Report By:

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

Report: TAB REPORT

Function: Test, Adjust, & Balance

Date: 10/30/2023

PROJECT

10-30-23 FREDDY'S - EAST PEORIA, IL

134 Spinder Dr

PEORIA, IL 61611

Client

MLY Investments, LLC

1241 Park Place NE

Suite C

Cedar Rapids, IA 52402

CheckList List

- TECH - SITE PICTURES
- TECH - STEP 1: INITIAL SITE WALKTHROUGH
- TECH - STEP 2: UNIT DATA AND EVAL
- TECH - STEP 3: TEST, ADJUST AND BALANCE
- TECH - STEP 4: FINAL TESTS

10-30-23 FREDDY'S - EAST PEORIA, IL

CheckList Information

Name :	TECH - SITE PICTURES	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	10/30/2023 - Brian Turnbough - National TAB		

CheckList Item Details

STORE FRONT

Comment:

RTU-1

Comment:

RTU-2

Comment:

RTU-3

Comment:

RTU-4

Comment:

RTU-5

Comment:

RTU-6

Comment:

RTU-7

Comment:

RTU-8

Comment:

RTU-9

Comment:

RTU-10

Comment:

RTU-11

Comment:

RTU-12

Comment:

RTU-13

Comment:

RTU-14

Comment:

RTU-15

Comment:

RTU-16

Comment:

RTU-17

Comment:

RTU-18

Comment:

RTU-19

Comment:

RTU-20

Comment:

MAU-1

Comment:

MAU-2

Comment:

EF-1

Comment:

EF-2

Comment:

EF-3

Comment:

EF-4

Comment:

EF-5

Comment:

EF-6

Comment:

EF-7

Comment:

EF-8

Comment:

EF-9

Comment:

EF-10

Comment:

HOOD-1

Comment:

HOOD-2

Comment:

HOOD-3

Comment:

HOOD-4

Comment:

HOOD-5

Comment:

10-30-23 FREDDY'S - EAST PEORIA, IL

CheckList Information

Name :	TECH - STEP 1: INITIAL SITE WALKTHROUGH	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	10/30/2023 - Brian Turnbough - National TAB		

CheckList Item Details

INITIAL SITE WALKTHROUGH

All diffusers and grilles are installed and match design?

Comment:

All hood filters installed and accounted for?

Comment:

Hoods are wired and have power?

Comment:

Hood is free of alarms?

Comment:

Thermostats have power?

Comment:

Have trades/general contractor been notified about any issues and are they created on FaciliBuild?

Comment:

10-30-23 FREDDY'S - EAST PEORIA, IL

CheckList Information

Name :	TECH - STEP 2: UNIT DATA AND EVAL	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	10/30/2023 - Brian Turnbough - National TAB		

CheckList Item Details

UNIT DATA AND EVALUATION WHILE GATHERING UNIT DATA CHECK THE FOLLOWING:

RTU's/AHU's

Economizers are assembled and functional?

Comment:

DCV Max damper opening position is set to minimum?

Comment:

Free cooling enthalpy set point set for lowest setting (Typically "D")

Comment:

Motors are all operating below the FLA rating?

Comment:

Are belts tight?

Comment:

If direct drive unit is the speed controller working.

Comment:

Is gas piping installed and valves turned on?

Comment:

Unit free of noticeable noise and vibration

Comment:

EF's

Rotation is correct?

Comment:

Belts are tight?

Comment:

Grease cup installed on hood fan?

Comment:

Hinge kit installed installed on hood fan?

Comment:

Lean fan back. Is grease duct installation adequate and is duct ran all the way to the base of the fan?

Comment:

Flex conduit is long enough so that fan can be completely tilted back?

Comment:

There is no major leakage around base of fan?

Comment:

Is the motor operating below the motor FLA rating?

Comment:

For restroom fan(s) is the back draft damper installed and can it fully open?

Comment:

Unit free of noticeable noise and vibration?

Comment:

MUA

Rotation is correct?

Comment:

Gas piping is installed and valves are in on position?

Comment:

Heater tested and is functional?

Comment:

Internal motorized damper is fully opening?

Comment:

Motor is operating below the FLA rating?

Comment:

Unit free of noticeable noise and vibration?

Comment:

HOODS

Kitchen equipment installed in proper places?

Comment:

Can kitchen equipment be turned on for final smoke test?

Comment:

DOCUMENTATION

Have trades/general contractor been notified about any issues and are they created on FaciliBuild?

Comment:

10-30-23 FREDDY'S - EAST PEORIA, IL

CheckList Information

Name :	TECH - STEP 3: TEST, ADJUST AND BALANCE	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	10/30/2023 - Brian Turnbough - National TAB		

CheckList Item Details

TEST, ADJUST, AND BALANCE ALL EQUIPMENT:

DURING TESTING MAKE NOTE OF THE FOLLOWING:

Is space free of drafting?

Comment:

Is space comfortable in all areas?

Comment:

Is the space free of ventilation noise?

Comment:

If deviations from design were necessary to resolve 1-3 what were they? Otherwise put "NA".

Comment:

10-30-23 FREDDY'S - EAST PEORIA, IL

CheckList Information

Name :	TECH - STEP 4: FINAL TESTS	**Status :**	Not Completed
Assigned Organization :	National TAB	**Asset :**	
Requesting Organization :	National TAB		
Created Date :	10/30/2023 - Brian Turnbough - National TAB		

CheckList Item Details

FINAL TESTS

HOOD CAPTURE TEST

List equipment turned on for testing

Comment:

List smoke candle type used

Comment:

Smoke test capture - Perimeter of hood

Comment:

Smoke test capture - Top of cooking surface

Comment:

WITNESS

Date test was completed

Comment:

TAB tech name / Firm

Comment:

Site super name / Firm

Comment:

Owner representative name / Firm (if Applicable)

Comment:

Building pressure at front & back doors (All Systems On)

Comment:

ADDITIONAL

Do actual net building airflow, design net building airflow, and pressure coincide? If not why? (All three should either be positive or negative)

Comment:

Thermostats are programmed?

Comment:

National TAB

Project: 10-30-23 FREDDY'S - EAST PEORIA, IL

System/Unit: AHU/RTU

Asset: RTU1 AREA:Dining

Unit Data				Test Data		
	Design		Actual		Design	Actual
MFG	TRANE		TRANE		5000	
Serial Num	-		2238F02MD		-	
Model Num	YHD150G3RHD1AD0C1A20000AH		YHD150G3RHD1AD0C1A20000AH		4100	
Type	RTU				900	
Configuration	VERTICAL				-	
Num OA Filters 1	-				-	
OA Filter Size 1	-				-	
Num Final Filter 1	-				-	
Final Filter Size 1	-				-	
Num Final Filter 2	-				-	
Final Filter Size 2	-				-	

Motor Data		
	Design	Actual
Motor MFG	-	
Frame	-	
Horsepower	5	
Motor Rpm	-	
Phase	3	
Rated Voltage	208	
Rated Amperage	-	

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

Performance Data		
	Design	Actual
MA Plenum SP	-	
Fan Suction SP	-	
Fan Discharge SP	-	
Total ESP	-	
Fan Total SP	-	

General		
	Design	Actual
Fan Rotation Correct	-	
Unit Filters Clean	-	
Condensate Drain Installed	-	

Completed By: Sergio Del Toro on 07/07/2023

Notes:
NO DAMPERS AT FACE OF DIFFUSER OR TAKEOFFS.

Written By: on

National TAB

Project:10-30-23 FREDDY'S - EAST PEORIA, IL

AHU/RTU

Diffuser Supply (GRD)

RTU1/Dining

Asset									
Asset Name	**Location**	**Type**	**Size**	**DESIGN CFM**	**AK**	**CFM(1)**	**CFM(2)**	**FINAL CFM**	**% to design**
RTU1-SGRD1	DINING	SD-1	12"	475	1	524	490	490	103.2
RTU1-SGRD2	DINING	SD-1	12"	475	1	550	521	521	109.7
RTU1-SGRD3	DINING	SD-1	12"	475	1	668	615	615	129.5
RTU1-SGRD4	DINING	SD-1	12"	475	1	610	564	564	118.7
RTU1-SGRD5	DINING	SD-1	12"	475	1	421	416	416	87.6
RTU1-SGRD6	DINING	SD-1	12"	475	1	371	330	330	69.5
RTU1-SGRD7	DINING	SD-1	12"	475	1	506	467	467	98.3
RTU1-SGRD8	DINING	SD-1	12"	475	1	502	467	467	98.3
RTU1-SGRD9	DINING	SD-1	12"	475	1	564	528	528	111.2
RTU1-SGRD10	DINING	SD-1	12"	475	1	557	526	526	110.7
RTU1-SGRD11	RESTROOM	SD-6	6"	50	1	104	90	90	180.0
RTU1-SGRD12	HALLWAY	SD-6	6"	100	1	149	132	132	132.0
RTU1-SGRD13	RESTROOM	SD-6	6"	50	1	98	92	92	184.0
Total				4950		5624	5238	5238	105.82%

Completed By: Sergio Del Toro on 07/06/2023

National TAB

Project: 10-30-23 FREDDY'S - EAST PEORIA, IL

System/Unit: AHU/RTU

Asset: RTU2 AREA:Kitchen

Unit Data				Test Data		
	Design		Actual		Design	Actual
MFG	TRANE		TRANE	**SF CFM**	3460	
Serial Num	-		223F03810	**SF RPM**	-	
Model Num	YHD150G3RHD1AD0C1A20000AH		YHD150G3RHD1AD0C1A20000AH	**RA CFM**	4100	
Type	RTU			**OA CFM**	900	
Configuration	VERTICAL			**RL Voltage**	-	
Num OA Filters 1	-			**RL Amperage**	-	
OA Filter Size 1	-			**SF Rotation**	-	
Num Final Filter 1	-			**RA Damper Position**	-	
Final Filter Size 1	-			**Min OA Damper Position**	-	
Num Final Filter 2	-			**Min OA Damper Type**	-	
Final Filter Size 2	-			**OA Enthalpy Setpt**	-	

Motor Data		
	Design	Actual
Motor MFG	-	
Frame	-	
Horsepower	5	
Motor Rpm	-	
Phase	3	
Rated Voltage	208	
Rated Amperage	208	

Drive Data		
	Design	Actual
Motor Sheave Size	-	3.5"
Motor Bore Size	-	3/4"
Motor Sheave SetPt	-	4 TURNS OUT
Fan Sheave Size	-	
Fan Sheave Bore	-	
Belt CL Distance	-	
Num of Belts	-	
Belt Size	-	
Belt Alignment	-	

Performance Data		
	Design	Actual
MA Plenum SP	-	
Fan Suction SP	-	
Fan Discharge SP	-	
Total ESP	-	
Fan Total SP	-	

General		
	Design	Actual
Fan Rotation Correct	-	
Unit Filters Clean	-	
Condensate Drain Installed	-	

Completed By: Sergio Del Toro on 07/07/2023

National TAB

Project:10-30-23 FREDDY'S - EAST PEORIA, IL

AHU/RTU

Diffuser Supply (GRD)

RTU2/Kitchen

Asset									
Asset Name	**Location**	**Type**	**Size**	**DESIGN CFM**	**AK**	**CFM(1)**	**CFM(2)**	**FINAL CFM**	**% to design**
RTU2-SGRD1	Kitchen	SD-4	8"	150	1	64	154	163	108.7
RTU2-SGRD2	Kitchen	SD-5	8"	150	1	46	144	136	90.7
RTU2-SGRD3	Kitchen	SD-3	10"	200	1	53	22	187	93.5
RTU2-SGRD4	ACPSP-HD1	KEH-1	8"	505	3.51	140	295	492	97.4
RTU2-SGRD5	Kitchen	SD-3	12"	250	1	51	92	271	108.4
RTU2-SGRD6	Kitchen	SD-3	12"	250	1	206	427	268	107.2
RTU2-SGRD7	ACPSP-HD2	KEH-2	10"	309	1.95	158	248	299	96.8
RTU2-SGRD8	Kitchen	SD-3	12"	250	1	226	363	272	108.8
RTU2-SGRD9	Kitchen	SD-2	12"	250	1	171	391	241	96.4
RTU2-SGRD10	Kitchen	SD-2	12"	250	1	177	391	268	107.2
RTU2-SGRD11	Kitchen	SD-3	12"	250	1	199	414	276	110.4
RTU2-SGRD12	Kitchen	SD-3	12"	250	1	56	120	269	107.6
RTU2-SGRD13	Kitchen	SD-2	12"	246	1	94	324	236	95.9
RTU2-SGRD14	Kitchen	SD-4	8"	150	1	106	496	163	108.7
Total				3460		1747	3881	3541	102.34%

National TAB

Project: 10-30-23 FREDDY'S - EAST PEORIA, IL

System/Unit: FAN - Exhaust

Asset: EF1 AREA:Men's RR

Unit Data		
	Design	**Actual**
MFG	COOK	COOK
Model Num	GC-146	GC-146
Serial Num	-	
Type	CEILING	
Configuration	VERTICAL	

Motor Data		
	Design	**Actual**
Motor MFG	-	
Frame	-	
Horsepower	30.3	
Motor Rpm	-	
Phase	1	
Voltage (rated)	120	
Amperage (rated)	-	
Service Factor	-	

Test Data		
	Design	**Actual**
CFM	75	
Fan RPM	-	
Fan Rotation	-	
Motor RPM	-	
System SetPt	-	
RL Voltage	-	
RL Amperage	-	
Total ESP	0.25	
Fan Inlet SP	-	
Fan Discharge SP	-	

Completed By: Sergio Del Toro on 07/07/2023

National TAB

Project: 10-30-23 FREDDY'S - EAST PEORIA, IL

System/Unit: FAN - Exhaust

Asset: EF2 AREA:Women's RR

Unit Data		
	Design	**Actual**
MFG	COOK	COOK
Model Num	GC-146	GC-146
Serial Num	-	
Type	CEILING	
Configuration	VERTICAL	

Motor Data		
	Design	**Actual**
Motor MFG	-	QUEACE
Frame	-	NA
Horsepower	30.3	15W
Motor Rpm	900	1550
Phase	1	1
Voltage (rated)	120	115
Amperage (rated)	-	0.4A
Service Factor	-	NA

Test Data		
	Design	**Actual**
CFM	75	72
Fan RPM	-	NA
Fan Rotation	-	CORRECT
Motor RPM	-	NA
System SetPt	-	100%
RL Voltage	-	NA
RL Amperage	-	NA
Total ESP	0.25	0.22
Fan Inlet SP	-	-0.22"
Fan Discharge SP	-	ATM

Completed By: Sergio Del Toro on 07/07/2023

National TAB

Project: 10-30-23 FREDDY'S - EAST PEORIA, IL

System/Unit: FAN - Exhaust

Asset: KEF1 AREA:Kitchen

Unit Data		
	Design	**Actual**
MFG	COOK	CAPTIVEAIRE
Model Num	GC-146	CASRE18DD
Serial Num	-	
Type	UTILITY	
Configuration	VERTICAL	

Motor Data		
	Design	**Actual**
Motor MFG	-	
Frame	-	
Horsepower	1.00	
Motor Rpm	-	
Phase	3	
Voltage (rated)	208	230V
Amperage (rated)	-	3.44A
Service Factor	-	1.15

Test Data		
	Design	**Actual**
CFM	1600	
Fan RPM	1199	
Fan Rotation	-	
Motor RPM	-	
System SetPt	-	
RL Voltage	-	
RL Amperage	-	
Total ESP	1.400	
Fan Inlet SP	-	
Fan Discharge SP	-	

National TAB

Project: 10-30-23 FREDDY'S - EAST PEORIA, IL

System/Unit: FAN - Exhaust

Asset: KEF2 AREA:Kitchen

Unit Data		
	Design	**Actual**
MFG	COOK	CAPTIVEAIRE
Model Num	GC-146	DU50HFA
Serial Num	-	
Type	UPBLAST	
Configuration	VERTICAL	

Motor Data		
	Design	**Actual**
Motor MFG	-	
Frame	-	
Horsepower	0.500	
Motor Rpm	1588	
Phase	1	
Voltage (rated)	115	115V
Amperage (rated)	-	6.3A
Service Factor	-	NA

Test Data		
	Design	**Actual**
CFM	-	
Fan RPM	-	
Fan Rotation	-	
Motor RPM	-	
System SetPt	-	
RL Voltage	-	
RL Amperage	-	
Total ESP	1.120	
Fan Inlet SP	-	
Fan Discharge SP	-	

National TAB

Project: 10-30-23 FREDDY'S - EAST PEORIA, IL

System/Unit: FAN - Exhaust

Asset: KEF3 AREA:Kitchen

Unit Data		
	Design	**Actual**
MFG	COOK	CAPTIVEAIRE
Model Num	GC-146	DU33HFA
Serial Num	-	
Type	UPBLAST	
Configuration	VERTICAL	

Motor Data		
	Design	**Actual**
Motor MFG	-	
Frame	-	
Horsepower	0.333	
Motor Rpm	1577	
Phase	1	
Voltage (rated)	115	115V
Amperage (rated)	-	4.3A
Service Factor	-	NA

Test Data		
	Design	**Actual**
CFM	-	
Fan RPM	-	
Fan Rotation	-	
Motor RPM	-	
System SetPt	-	
RL Voltage	-	
RL Amperage	-	
Total ESP	0.750	
Fan Inlet SP	-	
Fan Discharge SP	-	

National TAB

Project: 10-30-23 FREDDY'S - EAST PEORIA, IL

System/Unit: FAN - Supply

Asset: MUA1 AREA:MUA

Unit Data		
	Design	**Actual**
MFG	CAPTIVEAIRE	CAPTIVEAIRE
Model Num	A1-D.500-15D	A1-D.500-15D
Serial Num	-	
Type	MUA	
Configuration	VERTICAL	

Motor Data		
	Design	**Actual**
Motor MFG	-	
Frame	-	
Horsepower	3.000	
Motor Rpm	-	
Phase	3	
Voltage (rated)	208	230V
Amperage (rated)	-	7.64A
Service Factor	-	1.15

Gas Heat		
	Design	**Actual**
Heater Operates (y/n)	-	
Flame Status (pass/fail)	-	
Inlet Air Temp SetPt	-	
Discharge Air Temp SetPt	-	
Air Flow Switch SP Actual	-	

Test Data		
	Design	**Actual**
CFM	1900	
SF RPM	-	
Motor RPM	-	
SF System SetPt	-	
RL Voltage	-	
RL Amperage	-	
Total ESP	-	
Fan Discharge SP	-	

General		
	Design	**Actual**
Fan Rotation Correct	-	

National TAB

Project: 10-30-23 FREDDY'S - EAST PEORIA, IL

System/Unit: Kitchen Hood Type I

Asset: HD1 AREA:Kitchen

Unit Data		
	Design	**Actual**
MFG	CAPTIVEAIRE	CAPTIVEAIRE
Model Num	5424ND-2-ACPSP-F	5424ND-2-ACPSP-F
Job / Serial Num	-	
Type	TYPE I CANOPY	
Hood length	96"	
Hood Width	54"	
Supply Plenum Type	-	
Supply Plenum Width	14	
Supply Plenum Length	108	

Test Data Exhaust		
	Design	**Actual**
Filter Type	Captrate Solo	CAPTRATE SOLO
Filter Size 1	16X16	16X16
Filter Qty 1	5	
Filter AK factor size 1	1.62	
Filter Total AK Area	8.1	
Filter1 FPM	-	
Filter2 FPM	-	
Filter3 FPM	-	
Filter4 FPM	-	
Filter5 FPM	-	
Filter Ave FPM(corr)	-	
CFM	1600	

Cooking Equipment		
	Design	**Actual**
Item 1	-	GRIDDLE

Test Data Supply		
	Design	**Actual**
Total AK Area	10.5	
Kv factor (Vel)	0.89"	
Num of Readings	-	
Reading1 FPM	-	
Reading2 FPM	-	
Reading3 FPM	-	
Reading4 FPM	-	
Reading5 FPM	-	
Reading6 FPM	-	
Reading7 FPM	-	
Reading8 FPM	-	
Reading9 FPM	-	
Reading10 FPM	-	
Reading11 FPM	-	
Reading12 FPM	-	
Reading13 FPM	-	
Reading14 FPM	-	
Ave FPM(corr)	-	
CFM	1280	

National TAB

Project: 10-30-23 FREDDY'S - EAST PEORIA, IL

System/Unit: Kitchen Hood Type I

Asset: HD2 AREA:

Unit Data		
	Design	**Actual**
MFG	CAPTIVEAIRE	CAPTIVEAIRE
Model Num	5424ND-2-ACPSP-F	5424ND-2-ACPSP-F
Job / Serial Num	-	
Type	TYPE I CANOPY	
Hood length	60"	
Hood Width	54	
Supply Plenum Type	-	
Supply Plenum Width	12"	
Supply Plenum Length	60	

Test Data Exhaust		
	Design	**Actual**
Filter Type	Captrate Solo	CAPTRATE SOLO
Filter Size 1	16X16	16X16
Filter Qty 1	3	
Filter AK factor size 1	1.62	
Filter Total AK Area	4.86	
Filter1 FPM	-	
Filter2 FPM	-	
Filter3 FPM	-	
Filter Ave FPM(corr)	-	
CFM	775	

Cooking Equipment		
	Design	**Actual**
Item 1	-	

Test Data Supply		
	Design	**Actual**
Total AK Area	5	
Kv factor (Vel)	0.87"	
Num of Readings	-	
Reading1 FPM	-	
Reading2 FPM	-	
Reading3 FPM	-	
Reading4 FPM	-	
Reading5 FPM	-	
Reading6 FPM	-	
Reading7 FPM	-	
Reading8 FPM	-	
Reading9 FPM	-	
Reading10 FPM	-	
Reading11 FPM	-	
Reading12 FPM	-	
Reading13 FPM	-	
Reading14 FPM	-	
Ave FPM(corr)	-	
CFM	620	

National TAB

Project: 10-30-23 FREDDY'S - EAST PEORIA, IL

System/Unit: Kitchen Hood Type II

Asset: HD(Type2)1 AREA:

Unit Data		
	Design	**Actual**
MFG	CAPTIVEAIRE	CAPTIVEAIRE
Model Num	4224 VHB-G	4224 VHB-G
Serial Num	-	
Type	TYPE II CANOPY	
Hood length	42"	
Hood Width	42	

Test Data		
	Design	**Actual**
Exhaust CFM	525