: Belts are properly tensioned? (rotated to 2 tick marks)	Pass
Comment:	
-PVC grease drains pieces are glued together?	Pass
Comment:	
-Pulleys are aligned?	Pass
Comment:	
-Set screws securing pulleys to shafts are tight?	Pass
Comment:	
-Spare belt provided for each fan? (Relocate spare belt to the inside of the door.)	Pass

Comment:	
-Any other defects or quality control issues observed with the fans? For instance - access door missing, name plate wrong/missing, bolts or nuts missing from motor mount, etc	No
Comment:	
-Walk around unit and ensure fan is free of damage?	Pass
Comment:	
-Halton: Static pressure tubes are installed correctly? (Confirm via static pressure)	N/A
Comment:	
-Verify that the nameplate matches design	Pass
Comment:	
-Blower wheel spins freely?	Pass
Comment:	
-Fan is free of noise and vibration?	Pass
Comment:	
UPBLAST GREASE FANS	
-Curb extensions installed?	N/A
Comment:	
-Grease duct is terminated flush with top of curb?	N/A
Comment:	
-Fire caulking around the grease duct flange on top of curb?	N/A
Comment:	
-Drip guard is installed and drain is piped to center of the guard?	N/A
Comment:	

-Conduit is long enough so that fan can fully hinge back?	N/A
Comment:	

-Fan hinges in correct direction as specified in mechanical plans? If not shown on plans, are they all hinged in the same direction?	N/A
Comment:	

-Belts are properly tensioned? (rotated to 3 tick marks)	N/A
Comment:	

-Service disconnect is installed and functional?	N/A
Comment:	

-PVC grease drains pieces are glued together?	N/A
Comment:	

-Pulleys are aligned?	N/A
Comment:	

-Set screws securing pulleys to shafts are tight?	N/A
Comment:	

-Spare belt provided for each fan?	N/A
Comment:	

-Walk around unit and ensure fan is free of damage?	N/A
Comment:	

-Verify that the nameplate matches design	N/A
Comment:	

-Blower wheel spins freely?	N/A
Comment:	

-No major leakage around the base of the fan?	N/A
Comment:	
-Fan is free of noise and vibration?	N/A
Comment:	

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CheckList Information

Name :	03: INSPECTION: CONTROLS	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	08/05/2025 - Natasha Louw - National TAB		

CheckList Item Details

SENSORS (OVERALL CHECKS)

-Sensors labeled on wall adjacent to sensors (unless plans specifically state otherwise) and have the correct unit number and indicate whether they are temp or humidity?	Pass
Comment:	
-Temperature and humidity sensors are installed where shown on the drawing?	N/A
Comment: SENSOR LOCATIONS NOT SPECIFIED ON DRAWINGS	

TEMPERATURE SENSORS

-Temperature sensors are wired to the correct thermostat? (Check by having someone hold a handwarming pad or lighter under the sensor from a safe distance and verifying temperature rise on the thermostat)	Pass
Comment:	
-Verify that manfacturer/model stamped on the outer jacket of the temperature sensor wiring cables is Connect Air model W221P-2003OR. The wire should be a shielded twisted pair (i.e., only two wires), with one drain wire. If other manufacturers are used, note the manufacturer/model and take picture for report.	Pass
Comment:	
-Is RS1 on each temperature sensor wired to RS-1 in the Suncoast panel?	Pass
Comment:	

-Is RS+V on each temperature sensor wired to RS+V in the Suncoast panel?	Pass
Comment:	
-Is RS2 on each temperature sensor wired with DRAIN wire to RS2 in the Suncoast panel?	Pass
Comment:	
HUMIDITY SENSORS	
-Verify that manufacturer/model stamped on the outer jacket of the humidity sensor wiring cables matches the specification (Connect Air model W221P-2003 is preferred)	Pass
Comment:	
-Covers of humidstats are secured?	Pass
Comment:	
-LENNOX: For all humidity sensors: 2 conductor shielded cable has one wire landed to Vin, one to GND, and the shield wire is not connected.	N/A
Comment:	
-LENNOX: For all humidity sensors: For second shielded cable, one wire is landed to Vout and the shield wire is not connected.	N/A
Comment:	
-TRANE: For all humitiy sensors, one wire landed to + and one wire landed to - and the shield wire is not connected.	Pass
Comment:	
PANEL	
-High voltage wiring is run through the cable routing compartment and cover is installed?	Pass
Comment:	
-Low voltage wiring installed at all terminals shown on specification for each RTU—E1, DI-1, G, Y2, Y1, W2, W1, R, C, RS2, RS1, RS+V	Pass
Comment:	
-Thermostats are powered?	Pass

Comment:

-Overall, is panel is completely wired with no jumpers, installation complete, and is fully operational?	Pass

Comment:

-LENNOX units - Is OCP wired to P terminal in SEC panel, and P1 jumpered to R in the SEC panel	N/A

Comment:

-TRANE units - Are P & P1 terminals landed between the SEC panel and economizer module	Pass

Comment:

-Are R-1, R-2, and R-3 (R-4 and R-5 if applicable) ice cube relays factory wired properly from SEC inside the panel. Include photo	Pass

Comment:

-Is R-6 (fire interlock) relay factory wired properly from SEC inside the panel. Take photo and include in TAB report. Include photo	Pass

Comment:

02/01/2026

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CheckList Information

Name :	04: INSPECTION: HOOD/GREASE DUCT	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	08/05/2025 - Natasha Louw - National TAB		

CheckList Item Details

Picture document all issues with full description. Needs to include the location of the specification (ex:Page, specification #, detail #) in the drawings. If you see something, say something. If there are any other issues you identify outside of these checklists note those in the report as well. All issues should be communicated with the MC onsite

HOODS

-Are hoods hung at the correct height? (check Halton spec for exact dimension - typically 64". Halton spec supercedes mechanical drawings)	Pass
Comment:	
-Make sure pin and sleeve electrical box is assembled correctly on all hoods	Pass
Comment:	
-Take filters out of bank. Are there any parts laying in the grease trough and if so do they need to be installed?	Pass
Comment:	
-Adjust the slider on filter bank so that the filters have tight fit? Ensure no pieces are missing from the slider	Pass
Comment:	
-Side brackets installed in between hoods and counters?	Pass
Comment:	

-Any threaded holes underneath hood canopy are filled?	Pass

Comment:

.

-All hoods supported at factory support points with threaded rod (3/8” typ.)?	Pass

Comment:

-If threaded rod is exposed below ceiling, is it inside stainless steel tubing and is the escutcheon installed?	Pass

Comment:

-ANSUL pull stations are labeled with red bakelite label with 1/4" high white letters indicating the hoods served?

Comment:

Missing labels for pull stations

Is the ANSUL system installation complete?	Pass

Comment:

-Curb caps secured to the curb where roof top grease duct penetrates into space? (if no roof top grease duct put N/A)	Pass

Comment:

-Capture jet fans are hard piped?	Pass

Comment:

-Capture jet speed controllers are wired and functional.	Pass

Comment:

-Capture jet fans are installed the correct direction (so they supply air to hood canopy and do NOT exhaust)	Pass

Comment:

-Side Capture jet (if applicable) is installed with fan guard and stand?	Pass

Comment:

-Hoods are secured to the wall at all pre-punch hole locations?	Pass

Comment:

-Is the fry chute installed?	Pass

Comment:

-Are the grease cups installed?	Pass

Comment:

-Are gusset bracket bolts installed (typically on Hood 2)?	Pass

Comment:

-Ensure there is no damage to the hoods?	Pass

Comment:

GREASE DUCTWORK

-EF-1 main drop is equal distance between both risers unless specified otherwise on drawings	Pass

Comment:

-Unifrax Fyrewrap brand is used on all grease ductwork	Fail

Comment:

3M fire wrap used.

-All turns in grease duct are long radius type elbows and follow equation Radius = (3 * W) / 2. (Measured to the duct centerline). No mitered fitting allowed. (Both in space and on roof)	Pass

Comment:

-Each grease cleanout doors meets specifications, is assembled correctly, and is the correct size? (Outer plate is not required for rooftop ductwork - indoors only)	Pass

Comment:

-Each grease cleanout doors are installed in the location shown on drawing?	Pass

Comment:

-Balancing dampers are installed if specified?	Pass

Comment:	
-Roof top grease duct is painted white in a professional manner? If grease duct is not painted, recommend that all rust be removed prior to painting.	Pass
Comment:	
-Rooftop grease duct is supported at 6' intervals maximum with supports shown in specification?	Pass
Comment:	
-Rooftop grease duct is supported at each duct drop into the space?	Pass
Comment:	

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CheckList Information

Name :	05: INSPECTION: HVAC DUCTWORK	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	08/05/2025 - Natasha Louw - National TAB		

CheckList Item Details

Picture document all issues with full description. Needs to include the location of the specification (ex:Page, specification #, detail #) in the drawings. If you see something, say something. If there are any other issues you identify outside of these checklists note those in the report as well. All issues should be communicated with the MC onsite

MAIN TRUNKS (SPOT CHECK)

-All ductwork (w/ exception of RR fan) is externally insulated. No liners are allowed and must be removed.	Pass
Comment:	
-Ductwork insulation has minimum 6 R-Value installed?	Pass
Comment:	
-Canvas connector installed between the main supply & return drops and RTU's.	Pass
Comment:	
-Check that base-pan connections are seated and aligned correctly (i.e., duct connections at the RTU)?	Pass
Comment:	
-Turning vanes on main supply drop should be single thickness and not double thickness? (not necessary in returns)	Pass
Comment:	

-Ducts 24” or wider have stick pins and stick pins are covered with duct tape or mastic?	Pass
Comment:	
-All seams in insulation are taped?	Pass
Comment:	
-Insulation is not wet?	Pass
Comment:	
-Does the return air drop span-out with a transition per specification where applicable (i.e., is it a tapered transition from opening at unit to full size on plans and NOT hard mitred transition)	Pass
Comment:	
-Check that sealant used on ductwork connections (spot check 1)	Pass
Comment:	
GRILLE TAKEOFFS (SPOT CHECK)	
-On horizontal ductwork damper handles are located on the left or right of the duct?	Fail
Comment: AC3: Diffuser 3-5 has handle on bottom. MC could not put handle on side due to proximity to existing duct.	
-On vertical ductwork damper handles are located on the bottom of the duct? (Typically only applies to returns)	N/A
Comment: NO VERTICAL DUCT	
-Do all start collars and Rusking In-Line dampers match specification and appear to be purchased thru Tom Barrow Co	Fail
Comment: -AC4 has wrong damper type installed. (Supply) -AC2 has wrong damper type installed. (Return)	
-Fluorescent ribbon is attached to each damper handle?	Pass
Comment:	
-Minimum 1’ rigid duct after start collar?	Pass

Comment:	
-Flex duct is installed on each duct run after rigid duct and is less than 48” in length?	Pass
Comment:	
-Rigid hard pipe with 90 degree fitting and riser connecting to the grille?	Fail
Comment: AC1 missing rigid 90 on return grille outside restroom. (Flex is pinched)	
-Drawband and tape are used to secure inner core of the flex duct? (Spot check)	Pass
Comment:	
-Drawband or tape is used on outer jacket?	Pass
Comment:	
-Tops of diffusers are insulated?	Pass
Comment:	
-Mastic at rigid connections to diffuser?	Pass
Comment:	
OVERALL	
-Any leaky ductwork observed?	Pass
Comment:	
-Ductwork supported properly?	Pass
Comment:	
GRD'S	
-Do all diffusers match specified models and appear to be purchased thru Tom Barrow Co.?	Pass
Comment:	
-Do all diffusers appear to be clean of dust and debris?	Pass

Comment:

-Any damage to diffusers?	Pass

Comment:

-All diffusers installed at the correct locations?	Fail

Comment:

AC1: Diffuser moved from right of hood 1 to in front of hood 1. (Obstruction in location of original takeoff)

-Ensure that deflectors for diffusers in entires, Drive thru cockpit, office, adjacent to soffits, restrooms, RR vesibule are closed as shown on the mechanical plan.	Pass

Comment:

-Look at plans and adjust pattern deflectors to throw straight down for diffusers near hood where noted.	Pass

Comment:

-Adjust pattern deflectors for any other diffusers where noted on plans (Either included as a note in plans or as blacked out triangle sections of diffuser.)	Pass

Comment:

-Air diffuser air pattern blades adjusted uniformly?	Pass

Comment:

-Is space free of drafting?	Pass

Comment:

-Notice any squeaking damper noise? If so, tighten wing-nut on opposite side of stand-off.	Pass

Comment:

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CheckList Information

Name :	06: INSPECTION: OTHER	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	08/05/2025 - Natasha Louw - National TAB		

CheckList Item Details

Picture document all issues with full description. Needs to include the location of the specification (ex:Page, specification #, detail #) in the drawings. If you see something, say something. If there are any other issues you identify outside of these checklists note those in the report as well. All issues should be communicated with the MC onsite

AIR DOORS

Does the hanging height of the air doors match design?	Pass
Comment:	
-Installed in proper location?	Pass
Comment:	
-Correct model/manufacturer?	Pass
Comment:	
-Is the Drive-thru air curtain diverter box installed and allows enough room for servicing the air filter?	Pass
Comment:	
-Timer is set to minimum position (0)?	Pass
Comment:	
-They are operating correctly?	Pass

Comment:	
-Are switches installed?	Pass
Comment:	
-For drive thru air door, if MP-1-30 type or similar, door is adjusted so it is not noisey and directed at the center of the drive thru window?	Pass
Comment:	
-For drive thru air door, if Chameleon type, fan speed is set as high as possible without creating disruptive noise, and air is directed to center of walkway?	Pass
Comment:	
CANOPY	
Are canopy fans and heaters installed and controls complete?	Pass
Comment:	

08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

CheckList Information

Name :	07: INSPECTION: WIF/WIC	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	08/05/2025 - Natasha Louw - National TAB		

CheckList Item Details

WALK IN COOLERS (WIC) & WALK IN FREEZERS (WIF)	
CONDENSERS	
Located at the correct spot on the roof per plans	
Comment:	
Ensure the fan discharge is oriented the correct direction per plans	Pass
Comment:	
Hail guards installed (only required in AL, AR, CO, FL, GA, KY, LA, MS, OK, OR, TN, TX, UT, WA)	N/A
Comment:	
Disconnects present and labeled.	Pass
Comment:	
Condensers running properly and are not short cycling.	Pass
Comment:	
Specified aluminum stands in placed and appear attached to decking.	Pass
Comment:	

Condensers attached to railing at anchor points per specification.	
Comment:	
Clearances & accessibility is appropriate.	Pass
Comment:	
Line-sets and electrical whips secured in place.	Pass
Comment:	
All PVC fittings are glued for goosenecks	Pass
Comment:	
Goosenecks attached to structure and is secured in place.	Pass
Comment:	
Spray foam used inside goosenecks on roof. Silicone caulking on top and the silicone is cut flush.	Pass
Comment:	
Roofing membrane appears to be sealed properly to riser.	Pass
Comment:	
ABOVE CEILING INSPECTIONS	
No excessive lengths of line-sets present and is routed & supported properly.	Pass
Comment:	
Electrical entries sealed with silicone inside ceiling panel and 2 layers of ¼" foam tape 12" above top of ceiling panel.	Pass
Comment:	
Proper escutcheons used on penetrations	Pass
Comment:	
Piping insulation sealed tightly to escutcheon.	Pass

Comment:

Foam used behind escutcheons.	Pass

Comment:

BELOW CEILING INSPECTIONS

WIF is holding temperature at approximately 0 degrees	Pass

Comment:

WIF holding at 12 degrees

WIC is holding temperature at approximately 35 degrees	Pass

Comment:

Measure temperature inside the WIC and WIF and make sure it is accurate.	Pass

Comment:

Evaporator fans appear to be running properly with all fans spinning (may need to open door to get them to turn on)	Pass

Comment:

P-traps constructed and installed per specification (WIF p-trap in WIC, and WIC on outside of cooler above funnel)	Fail

Comment:

WIF Ptrap outside of WIC tied into same pipe as WIC

Drain routed, secured, and penetrations sealed with foam & escutcheons.	Pass

Comment:

Freezer heat tape wrapped around pipe and is working.	Pass

Comment:

All drain piping insulated on inside of WIF side.	Pass

Comment:

Relief vent appears to be wired.	Pass

Comment:	
WIF door sweep is sealed tightly to threshold when door is closed (do light test, no light should be present). Stand inside the WIF with the light off.	Pass
Comment:	
WIC door sweep is sealed tightly to floor when door is closed (do light test, translucent light is okay). Stand inside the WIF with the light off.	Fail
Comment: Can see lots of light under door seal	
MISCELLANEOUS	
Installation checklist complete	N/A
Comment:	

08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

CheckList Information

Name :	08: TAB CHECKS	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	08/05/2025 - Natasha Louw - National TAB		

CheckList Item Details

TEST, ADJUST, AND BALANCE ALL EQUIPMENT:

Is space free of drafting?	Pass
Comment:	

Is space comfortable in all areas?	Pass

Comment:

Kitchen is set to 71 (AC1) Side dining, RR, and office set to 74 (AC2) Dining area and drive thru set to 75 (AC3) Dining area set to 75 (AC4)

Is the space free of ventilation noise?	Pass
Comment:	

ZONE DAMPER - OFFICE

Maximum airflow set to design?	Pass
Comment:	

Thermostat is installed and functional?	Pass
Comment:	

VARITHERM DIFFUSER - OFFICE

Maximum airflow is set to design using balancing lever? (Release when finished balancing)	Pass

Comment:

OVERALL

Is there anything outside of the checklists that appears out of sort?

Comment:

No.

08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

CheckList Information

Name :	09: TRANE SETTINGS	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	08/05/2025 - Natasha Louw - National TAB		

CheckList Item Details

FAT (Fresh air tempering)

Confirm on plans if fresh air tempering should be installed? (typically mandatory in Northeast, Midwest, Northwest, VA, KY, and some areas of NC/TN) Then complete the following items if applicable	Fail
Comment: Fresh Air Tempering kit not installed. (ALL RTUs)	
Fresh air tempering sensor is installed in the supply duct after the first 90 degree elbow.	Fail
Comment:	
Penn Controller is installed and functional	Fail
Comment:	
ICM104 timer is installed and set to 4 mins	Fail
Comment:	
RIB relay is installed	Fail
Comment:	
Penn controller is set heat cut-out (OFF) at the following setpoints: Kitchen: 65 Drive-thru / Serving: 67 Dining / Play Area: 68 BOH: 67	Fail

Comment:

Penn controller is set for heat cut-in (ON) at the following setpoints: Kitchen: 60 Drive-thru / Serving: 62 Dining / Play Area: 63 BOH: 62	Fail

Comment:

Penn controller is set for SF= 0 sensor failure relay de-energize	Fail

Comment:

RELIATEL SETTINGS

Set dehumidification setpoint at the RTOM circuit board using the "DEHMID" potentiometer. Set to 60% RH by adjusting it to 3 o'clock position approximately. Setting can be verified through TDS touchscreen or by reading potentiometer output, should be 2.18 DC volts.

Comment:

Mark the final dehumidification potentiometer position with white out or paint

Comment:

Typically, CFA Reliatel Units are multi-speed (VAV). Is the unit setup for VAV?	N/A

Comment:

If the unit was found set up for VAV, then the outside air damper must be set for all three fan speeds (high, med, and low)

Comment:

"Exhaust SP" dial is set to approximately 50% or higher so that the power exhaust stays off normally? (Park setpoint with whiteout/paint) NOTE: Reliatel Units at CFA typically do not have power exhaust.

Comment:

SYMBIO SETTINGS

Dehumidification is set to 60% with 3% offset for Unoccupied & Occupied.	Pass

Comment:

Minimum fan speed is set to 100%	Pass

Comment:

Supply Fan Compensation is Disabled.	Yes
Comment:	

08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

CheckList Information

Name :	10: CONTROLS COMMISSIONING	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	08/05/2025 - Natasha Louw - National TAB		

CheckList Item Details

OCCUPIED / UNOCCUPIED SEQUENCE OF OPERATION

Turn switch on Suncoast panel to occupied mode and check the following for all RTU's:

All blowers turn on (I.e., signal to G)? (Except the Playroom unit which will stay in auto blower)	Pass
Comment:	
All economizers open to minimum position? (I.e., signal to OCP terminal)	Pass
Comment:	
Temperatures on thermostats at occupied settings (73 cooling / 69 heating)	Pass
Comment:	
Hood exhaust and Capture Jets turn on?	Pass
Comment:	

Turn switch on Suncoast panel to unoccupied mode and check the following for all RTU's:

All blowers go to auto mode?	Pass
Comment:	
All economizers close? (I.e., no signal to the OCP terminal)	Pass

Comment:	
Temperatures on thermostats at unoccupied settings (80 cooling / 55 heating). Unoccupied cooling may need to be manually changed to 80.	Fail
Comment: ALL UNITS: 76 cool/66 heat	
Hood exhaust and Capture Jets turn off?	Pass
Comment:	
TEMPERATURES	
Turn on temp sensor reading for all thermostats	Pass
Comment:	
Measured temperature at each sensor matches actual temperature on thermostat?	Pass
Comment:	
Measured temperature at each zone damper thermostat matches displayed temprature?	
Comment:	
ZONE DAMPER	
Zone damper closes and opens correctly when a change is made at the thermostat?	
Comment:	
Zone damper thermostats are installed and functional?	
Comment:	

08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

CheckList Information

Name :	11: FINAL CHECKS	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	08/05/2025 - Natasha Louw - National TAB		

CheckList Item Details

FINAL TESTS

CONFIRM BEFORE COMPLETING FINAL TESTS

Roof hatch, exterior doors, and windows all installed?	Pass
Comment:	
Ceiling tiles and hard ceilings are completed with no openings to the attic space?	Pass
Comment:	

HOOD CAPTURE TEST

List kitchen equipment turned on for testing

Comment:

EF1 EF2

List smoke candle type used

Comment:

S102

Smoke test capture - Perimeter of hood (%)

Comment:

100% Smoke capture

Smoke test capture - Top of cooking surface (%)	
Comment:	
100% smoke capture	
WITNESS	
Date test was completed	08/21/2025
Comment:	
TAB tech name / Firm	
Comment:	
Kalen Kemp / National TAB	
Site super name / Firm	
Comment:	
Rocky Allen / Horizon	
Owner representative name / Firm (if Applicable)	
Comment:	
Video taken of smoke tests?	
Comment:	
YES	
BUILDING PRESSURE TEST	
Do actual net building airflow, design net building airflow, and pressure coincide? If not why? (All three should either be positive or negative)	Pass
Comment:	
VELOCITY OF SERVING WINDOW	
Transfer velocity for Serving Window (window between kitchen and serving) is 50-80FPM	N/A
Comment:	

08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

CheckList Information

Name :	12: CLOSEOUT	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	08/05/2025 - Natasha Louw - National TAB		

CheckList Item Details

Final punchlist sent to all on scheduling email. Copy in Jeff Lovvorn and mechanical contractor	
Comment:	
All economizer positions are marked and dated on the actuators?	Pass
Comment:	
Mark dehumidification sticker on the appropriate Lennox factory sticker (On C-Cabinets it is inside the compressor door. On A&B Cabinets it is inside the Prodigy compartment door)	N/A
Comment:	
Each belt tensioner is marked?	Pass
Comment:	
If Halton KBD dampers are installed, positions are marked and pictures taken of marked locations	Pass
Comment:	
Capture jet final settings are marked (document with pictures)?	Pass
Comment:	

Each balancing damper (return, supply, and exhaust) marked with a marker or paint? (Take picture of one marked damper)	
Comment:	

TAB STICKERS

TAB sticker put on all equipment on the roof? (Put RTU labels inside compressor door. Put EF label on motor mounting bracket)	Fail
Comment: No TAB stickers on equipment. See TAB report for settings/parameters.	
TAB stickers on each CJ fan?	Fail
Comment:	
TAB sticker on each KBD/MBD?	Fail
Comment: KBD dampers marked with permanent marker.	
TAB sticker inside Suncoast panel for AC & EF filters/belts sizes	
Comment:	

https://app.smartsheet.com/b/form/a2214f616df14dc5befd6645d39d9144

Comment:

PICTURES

Picture of each AC, EF, and hood is added to each asset	Pass
Comment:	
Picture of marked belt tensioner on AC's and EF's is added to each asset	
Comment:	
Picture of economizer position marked and dated for each AC is added to each asset	Pass
Comment:	
Picture of painted hood balancing dampers added to each hood asset	Pass

Comment:	
Capture jet final settings marked and data added to each hood asset	Pass
Comment:	
Picture of one marked balancing damper is uploaded to any diffuser or RTU asset	
Comment:	

National TAB

Project: 08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

System/Unit: AHU/RTU

Asset: AC1 AREA:KITCHEN

Unit Data		
	Design	**Actual**
MFG	TRANE	TRANE
Serial Num	-	251310526D
Model Num	YSJ300A3	YSK300A3
Type	AC	AC
Configuration	VERTICAL	VERTICAL
Num OA Filters 1	-	1
OA Filter Size 1	-	16.75X65.875
Num Final Filter 1	-	8
Final Filter Size 1	-	20X24X2

Motor Data		
	Design	**Actual**
Motor MFG	-	EBM PAPST
Frame	-	IP20
Horsepower	3.0	3.0
Motor Rpm	-	1790
Phase	3	3
Rated Voltage	208	200-240
Rated Amperage	-	8.8

Drive Data	
	Actual
Motor Sheave Size	DD
Motor Bore Size	DD
Motor Sheave SetPt	DD
Fan Sheave Size	DD
Fan Sheave Bore	DD
Belt CL Distance	DD
Num of Belts	DD
Belt Size	DD
Belt Alignment	DD

Test Data		
	Design	**Actual**
SF CFM	8125	8270
SF RPM	-	1702
RA CFM	7125	7021
OA CFM	1000	1249
RL Voltage	-	209
RL Amperage	-	7.81
SF Rotation	-	COUNTERCLOCKWISE
SF System SetPt	-	92%
RA Damper Position	-	85%
Min OA Damper Position	-	15%
Min OA Damper Type	-	ECON
OA Enthalpy Setpt	-	25 BTU/LB

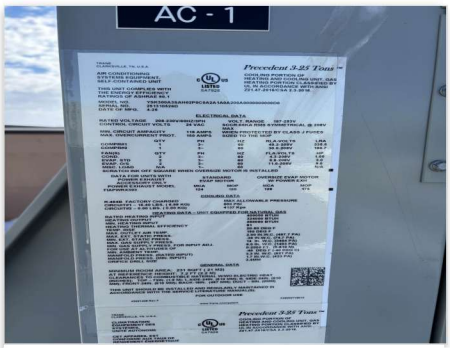
Performance Data		
	Design	**Actual**
MA Plenum SP	-	-1.11”
Fan Suction SP	-	-2.31”
Fan Discharge SP	-	0.49”
Total ESP	0.70"	1.60”
Fan Total SP	-	2.80”

General	
	Actual
Fan Rotation Correct	YES
Unit Filters Clean	YES
Condensate Drain Installed	YES

Completed By: Kalen Kemp on 01/31/2026

Notes:

Unit Data - PHOTO LOG



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National TAB

Project:08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO
(INDEPENDENCE CENTER FSU) REINVEST

Diffuser Supply (GRD)

AC1/KITCHEN

Asset									
Asset Name	**Location**	**Type**	**Size**	**DESIGN CFM**	**AK**	**CFM(1)**	**CFM(2)**	**FINAL CFM**	**% to design**
SGRD1	KITCHEN	A	10"	410	1.0	434	535	378	92.2
SGRD2	KITCHEN	A	12"	545	1.0	487	599	496	91.0
SGRD3	KITCHEN	A	10"	440	1.0	481	592	438	99.5
SGRD4	KITCHEN	B	12"	680	1.0	620	754	715	105.1
SGRD5	KITCHEN	B	14"	885	1.0	889	1079	920	104.0
SGRD6	KITCHEN	A	12"	680	1.0	577	706	739	108.7
SGRD7	KITCHEN	B	14"	885	1.0	748	911	907	102.5
SGRD8	KITCHEN	B	14"	885	1.0	624	745	906	102.4
SGRD9	KITCHEN	A	12"	610	1.0	577	706	649	106.4
SGRD10	KITCHEN	A	10"	410	1.0	460	569	428	104.4
SGRD11	KITCHEN	A	12"	610	1.0	517	643	608	99.7
SGRD12	KITCHEN	A	12"	610	1.0	390	482	615	100.8
SGRD13	MULTI-PURPOSE	A	8"	150	1.0	122	135	153	102.0
SGRD14	MULTI-PURPOSE	A	10"	150	1.0	71	96	149	99.3
SGRD15	OFFICE	A	10"	175	1.0	64	83	169	96.6
Total				8125		7061	8635	8270	101.78%

Completed By: Kalen Kemp on 01/31/2026

National TAB

Project: 08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

System/Unit: AHU/RTU

Asset: AC2 AREA:DINING A

Unit Data		
	Design	**Actual**
MFG	TRANE	TRANE
Serial Num	-	252110940L
Model Num	YSJ102A3	YSK102A3
Type	AC	AC
Configuration	VERTICAL	VERTICAL
Num OA Filters 1	-	1
OA Filter Size 1	-	22.375X37
Num Final Filter 1	-	3
Final Filter Size 1	-	16X24X2
Num Final Filter 2	-	2
Final Filter Size 2	-	18X24X2

Motor Data		
	Design	**Actual**
Motor MFG	-	EBM PAPST
Frame	-	IP20
Horsepower	3.0	3.0
Motor Rpm	-	1790
Phase	3	3
Rated Voltage	208	200-240
Rated Amperage	-	8.8

Drive Data	
	Actual
Motor Sheave Size	DD
Motor Bore Size	DD
Motor Sheave SetPt	DD
Fan Sheave Size	DD
Fan Sheave Bore	DD
Belt CL Distance	DD
Num of Belts	DD
Belt Size	DD
Belt Alignment	DD

Test Data		
	Design	**Actual**
SF CFM	2830	2868
SF RPM	-	1055
RA CFM	2080	2075
OA CFM	750	794
RL Voltage	-	210
RL Amperage	-	2.15
SF Rotation	-	COUNTERCLOCKWISE
SF System SetPt	-	57% (34.2 HZ)
RA Damper Position	-	72%
Min OA Damper Position	-	28%
Min OA Damper Type	-	ECON
OA Enthalpy Setpt	-	25 BTU/LB

Performance Data		
	Design	**Actual**
MA Plenum SP	-	-0.27”
Fan Suction SP	-	-0.72”
Fan Discharge SP	-	0.19”
Total ESP	0.70"	0.46”
Fan Total SP	-	0.91”

General	
	Actual
Fan Rotation Correct	YES
Unit Filters Clean	YES
Condensate Drain Installed	YES

Completed By: Kalen Kemp on 01/31/2026

Notes:

Unit Data - PHOTO LOG

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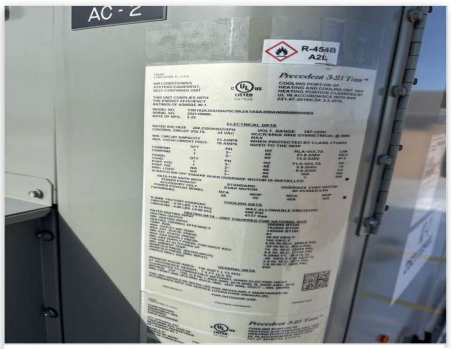

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National TAB

Project:08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO
(INDEPENDENCE CENTER FSU) REINVEST

Diffuser Supply (GRD)

AC2/DINING A

Asset									
Asset Name	**Location**	**Type**	**Size**	**DESIGN CFM**	**AK**	**CFM(1)**	**CFM(2)**	**FINAL CFM**	**% to design**
SGRD1	DINING A	A	14"	520	1.0	1034	539	539	103.7
SGRD2	DINING A	A	14"	520	1.0	972	537	537	103.3
SGRD3	DINING A	A	14"	520	1.0	863	552	552	106.2
SGRD4	WOMENS RR	J	8"	155	1.0	118	150	150	96.8
SGRD5	MENS RR	J	8"	155	1.0	253	147	147	94.8
SGRD6	WOMENS RR	A	12"	280	1.0	456	269	269	96.1
SGRD7	OFFICE	F	12"	160	1.0	124	149	149	93.1
SGRD8	SERVING		14"	520	1.0	1173	525	525	101.0
Total				2830		4993	2868	2868	101.34%

Completed By: Kalen Kemp on 01/31/2026

National TAB

Project: 08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

System/Unit: AHU/RTU

Asset: AC3 AREA:DINING B

Unit Data		
	Design	**Actual**
MFG	TRANE	TRANE
Serial Num	-	251911470L
Model Num	YSJ150A3	YSK150A3
Type	AC	AC
Configuration	VERTICAL	VERTICAL
Num OA Filters 1	-	1
OA Filter Size 1	-	22.375X37
Num Final Filter 1	-	3
Final Filter Size 1	-	18X24X2
Num Final Filter 2	-	3
Final Filter Size 2	-	18X18X2

Motor Data		
	Design	**Actual**
Motor MFG	-	EBM PAPST
Frame	-	IP20
Horsepower	4.6	4.85
Motor Rpm	-	1940
Phase	3	3
Rated Voltage	208	200-240
Rated Amperage	-	11.0

Drive Data	
	Actual
Motor Sheave Size	DD
Motor Bore Size	DD
Motor Sheave SetPt	DD
Fan Sheave Size	DD
Fan Sheave Bore	DD
Belt CL Distance	DD
Num of Belts	DD
Belt Size	DD
Belt Alignment	DD

Test Data		
	Design	**Actual**
SF CFM	5000	4925
SF RPM	-	1591
RA CFM	3645	3545
OA CFM	1355	1380
RL Voltage	-	214
RL Amperage	-	6.34
SF Rotation	-	COUNTERCLOCKWISE
SF System SetPt	-	82% (49.2 Hz)
RA Damper Position	-	65%
Min OA Damper Position	-	35%
Min OA Damper Type	-	ECON
OA Enthalpy Setpt	-	25 BTU/LB

Performance Data		
	Design	**Actual**
MA Plenum SP	-	-0.62””
Fan Suction SP	-	-1.50”
Fan Discharge SP	-	0.42”
Total ESP	0.70"	1.04”
Fan Total SP	-	1.92”

General	
	Actual
Fan Rotation Correct	YES
Unit Filters Clean	NO
Condensate Drain Installed	YES

Completed By: Kalen Kemp on 02/01/2026

Notes:

Unit Data - PHOTO LOG

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Diffuser Supply (GRD)

AC3/DINING B

Asset									
Asset Name	**Location**	**Type**	**Size**	**DESIGN CFM**	**AK**	**CFM(1)**	**CFM(2)**	**FINAL CFM**	**% to design**
SGRD1	ENTRY B	C	10"	375	1.0	459	381	343	91.5
SGRD2	DINING B	A	10"	300	1.0	520	339	274	91.3
SGRD3	DINING B	A	10"	300	1.0	457	289	293	97.7
SGRD4	DINING B	A	10"	300	1.0	360	335	281	93.7
SGRD5	DINING B	A	8"	250	1.0	355	318	248	99.2
SGRD6	DINING B	A	8"	250	1.0	168	170	173	69.2
SGRD7	DINING B	A	10"	300	1.0	375	279	272	90.7
SGRD8	DINING B	A	10"	300	1.0	363	313	278	92.7
SGRD9	DINING B	A	10"	300	1.0	472	406	295	98.3
SGRD10	DINING B	C	12"	560	1.0	605	564	541	96.6
SGRD11	DINING B	A	10"	300	1.0	416	388	276	92.0
SGRD12	SERVING	A	12"	400	1.0	183	159	382	95.5
SGRD13	SERVING	A	12"	415	1.0	502	457	452	108.9
SGRD14	DRIVE THRU	A	16"	650	1.0	684	600	615	94.6
Total				5000		5919	4998	4723	94.46%

Completed By: Kalen Kemp on 02/01/2026

Asset	Notes	Date	Written By
SGRD6	-DIFFUSER HAS PINCHED FLEX RUNNING TO IT. UNABLE TO CLOSE DOWN REMAINING DAMPERS TO INCREASE AIRFLOW WITHOUT BEING A DETRIMENT TO THE SYSTEM AS A WHOLE. EXISTING DUCT THAT SERVES OPEN DINING AREA. NOT GOING TO CAUSE C OMFORT ISSUE.	02/10/2026	Will Turnbough

National TAB

Project: 08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

System/Unit: AHU/RTU

Asset: AC4 AREA:PLAY AREA

Unit Data		
	Design	**Actual**
MFG	TRANE	TRANE
Serial Num	-	252111662L
Model Num	YHC067E3	YHK060A3
Type	AC	AC
Configuration	VERTICAL	VERTICAL
Num OA Filters 1	-	1
OA Filter Size 1	-	22.375X37
Num Final Filter 1	-	3
Final Filter Size 1	-	16X24X2
Num Final Filter 2	-	2
Final Filter Size 2	-	18X24X2

Motor Data		
	Design	**Actual**
Motor MFG	-	EBM PAPST
Frame	-	IP20
Horsepower	1.0	4.0
Motor Rpm	-	1790
Phase	3	3
Rated Voltage	208	200-240
Rated Amperage	-	8.8

Drive Data	
	Actual
Motor Sheave Size	DD
Motor Bore Size	DD
Motor Sheave SetPt	DD
Fan Sheave Size	DD
Fan Sheave Bore	DD
Belt CL Distance	DD
Num of Belts	DD
Belt Size	DD
Belt Alignment	DD

Test Data		
	Design	**Actual**
SF CFM	1800	1803
SF RPM	-	851
RA CFM	1500	1504
OA CFM	300	299
RL Voltage	-	210
RL Amperage	-	1.40
SF Rotation	-	COUNTERCLOCKWISE
SF System SetPt	-	46% (27.6 Hz)
RA Damper Position	-	80%
Min OA Damper Position	-	20%
Min OA Damper Type	-	ECON
OA Enthalpy Setpt	-	25 BTU/LB

Performance Data		
	Design	**Actual**
MA Plenum SP	-	-0.25”
Fan Suction SP	-	-0.50”
Fan Discharge SP	-	0.39”
Total ESP	0.65"	0.64”
Fan Total SP	-	0.89”

General	
	Actual
Fan Rotation Correct	YES
Unit Filters Clean	YES
Condensate Drain Installed	YES

Completed By: Kalen Kemp on 01/31/2026

Notes:

Unit Data - PHOTO LOG

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National TAB

Project:08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

Diffuser Supply (GRD)

AC4/PLAY AREA

Asset									
Asset Name	**Location**	**Type**	**Size**	**DESIGN CFM**	**AK**	**CFM(1)**	**CFM(2)**	**FINAL CFM**	**% to design**
SGRD1	PLAY AREA	A	10"	450	1.0	1000	482	471	104.7
SGRD2	PLAY AREA	A	10"	450	1.0	903	405	434	96.4
SGRD3	PLAY AREA	A	12"	450	1.0	1079	520	448	99.6
SGRD4	PLAY AREA	A	10"	450	1.0	820	398	450	100.0
Total				1800		3802	1805	1803	100.17%

Completed By: Kalen Kemp on 01/31/2026

National TAB

Project: 08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

System/Unit: FAN - Exhaust

Asset: EF1 AREA:KITCHEN HD 1

Unit Data		
	Design	**Actual**
MFG	LOREN COOK	LOREN COOK
Model Num	150V5B	150 CPS 150 CPS S
Serial Num	-	050SL60424-00/0000701
Type	UPBLAST	UPBLAST
Configuration	VERTICAL	HORIZONTAL

Motor Data		
	Design	**Actual**
Motor MFG	-	BALDOR
Frame	-	56
Horsepower	1/2	0.75
Motor Rpm	-	1725
Phase	-	3
Voltage (rated)	-	115/230
Amperage (rated)	-	8.2/4.1
Service Factor	-	1.25

Drive Data	
	Actual
Motor Sheave Size	4.125”
Motor Bore Size	0.625”
Motor Sheave SetPt	1.5 TURNS OUT
Fan Sheave Size	4.375”
Fan Sheave Bore	1”
Belt CL Distance	12”
Num of Belts	1
Belt Size	A36

Test Data		
	Design	**Actual**
CFM	1700	1799
Fan RPM	1163	1438
Fan Rotation	-	COUNTERCLOCKWISE
Motor RPM	-	1769
RL Voltage	-	122
RL Amperage	-	8.08
Suction ESP	-	0.60"
Discharge ESP	-	ATM
Total ESP	3/4	0.60"

Completed By: Kalen Kemp on 01/31/2026

Unit Data - PHOTO LOG

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National TAB

Project: 08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

System/Unit: FAN - Exhaust

Asset: EF2 AREA:KITCHEN HD 2&3

Unit Data		
	Design	**Actual**
MFG	LOREN COOK	LOREN COOK
Model Num	150VH5B	150 CPS 150 CPS S
Serial Num	-	050SL60424-00/0000708
Type	UPBLAST	UPLAST
Configuration	VERTICAL	HORIZONTAL

Motor Data		
	Design	**Actual**
Motor MFG	-	BALDOR
Frame	-	56
Horsepower	1/2	0.75
Motor Rpm	-	1725
Phase	-	1
Voltage (rated)	-	115/230
Amperage (rated)	-	8.2/4.1
Service Factor	-	1.25

Drive Data	
	Actual
Motor Sheave Size	4.125”
Motor Bore Size	0.625"
Motor Sheave SetPt	4.5 TURNS OUT
Fan Sheave Size	4.375"
Fan Sheave Bore	1"
Belt CL Distance	12"
Num of Belts	1
Belt Size	A36

Test Data		
	Design	**Actual**
CFM	1402	1429
Fan RPM	1586	1248
Fan Rotation	-	COUNTERCLOCKWISE
Motor RPM	-	1762
RL Voltage	-	121
RL Amperage	-	7.67
Suction ESP	-	0.613
Discharge ESP	-	ATM
Total ESP	3/4	0.613"

Completed By: Kalen Kemp on 01/31/2026

Unit Data - PHOTO LOG

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National TAB

Project: 08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

System/Unit: FAN - Exhaust

Asset: EF3 AREA:RESTROOMS

Unit Data		
	Design	**Actual**
MFG	LOREN COOK	LOREN COOK
Model Num	ACED-90C15DH	90C15DH ACEH
Serial Num	-	050PL61432-00/0000701
Type	DOWNBLAST	DOWNBLAST
Configuration	VERTICAL	VERTICAL

Motor Data		
	Design	**Actual**
Motor MFG	-	US MOTORS
Frame	-	48Y
Horsepower	1/8	0.125
Motor Rpm	-	1600
Phase	-	1
Voltage (rated)	-	115
Amperage (rated)	-	1.7
Service Factor	-	NL

Test Data		
	Design	**Actual**
CFM	375	387
Fan RPM	1429	NA
Fan Rotation	-	CCW
Motor RPM	-	NA
System SetPt	-	HIGH
RL Voltage	-	NA
RL Amperage	-	1.30/1.23
Total ESP	0.375	0.29”
Fan Inlet SP	-	-0.29”
Fan Discharge SP	-	ATM

Completed By: Kalen Kemp on 02/01/2026

Notes:
-COULD NOT SAFELY ACCESS VOLTAGE MEASUREMENT.

Written By: Kalen Kemp on 02/01/2026

Unit Data - PHOTO LOG

02/01/2026

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Diffuser Ret/Exh (GRD)

EF3/RESTROOMS

Asset									
Asset Name	**Location**	**Type**	**Size**	**DESIGN CFM**	**AK**	**CFM(1)**	**CFM(2)**	**FINAL CFM**	**% to design**
EGRD1	MENS RR	K	8"	200	1.0	121	219	190	95.0
EGRD2	WOMENS RR	K	8"	200	1.0	124	211	197	98.5
Total				400		245	430	387	96.75%

National TAB

Project: 08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

System/Unit: Kitchen Hood Type I

Asset: HD2 AREA:KITCHEN

Unit Data		
	Design	**Actual**
MFG	HALTON	HALTON
Model Num	KVL-C-IC	KVL-C-IC
Job / Serial Num	-	126121-336
Type	TYPE 1 CANOPY	TYPE I - CANOPY
Hood length	42"	42”
Hood Width	34"	34”

Test Data Exhaust		
	Design	**Actual**
Filter Size 1	S.S. KSA	20X12”
Filter Qty 1	2	2
TAB SP	0.295"	0.323”
CFM	701	734

Cooking Equipment	
	Actual
Item 1	FRYER
Item 2	

Test Data Supply		
	Design	**Actual**
TAB SP	0.29"	0.29”

Completed By: Kalen Kemp on 01/31/2026

Notes:

Unit Data - PHOTO LOG

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National TAB

Project: 08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

System/Unit: Kitchen Hood Type I

Asset: HD3 AREA:KITCHEN

Unit Data		
	Design	**Actual**
MFG	HALTON	HALTON
Model Num	KVL-C-IC	KVL-C-IC
Job / Serial Num	-	126121-384
Type	TYPE 1 CANOPY	TYPE I - CANOPY
Hood length	42"	42”
Hood Width	34"	34”

Test Data Exhaust		
	Design	**Actual**
Filter Size 1	S.S. KSA	20X12”
Filter Qty 1	2	2
TAB SP	0.295"	0.290”
CFM	701	695

Cooking Equipment	
	Actual
Item 1	FRYER
Item 2	

Test Data Supply		
	Design	**Actual**
TAB SP	0.29"	0.292”

Completed By: Kalen Kemp on 01/31/2026

Notes:
-Missing grease cup

Written By: Kalen Kemp on 08/21/2025

Unit Data - PHOTO LOG

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National TAB

Project: 08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

System/Unit: Kitchen Hood Type I

Asset: HD L-1 AREA:KITCHEN

Unit Data		
	Design	**Actual**
MFG	HALTON	HALTON
Model Num	KVL-2-IC	KVL-2-IC
Job / Serial Num	-	126121-256
Type	TYPE 1 CANOPY	TYPE I - CANOPY
Hood length	63"	63”
Hood Width	37"	37”

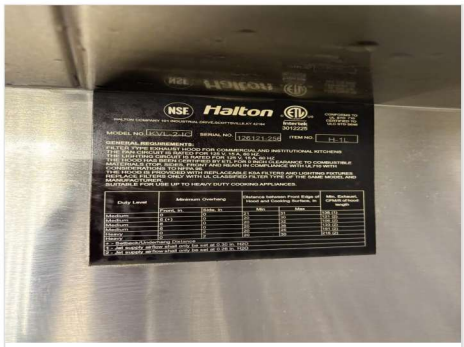
Test Data Exhaust		
	Design	**Actual**
Filter Size 1	S.S. KSA	20X12”
Filter Qty 1	3	3
TAB SP	0.129"	0.11
CFM	709	657

Cooking Equipment	
	Actual
Item 1	FRYER
Item 2	

Test Data Supply		
	Design	**Actual**
TAB SP	0.30"	0.307”

Completed By: Kalen Kemp on 01/31/2026

Unit Data - PHOTO LOG



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National TAB

Project: 08-18-25 CHICK-FIL-A #02258 INDEPENDENCE, MO (INDEPENDENCE CENTER FSU) REINVEST

System/Unit: Kitchen Hood Type I

Asset: HD R-1 AREA:KITCHEN

Unit Data		
	Design	**Actual**
MFG	HALTON	HALTON
Model Num	KVL-2-IC	KVL-2-IC
Job / Serial Num	-	126121-290
Type	TYPE 1 CANOPY	TYP I - CANOPY
Hood length	107"	107”
Hood Width	37"	37”

Test Data Exhaust		
	Design	**Actual**
Filter Size 1	S.S. KSA	20X12”
Filter Qty 1	5	5
TAB SP	0.128"	0.116”
CFM	1204	1142

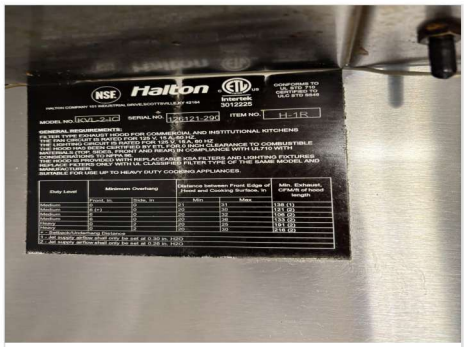
Cooking Equipment	
	Actual
Item 1	GRILL (2)
Item 2	FRYER (2)

Test Data Supply		
	Design	**Actual**
TAB SP	0.30"	0.30”

Completed By: Kalen Kemp on 01/31/2026

Notes:

Unit Data - PHOTO LOG



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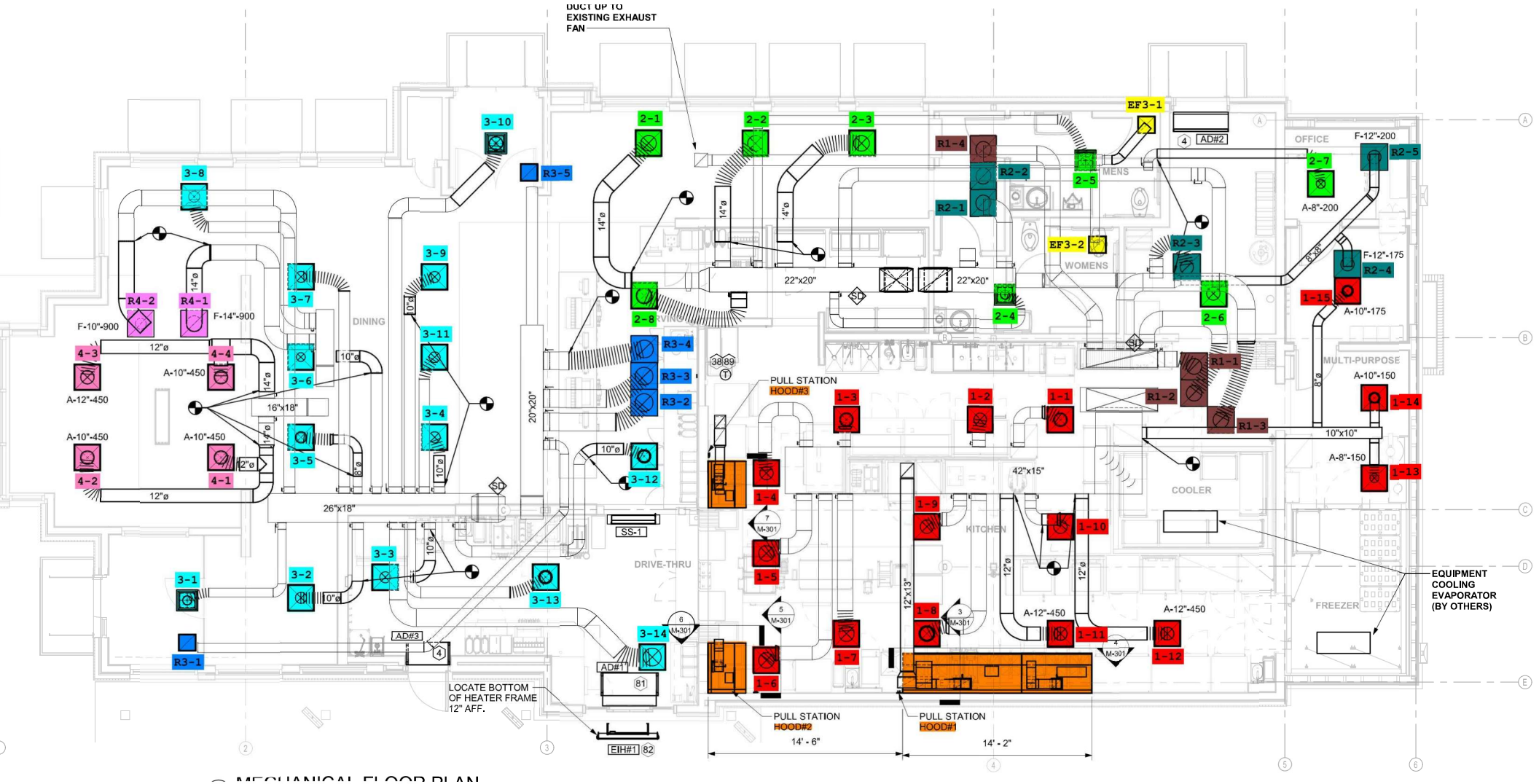

MECHANICAL FLOOR PLAN