**Report By:**

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

**Report: TAB REPORT**

**Function: Test, Adjust, & Balance**

**Date: 10/03/2023**

# PROJECT

## 09-25-23 FREDDY'S BURLESON, TX

1115 N Burleson Blvd

BURLESON, TX 76028

Client

JRI Hospitality Management

621 Westport Blvd

Salina, KS 67401

# National TAB

**Project: 09-25-23 FREDDY'S BURLESON, TX**

## 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.

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
Each kitchen exhaust fan was measured at the hood filter bay utilizing a velocity matrix and a manufacturer's correction factor. Each filter velocity is multiplied by the manufacturer's corrected area. The sum of these readings equals the total flow of the exhaust fans. The total flow of the exhaust was then adjusted to within tolerance of the design flow. . Any EF's that fell outside of this tolerance is noted throughout the report.

MUA (Make Up Air Unit) w/ PSP
Total flow for the MAU (Make-up Air Unit) unit was measured by readings taken at the discharge of the hood's perforated supply plenum. Readings taken with a velocity matrix were averaged and multiplied by a manufacturer's corrected area. Adjustments to the fan speed were made in order to bring the unit to within design tolerance. Any MUA's that fell outside of this tolerance is noted throughout the report.

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 of -0.02" wc to +0.02" wc 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.

## Issue List

- KEF GREASE TRAPS NOT INSTALLED

## 09-25-23 FREDDY'S BURLESON, TX

### Project Issue Information

**Issue Name :** KEF GREASE TRAPS NOT INSTALLED

**Description :** KEF-1, KEF-2 AND KEF-3 DO NOT HAVE THEIR GREASE TRAPS INSTALLED ON THE ROOF.

**Created By :** National TAB

**Assigned To :** National TAB - Will Turnbough

**Status :** Open

**Originated Date :** 09/25/2023 - Bayley Morvant - National TAB

Project Issue File Details

**KEF_1_GREASE_TRAP_ISS.. 09/25/2023**

**KEF_3_GREASE_TRAP_ISS.. 09/25/2023**

**KEF_2_GREASE_TRAP_ISS.. 09/25/2023**

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 |
| RTU-1 | DINING | 4850 | 4911 | 3850 | 3891 | 1000 | 1020 | 20.6% | 20.8% | | | | | | |
| DOAS-1 | KITCHEN | 2650 | 2497 | 0 | 0 | 2650 | 2497 | 100.0% | 100.0% | | | | | | |
| KEF-1 | GRIDDLE | | | | | | | | | | | 1700 | 1603 | | |
| KEF-2 | FRYER | | | | | | | | | | | 775 | 797 | | |
| KEF-3 | DISHES | | | | | | | | | | | 525 | 537 | | |
| EF-1 | | | | | | | | | | | | | | 75 | 77 |
| EF-2 | | | | | | | | | | | | | | 150 | 116 |
| **TOTALS** | | 7500 | 7408 | 3850 | 3891 | 3650 | 3517 | | | 0 | 0 | 3000 | 2937 | 225 | 193 |

**NET BUILDING AIRFLOW CALCULATION**

| TOTALS | DESIGN | ACTUAL |
|---|---|---|
| TOTAL OA | 3650 | 3517 |
| TOTAL EXHAUST | 3225 | 3130 |
| **NET AIRFLOW** | 425 | 387 |

| DOOR TESTED | BUILDING PRESSURE MEASUREMENTS (IN. H20) |
|---|---|
| FRONT | 0.005 |
| SIDE | 0.007 |
| REAR | 0.0006 |
| **AVERAGE** | **0.0042** |

**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

- TECH - SITE PICTURES

# 09-25-23 FREDDY'S BURLESON, TX

## CheckList Information

| | | | |
|---|---|---|---|
| **Name :** | TECH - SITE PICTURES | **Status :** | Not Completed |
| **Assigned Organization :** | National TAB | **Asset :** | |
| **Requesting Organization :** | National TAB | | |
| **Created Date :** | 09/25/2023 - Brian Turnbough - National TAB | | |

## CheckList Item Details

STORE FRONT

**Comment:**

**STOREFRONT**
**09/26/2023**

---

RTU-1

**Comment:**

**RTU_1**
**09/26/2023**

---

DOAS-1

**Comment:**

**DOAS_1**
**09/26/2023**

---

KEF-1

**Comment:**

**KEF_1**
**09/26/2023**

---

KEF-2

**Comment:**

**KEF_2**
**09/26/2023**

---

KEF-3

**Comment:**

**KEF_3**
**09/26/2023**

---

EF-1

**Comment:**

**EF_1**
**09/26/2023**

---

EF-2

**Comment:**

**EF_2**
**09/26/2023**

---

HOOD-1

**Comment:**

**HD_1**
**09/26/2023**

---

HOOD-2

**Comment:**

**HD_2**
**09/26/2023**

---

HOOD-3

**Comment:**

**HD_3**
**09/26/2023**

---

# CheckList List

- 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

# 09-25-23 FREDDY'S BURLESON, TX

## CheckList Information

| | | | |
|---|---|---|---|
| **Name :** | TECH - STEP 1: INITIAL SITE WALKTHROUGH | **Status :** | Completed |
| **Assigned Organization :** | National TAB | **Asset :** | |
| **Requesting Organization :** | National TAB | | |
| **Created Date :** | 09/25/2023 - Brian Turnbough - National TAB | | |
| **Completed Date :** | 09/25/2023 - Bayley Morvant - National TAB | | |

## CheckList Item Details

**INITIAL SITE WALKTHROUGH**

| | |
|---|---|
| All diffusers and grilles are installed and match design? | Yes |
| **Comment:** YES | |
| All hood filters installed and accounted for? | Yes |
| **Comment:** YES | |
| Hoods are wired and have power? | Yes |
| **Comment:** YES | |
| Hood is free of alarms? | Yes |
| **Comment:** YES | |
| Thermostats have power? | Yes |
| **Comment:** YES | |

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

**Comment:**

YES

# 09-25-23 FREDDY'S BURLESON, TX

## CheckList Information

| | | | |
|---|---|---|---|
| **Name :** | TECH - STEP 2: UNIT DATA AND EVAL | **Status :** | Completed |
| **Assigned Organization :** | National TAB | **Asset :** | |
| **Requesting Organization :** | National TAB | | |
| **Created Date :** | 09/25/2023 - Brian Turnbough - National TAB | | |
| **Completed Date :** | 09/26/2023 - Bayley Morvant - 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? | Yes |
| **Comment:** YES | |
| DCV Max damper opening position is set to minimum? | Yes |
| **Comment:** YES | |
| Free cooling enthalpy set point set for lowest setting (Typically "D") | Yes |
| **Comment:** YES | |
| Motors are all operating below the FLA rating? | Yes |
| **Comment:** YES | |
| Are belts tight? | |

**Comment:**

YES

---

If direct drive unit is the speed controller working.

**Comment:**

YES

---

| | |
|---|---|
| Is gas piping installed and valves turned on? | Yes |

**Comment:**

YES

---

Unit free of noticeable noise and vibration

**Comment:**

RTU-1 HAS VERY NOTICABLE NOISE WHEN FIRST TURNING ON FAN.

---

**EF's**

---

| | |
|---|---|
| Rotation is correct? | Yes |

**Comment:**

YES

---

Belts are tight?

**Comment:**

NA

---

Grease cup installed on hood fan?

**Comment:**

NO, KEF-1, KEF-2 AND KEF-3 DO NOT HAVE GREASE CUPS INSTALLED. ISSUES HAVE BEEN MADE ON FACILIBUILD NAD GC HAS BEEN NOTIFIED.

---

Hinge kit installed installed on hood fan?

**Comment:**

KEF-2 HAS HINGE KIT BUT KEF-1 ONLY HAS A HINGE KIT ON THE FAN MOTOR AND FAN, NOT ON THE WHOLE FAN HOUSING. KEF-3 IS THE DISH HOOD FAN, BUT ALSO DOES NOT HAVE A HINGE KIT INSTALLED.

---

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

**Comment:**

ON KEF-2 YES, UNABLE TO VERIFY DUCT BELOW KEF-1 AND KEF-3.

---

| | |
|---|---|
| Flex conduit is long enough so that fan can be completely tilted back? | Yes |
| **Comment:** YES | |
| There is no major leakage around base of fan? | No |
| **Comment:** NO | |
| Is the motor operating below the motor FLA rating? | Yes |
| **Comment:** YES | |
| For restroom fan(s) is the back draft damper installed and can it fully open? | N/A |
| **Comment:** UNABLE TO VERIFY DUE TO SHEET ROCK CEILING | |
| Unit free of noticeable noise and vibration? | Yes |
| **Comment:** YES | |
| **MUA** | |
| Rotation is correct? | N/A |
| **Comment:** NA | |
| Gas piping is installed and valves are in on position? | N/A |
| **Comment:** NA | |
| Heater tested and is functional? | N/A |
| **Comment:** NA | |
| Internal motorized damper is fully opening? | N/A |
| **Comment:** NA | |

| | |
|---|---|
| Motor is operating below the FLA rating? | N/A |
| **Comment:**<br>NA | |
| Unit free of noticeable noise and vibration? | N/A |
| **Comment:**<br>NA | |
| **HOODS** | |
| Kitchen equipment installed in proper places? | Yes |
| **Comment:**<br>YES. | |
| Can kitchen equipment be turned on for final smoke test? | No |
| **Comment:**<br>NO | |
| **DOCUMENTATION** | |
| Have trades/general contractor been notified about any issues and are they created on FaciliBuild? | Yes |
| **Comment:**<br>YES | |

# 09-25-23 FREDDY'S BURLESON, TX

## CheckList Information

| | | | |
|---|---|---|---|
| **Name :** | TECH - STEP 3: TEST, ADJUST AND BALANCE | **Status :** | Completed |
| **Assigned Organization :** | National TAB | **Asset :** | |
| **Requesting Organization :** | National TAB | | |
| **Created Date :** | 09/25/2023 - Brian Turnbough - National TAB | | |
| **Completed Date :** | 09/25/2023 - Bayley Morvant - National TAB | | |

## CheckList Item Details

**TEST, ADJUST, AND BALANCE ALL EQUIPMENT:**

**DURING TESTING MAKE NOTE OF THE FOLLOWING:**

| | |
|---|---|
| Is space free of drafting? | Yes |
| **Comment:** YES | |
| Is space comfortable in all areas? | Yes |
| **Comment:** YES | |
| Is the space free of ventilation noise? | |
| **Comment:** YES, EXCEPT FOR THE NOISE CREATED BY RTU-1 WHEN FIRST STARTING THE FAN. OTHERIWSE IT IS FREE OF NOISE. | |
| If deviations from design were necessary to resolve 1-3 what were they? Otherwise put "NA". | |
| **Comment:** NA | |

# 09-25-23 FREDDY'S BURLESON, TX

## CheckList Information

**Name :** TECH - STEP 4: FINAL TESTS **Status :** Not Completed

**Assigned Organization :** National TAB **Asset :**

**Requesting Organization :** National TAB

**Created Date :** 09/25/2023 - Brian Turnbough - National TAB

## CheckList Item Details

**FINAL TESTS**

**HOOD CAPTURE TEST**

- Open HD1_SMOKE_TEST.mp4
09/26/2023
- Open HD2_SMOKE_TEST.mp4
09/26/2023

List equipment turned on for testing

**Comment:**

Two flat top grilles for Hood-1 and two fryers for Hood-2.

List smoke candle type used

**Comment:**

45 SECOND SMOKE CARTRIDGE

Smoke test capture - Perimeter of hood

**Comment:**

100%

Smoke test capture - Top of cooking surface

**Comment:**

100%

**WITNESS**

| | |
|---|---|
| Date test was completed | 09/26/2023 |

**Comment:**

TAB tech name / Firm

**Comment:**

Bayley Morvant / National TAB Intelligence

Site super name / Firm

**Comment:**

Site super was not on site during test. Mark / ACCELL

Owner representative name / Firm (if Applicable)

**Comment:**

NA

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

**Comment:**

FRONT DOOR: 0.005 BACK DOOR: 0.0006

**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:**

YES

| | |
|---|---|
| Thermostats are programmed? | Yes |

**Comment:**

YES

# National TAB

**Project: 09-25-23 FREDDY'S BURLESON, TX**

## System/Unit: AHU/RTU

**Asset: DOAS1** AREA:KITCHEN

| Unit Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **MFG** | CaptiveAire | CaptiveAire |
| **Serial Num** | - | 5457831 |
| **Model Num** | CASRTU3-I.250-15-15T-DOAS | CASRTU3-I.250-15-15T-DOAS |
| **Type** | DOAS | DOAS |
| **Configuration** | VERTICAL | VERTICAL |
| **Num OA Filters 1** | - | 4 |
| **OA Filter Size 1** | - | 16x25x2 |
| **Num Final Filter 1** | - | 8 |
| **Final Filter Size 1** | - | 20x25x2 |

| Motor Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **Motor MFG** | - | TECO |
| **Frame** | - | 145T |
| **Horsepower** | 2.00 | 2 |
| **Motor Rpm** | - | 1740 |
| **Phase** | 3 | 3 |
| **Rated Voltage** | 208 | 230 |
| **Rated Amperage** | - | 5.48 |

| Drive Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **Motor Sheave Size** | - | DIRECT DRIVE |
| **Motor Bore Size** | - | DIRECT DRIVE |
| **Fan Sheave Size** | - | DIRECT DRIVE |
| **Fan Sheave Bore** | - | DIRECT DRIVE |
| **Belt CL Distance** | - | DIRECT DRIVE |
| **Num of Belts** | - | DIRECT DRIVE |
| **Belt Size** | - | DIRECT DRIVE |

| Electrical | | |
|---|---|---|
| | **Design** | **Actual** |
| **VFD Max Setpt** | - | 60.0 Hz |

| Test Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **SF CFM** | 2650 | 2497 |
| **SF RPM** | - | DIRECT DRIVE |
| **RA CFM** | 0 | 0 |
| **OA CFM** | 2650 | 2497 |
| **RL Voltage** | - | 208/206/207 |
| **RL Amperage** | - | 5.1/5.0/5.0 |
| **SF Rotation** | - | CCW |
| **RA Damper Position** | - | CLOSED |
| **Min OA Damper Position** | - | 100% |
| **Min OA Damper Type** | - | OPPOSED BLADE |

| Performance Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **OA Temp (db/wb)** | - | 92F / 77F |
| **RA Temp (db/wb)** | - | 70F / 61F |
| **SA Temp (db/wb)** | - | 61F / 54F |

| General | | |
|---|---|---|
| | **Design** | **Actual** |
| **Fan Rotation Correct** | - | YES |
| **Unit Filters Clean** | - | YES |

Completed By: Bayley Morvant on 09/26/2023

# National TAB

**Project:09-25-23 FREDDY'S BURLESON, TX**

## AHU/RTU

**Diffuser Supply (GRD)**

**DOAS1/KITCHEN**

| Asset | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|
| **Asset Name** | **Location** | **Type** | **Size** | **DESIGN CFM** | **AK** | **CFM(1)** | **CFM(2)** | **FINAL CFM** | **% to design** |
| DOAS1-SGRD1 | KITCHEN | SD-3 | 10" | 275 | | 180 | 216 | 249 | 90.5 |
| DOAS1-SGRD2 | KITCHEN | SD-3 | 10" | 275 | | 225 | 261 | 251 | 91.3 |
| DOAS1-SGRD3 | KITCHEN | SD-3 | 10" | 275 | | 236 | 272 | 272 | 98.9 |
| DOAS1-SGRD4 | KITCHEN | SD-3 | 10" | 275 | | 204 | 238 | 250 | 90.9 |
| DOAS1-SGRD5 | KITCHEN | SD-3 | 10" | 275 | | 238 | 278 | 262 | 95.3 |
| DOAS1-SGRD6 | KITCHEN | SD-3 | 10" | 275 | | 238 | 271 | 272 | 98.9 |
| DOAS1-SGRD7 | KITCHEN | SD-3 | 10" | 275 | | 264 | 300 | 249 | 90.5 |
| DOAS1-SGRD8 | KITCHEN | SD-3 | 10" | 275 | | 229 | 262 | 269 | 97.8 |
| DOAS1-SGRD9 | KITCHEN | SD-2 | 8" | 100 | | 110 | 136 | 96 | 96.0 |
| DOAS1-SGRD10 | KITCHEN | SD-3 | 10" | 275 | | 215 | 241 | 248 | 90.2 |
| DOAS1-SGRD11 | KITCHEN | SD-4 | 8" | 75 | | 28 | 19 | 79 | 105.3 |
| Total | | | | 2650 | | 2167 | 2494 | 2497 | 94.23% |

# National TAB

**Project: 09-25-23 FREDDY'S BURLESON, TX**

## System/Unit: AHU/RTU

**Asset: RTU1** AREA:DINING

| Unit Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **MFG** | CaptiveAire | TRANE |
| **Serial Num** | - | 221210816D |
| **Model Num** | CASRTU3-I.250-15-15T-DOAS | YHD150G3RLD18D0C1A200B0AA |
| **Type** | RTU | RTU |
| **Configuration** | VERTICAL | VERTICAL |
| **Num OA Filters 1** | - | 1 |
| **OA Filter Size 1** | - | 60X17X1 |
| **Num Final Filter 1** | - | 4 |
| **Final Filter Size 1** | - | 20X20X2 |
| **Num Final Filter 2** | - | 4 |
| **Final Filter Size 2** | - | 20X25X2 |

| Motor Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **Motor MFG** | - | MARATHON |
| **Frame** | - | 56HZ |
| **Horsepower** | 5 | 3 |
| **Motor Rpm** | - | 1725 |
| **Phase** | 3 | 3 |
| **Rated Voltage** | 208 | 208 |
| **Rated Amperage** | - | 9.4 |

| Drive Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **Motor Sheave Size** | - | 3.75" |
| **Motor Bore Size** | - | 0.875" |
| **Fan Sheave Size** | - | 10.75" |
| **Fan Sheave Bore** | - | 1.25" |
| **Belt CL Distance** | - | 22.25" |
| **Num of Belts** | - | 1 |
| **Belt Size** | - | BX68 |

| Test Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **SF CFM** | 4850 | 4911 |
| **SF RPM** | - | 579 |
| **RA CFM** | 3850 | 3891 |
| **OA CFM** | 1000 | 1020 |
| **RL Voltage** | - | 206/206/207 |
| **RL Amperage** | - | 6.2/5.9/6.0 |
| **SF Rotation** | - | CW |
| **RA Damper Position** | - | 90% OPEN |
| **Min OA Damper Position** | - | 10% OPEN |
| **Min OA Damper Type** | - | SINGLE BLADE |

| Performance Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **MA Plenum SP** | - | -0.24" |
| **Fan Suction SP** | - | -0.43" |
| **Fan Discharge SP** | - | 0.34" |
| **Total ESP** | 1.0 | 0.58" |

| General | | |
|---|---|---|
| | **Design** | **Actual** |
| **Fan Rotation Correct** | - | YES |
| **Unit Filters Clean** | - | YES |

Completed By: Bayley Morvant on 09/26/2023

**Diffuser Supply (GRD)**

**RTU1/DINING**

| Asset | | | | | | | |
|---|---|---|---|---|---|---|---|
| **Asset Name** | **Location** | **Type** | **Size** | **DESIGN CFM** | **CFM(1)** | **FINAL CFM** | **% to design** |
| RTU1-SGRD1 | DINING | SD-1 | 12" | 520 | 586 | 516 | 99.2 |
| RTU1-SGRD2 | DINING | SD-1 | 12" | 520 | 542 | 526 | 101.2 |
| RTU1-SGRD3 | DINING | SD-1 | 12" | 500 | 661 | 498 | 99.6 |
| RTU1-SGRD4 | DINING | SD-1 | 12" | 500 | 513 | 531 | 106.2 |
| RTU1-SGRD5 | DINING | SD-1 | 12" | 520 | 466 | 487 | 93.7 |
| RTU1-SGRD6 | DINING | SD-1 | 12" | 520 | 490 | 518 | 99.6 |
| RTU1-SGRD7 | DINING | SD-1 | 14" | 520 | 550 | 504 | 96.9 |
| RTU1-SGRD8 | DINING | SD-1 | 12" | 500 | 502 | 549 | 109.8 |
| RTU1-SGRD9 | DINING | SD-1 | 12" | 500 | 515 | 534 | 106.8 |
| RTU1-SGRD10 | RR | SD-5 | 6" | 100 | 82 | 102 | 102.0 |
| RTU1-SGRD11 | HALL | SD-5 | 6" | 100 | 83 | 91 | 91.0 |
| RTU1-SGRD12 | RR | SD-5 | 6" | 50 | 93 | 55 | 110.0 |
| Total | | | | 4850 | 5083 | 4911 | 101.26% |

# National TAB

**Project: 09-25-23 FREDDY'S BURLESON, TX**

## System/Unit: FAN - Exhaust

**Asset: EF1** AREA:

| Unit Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **MFG** | CAPTIVEAIRE | BROAN |
| **Model Num** | CASRE18DD | L100 |
| **Serial Num** | - | 32A09H |
| **Type** | CEILING | CEILING |
| **Configuration** | VERTICAL | VERTICAL |

| Motor Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **Motor MFG** | - | NA |
| **Frame** | - | NA |
| **Horsepower** | 30.3W | NA |
| **Motor Rpm** | - | NA |
| **Phase** | 1 | 1 |
| **Voltage (rated)** | 120 | 120 |
| **Amperage (rated)** | - | 1.1 |
| **Service Factor** | - | NA |

| Test Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **CFM** | 75 | 77 |
| **Fan RPM** | - | DIRECT DRIVE |
| **Fan Rotation** | - | CW |
| **Motor RPM** | - | DIRECT DRIVE |
| **System SetPt** | - | *1 |
| **RL Voltage** | - | 120 |
| **RL Amperage** | - | 0.4 |
| **Total ESP** | 0.25 | 0.01" |
| **Fan Inlet SP** | - | -0.01" |
| **Fan Discharge SP** | - | *2 |

Completed By: Bayley Morvant on 09/25/2023

Notes:
*1 NO SPEED CONTROLLER INSTALLED.
*2 NO ACCESS TO DISCHARGE DUCT DUE TO SHEET ROCK CEILING.

Written By: Bayley Morvant on 09/25/2023

# National TAB

**Project: 09-25-23 FREDDY'S BURLESON, TX**

## System/Unit: FAN - Exhaust

**Asset: EF2** AREA:

| Unit Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **MFG** | CAPTIVEAIRE | BROAN |
| **Model Num** | CASRE18DD | L200E-A |
| **Serial Num** | - | 32D13H |
| **Type** | CEILING | CEILING |
| **Configuration** | VERTICAL | VERTICAL |

| Motor Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **Motor MFG** | - | NA |
| **Frame** | - | NA |
| **Horsepower** | 63.3W | NA |
| **Motor Rpm** | - | NA |
| **Phase** | 1 | 1 |
| **Voltage (rated)** | 120 | 120 |
| **Amperage (rated)** | - | 0.5 |
| **Service Factor** | - | NA |

| Test Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **CFM** | 150 | 116 |
| **Fan RPM** | - | DIRECT DRIVE |
| **Fan Rotation** | - | CW |
| **Motor RPM** | - | DIRECT DRIVE |
| **System SetPt** | - | *1 |
| **RL Voltage** | - | 121 |
| **RL Amperage** | - | 0.4 |
| **Total ESP** | 0.25 | 0.02" |
| **Fan Inlet SP** | - | -0.02" |
| **Fan Discharge SP** | - | *2 |

Completed By: Bayley Morvant on 09/25/2023

Notes:
*1 NO SPEED CONTROLLER INSTALLED. FAN IS OPERATING AT 77% OF DESIGN.
*2 NO ACCESS TO DISCHARGE DUCT DUE TO SHEET ROCK CEILING.

Written By: Bayley Morvant on 09/25/2023

# National TAB

**Project: 09-25-23 FREDDY'S BURLESON, TX**

## System/Unit: FAN - Exhaust

**Asset: KEF1** AREA:GRIDDLE

| Unit Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **MFG** | CAPTIVEAIRE | CAPTIVEAIRE |
| **Model Num** | CASRE18DD | CASRE18DD |
| **Serial Num** | - | 5457831 |
| **Type** | UTILITY | UTILITY |
| **Configuration** | VERTICAL | VERTICAL |

| Motor Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **Motor MFG** | - | TECO |
| **Frame** | - | 145T |
| **Horsepower** | 1.000 | 1.00 |
| **Motor Rpm** | - | 1150 |
| **Phase** | 3 | 3 |
| **Voltage (rated)** | 208 | 230 |
| **Amperage (rated)** | - | 3.44 |
| **Service Factor** | - | NA |

| Test Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **CFM** | 1600 | 1603 |
| **Fan RPM** | - | DIRECT DRIVE |
| **Fan Rotation** | - | CCW |
| **Motor RPM** | - | DIRECT DRIVE |
| **System SetPt** | - | 57.9 HZ |
| **RL Voltage** | - | 210/210/209 |
| **RL Amperage** | - | 3.4/3.1/3.4 |
| **Total ESP** | 1.400 | 0.60" |
| **Fan Inlet SP** | - | -0.60" |
| **Fan Discharge SP** | - | ATM |

Completed By: Bayley Morvant on 09/25/2023

Notes:
SERVES HD-1.

Written By: Bayley Morvant on 09/25/2023

# National TAB

**Project: 09-25-23 FREDDY'S BURLESON, TX**

## System/Unit: FAN - Exhaust

**Asset: KEF2** AREA:FRYER

| Unit Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **MFG** | CAPTIVEAIRE | CAPTIVEAIRE |
| **Model Num** | CASRE18DD | DU50HFA |
| **Serial Num** | - | 5457831 |
| **Type** | UPBLAST/CEILING | UPBLAST |
| **Configuration** | VERTICAL | VERTICAL |

| Motor Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **Motor MFG** | - | TELCO |
| **Frame** | - | NA |
| **Horsepower** | 0.500 | 1/2 |
| **Motor Rpm** | - | 1800 |
| **Phase** | 1 | 1 |
| **Voltage (rated)** | 115 | 115 |
| **Amperage (rated)** | - | 6.3 |
| **Service Factor** | - | NA |

| Test Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **CFM** | 775 | 797 |
| **Fan RPM** | - | DIRECT DRIVE |
| **Fan Rotation** | - | CCW |
| **Motor RPM** | - | DIRECT DRIVE |
| **System SetPt** | - | 59% |
| **RL Voltage** | - | 121 |
| **RL Amperage** | - | 2.5 |
| **Total ESP** | 1.250 | 0.51" |
| **Fan Inlet SP** | - | -0.51" |
| **Fan Discharge SP** | - | ATM |

Completed By: Bayley Morvant on 09/25/2023

Notes:
SERVES HD-2.

Written By: Bayley Morvant on 09/25/2023

# National TAB

**Project: 09-25-23 FREDDY'S BURLESON, TX**

## System/Unit: FAN - Exhaust

**Asset: KEF3** AREA:DISHWASHER

| Unit Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **MFG** | CAPTIVEAIRE | CAPTIVEAIRE |
| **Model Num** | DU33HFA | DU33HFA |
| **Serial Num** | - | 5457831 |
| **Type** | UPBLAST/CEILING | UPBLAST |
| **Configuration** | VERTICAL | VERTICAL |

| Motor Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **Motor MFG** | - | TELCO |
| **Frame** | - | NA |
| **Horsepower** | 2.000 | 1/3 |
| **Motor Rpm** | - | 1800 |
| **Phase** | 1 | 1 |
| **Voltage (rated)** | 115 | 115 |
| **Amperage (rated)** | - | 4.3 |
| **Service Factor** | - | NA |

| Test Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **CFM** | 525 | 537 |
| **Fan RPM** | - | 864 |
| **Fan Rotation** | - | CCW |
| **Motor RPM** | - | 864 |
| **System SetPt** | - | 48% |
| **RL Voltage** | - | 122 |
| **RL Amperage** | - | 0.7 |
| **Total ESP** | 0.800 | 0.09" |
| **Fan Inlet SP** | - | -0.09" |
| **Fan Discharge SP** | - | ATM |

Completed By: Bayley Morvant on 09/25/2023

Notes:
SERVES HD-3.

Written By: Bayley Morvant on 09/25/2023

# National TAB

**Project: 09-25-23 FREDDY'S BURLESON, TX**

## System/Unit: Kitchen Hood Type I

**Asset: HD1** AREA:GRIDDLE

| Unit Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **MFG** | CaptiveAire | CaptiveAire |
| **Model Num** | 5424ND-2 | 5424ND-2 |
| **Job / Serial Num** | - | 5457831 |
| **Type** | TYPE 1 CANOPY | TYPE I CANOPY |
| **Hood length** | 96" | 96" |
| **Hood Width** | 54" | 54" |

| Test Data Exhaust | | |
|---|---|---|
| | **Design** | **Actual** |
| **Filter Type** | CAPTRATE SOLO FILTER | CAPTRATE SOLO |
| **Filter Size 1** | 16X16 | 16X16 |
| **Filter Qty 1** | 5 | 5 |
| **Filter AK factor size 1** | 1.62 | 1.62 |
| **Filter Total AK Area** | 8.1 | 8.1 |
| **Filter1 FPM** | - | 190 |
| **Filter2 FPM** | - | 204 |
| **Filter3 FPM** | - | 226 |
| **Filter4 FPM** | - | 192 |
| **Filter5 FPM** | - | 182 |
| **Filter Ave FPM(corr)** | - | 198 |
| **CFM** | 1600 | 1603 |

| Cooking Equipment | | |
|---|---|---|
| | **Design** | **Actual** |
| **Item 1** | - | FLATTOP GRILLE |
| **Item 2** | - | FLATTOP GRILLE |

Completed By: Bayley Morvant on 09/25/2023

Notes:
SERVED BY KEF-1.

Written By: Bayley Morvant on 09/25/2023

# National TAB

**Project: 09-25-23 FREDDY'S BURLESON, TX**

## System/Unit: Kitchen Hood Type I

**Asset: HD2** AREA:FRYER

| Unit Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **MFG** | CaptiveAire | CaptiveAire |
| **Model Num** | 5424ND-2 | 5424 ND-2 |
| **Job / Serial Num** | - | 5457831 |
| **Type** | TYPE 1 CANOPY | TYPE I CANOPY |
| **Hood length** | 60" | 60" |
| **Hood Width** | 54" | 54" |

| Test Data Exhaust | | |
|---|---|---|
| | **Design** | **Actual** |
| **Filter Type** | CAPTRATE SOLO FILTER | CAPTRATE SOLO |
| **Filter Size 1** | 16X16 | 16X16 |
| **Filter Qty 1** | 3 | 3 |
| **Filter AK factor size 1** | 1.62 | 1.62 |
| **Filter Total AK Area** | 4.86 | 4.86 |
| **Filter1 FPM** | - | 149 |
| **Filter2 FPM** | - | 178 |
| **Filter3 FPM** | - | 166 |
| **Filter Ave FPM(corr)** | - | 164 |
| **CFM** | 775 | 797 |

| Cooking Equipment | | |
|---|---|---|
| | **Design** | **Actual** |
| **Item 1** | - | FRYER |
| **Item 2** | - | FRYER |

Completed By: Bayley Morvant on 09/25/2023

Notes:
SERVED BY KEF-2.

Written By: Bayley Morvant on 09/25/2023

# National TAB

**Project: 09-25-23 FREDDY'S BURLESON, TX**

## System/Unit: Kitchen Hood Type II

**Asset: HD3(Type2)3** AREA:DISHES

| Unit Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **MFG** | CAPTIVEAIRE | CAPTIVEAIRE |
| **Model Num** | 4224 VHB-G | 4224 VHB |
| **Serial Num** | - | 5457831 |
| **Type** | TYPE 2 CANOPY | TYPE 2 CANOPY |
| **Hood length** | 54" | 42" |
| **Hood Width** | 54" | 42" |

| Test Data | | |
|---|---|---|
| | **Design** | **Actual** |
| **Exhaust CFM** | 525 | 537 |

Completed By: Bayley Morvant on 09/25/2023

Notes:
SERVED BY KEF-3.

Written By: Bayley Morvant on 09/25/2023