THE SCHOOL BOARD OF BROWARD COUNTY, FLORIDA ENVIRONMENTAL HEALTH & SAFETY DEPARTMENT

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| October 10, 2 | 017 Signature on File | For Custodial Supervisor Use Only |
|---------------|--|--|
| TO: | Michael Breslaw, Principal Tradewinds Elementary | Custodial Issues Addressed Custodial Issues Not Addressed |
| FROM: | Daniel Meyer, Project Manger Environmental Health & Safety Department | |
| SUBJECT: | Indoor Air Quality (IAQ) Assessment | |

On October 9, 2017, I conducted an assessment at **Tradewinds Elementary School.** Attached are findings and recommendations for further assessment, remediation, or corrective actions needed.

The IAQ assessment did identify one or more existing conditions impacting IAQ and has generated appropriate work orders to correct deficiencies in systems and maintenance that could contribute to decreased indoor air quality. At the time of the assessment, these concerns were not an immediate health or safety concern to building occupants. However, due to individual sensitivities and predisposing health factors, it is possible that some building occupants may elicit a health response to agents and / or conditions identified during the evaluation. Therefore, to further improve IAQ, prevent development of future IAQ-related problems, and to reduce the potential for IAQ-related complaints by building occupants, the IAQ Assessment Team recommends appropriate follow up of each item identified and listed in the attached evaluation.

Please ensure that your Head Facilities Serviceperson receives a copy of this correspondence so that the recommendations requiring their attention can be addressed. In an attempt to separate IAQ issues from general maintenance items, the attached assessment may contain direction for site based staff to generate a work order through COMPASS. Within two weeks a representative from the Custodial/Grounds Department will conduct a follow-up visit to ensure that all site based custodial issues have been appropriately addressed.

Should any questions arise, or if the current concerns continue after the attached recommendations have been addressed, please feel free to contact us at 754-321-4200.

DM:smn Enc.

cc: Sam Bays, Director, Maintenance Operations Shelley Meloni, Director, Pre-Construction Mark Dorsett, Manager, Zone 1, Physical Plant Operations Division Greg Neiman, Area Supervisor, Zone 1 Kurt Wirz, Area Manager Trades Gerald Devio, Supervisor II Custodial Benjamin Osborne, Supervisor II Custodial Mark Murray, Supervisor II Custodial Broward Teachers Union Federation of Public Employees

| | | Multiple Room IAQ | Assessment | |
|---------------------------------|--------------------------------|---|---------------------------|--|
| Tra | adewinds Elem. S | Echool Evaluation Da | te October 9, 2017 | Time of Day 10:00 AM |
| Outdoor Conditions | Temperature | 85.1 Relativ | e Humidity 78.8 | Ambient CO2 435 |
| Fish # of rooms a | ssessed | | | |
| FISH 114,115,116,11 | 7,118,119,120,12 | 3,124,125,126,127 | | |
| Temperature Range i | n the Rooms Asse | essed was Between | 72.1 And 78.5 | Acceptable Range 72 - 78 |
| Relative Humidity | Range in the Roon | ns Assessed was Between | 45.7 And 78.7 | Acceptable Range 30% - 60% |
| Co ² Range in the Ro | ooms Assessed | was between | 821 And 1386 | Acceptable MAX 700 > Range Ambient |
| Noticeable Odor | No | Visible water damage / staining? | Visible microbial growth? | Amount of material affected |
| Ceiling 2' X 4' | Lay in | Yes | Yes | >50 tile |
| Walls Dry | | No | No | |
| Floor 12" x 12 | 2" Vinyl | No | No | |
| levels. Elevated CO2 levels | s in FISH #114, 1 ⁴ | ssor FISH #116, 118, 120, 15, 117, 119. Outside air o STAINED CEILING TILES | - | temps and high humidity cked. |
| Ceiling Clean | Yes | HVAC Supply Grills Clean | No | HVAC Return Grills Clean |
| Walls Clean | Yes | Inside of Supply | Yes | Inside of Return |
| Flooring Clean | Yes | Duct Clean | | Duct Clean |
| Room Surfaces [| Νο | Ceiling at Supply Grills Clean | No | |
| Trash Removed | Yes | Exhaust Fans Working | Yes | Unapproved Chemicals / Cleaners in Room |
| Signs of Pests | Νο | Drain Traps Wet | Yes | Air Fresheners No |
| Room Cluttered | Νο | Food if Stored in Room is in Sealed Containers | N/A | in Room |
| | | cleaned. Ceiling tiles arou proughly. Classroom is du | | |

| | Multiple | e Room IAQ As | ssessment | | |
|--------------------------------------|-----------------|-----------------|-----------------|-------------------------------|---------------|
| Tradewinds I | Elem. School | Evaluation Date | October 9, 2017 | Time of Day | 10:00 AM |
| Outdoor Conditions Tempe | erature 85.1 |] Relative H | lumidity 78.8 | Ambient CO2 | 435 |
| HVAC System | | | | | |
| Mechanical Equipment Location | FISH #193, 195, | 196 | | Mechanical Room C | Clean Yes |
| Filters Installed Properly | es | Filters Clean | Yes | Inside of HVAC Unit C | Clean Yes |
| Condensate Pan Clean | es Cooli | ing Coil Clean | Yes | N/A in this section = N_{i} | ot Accessible |
| Fresh Air Intake Location | Exterior Wall | | ▼ | Fresh Air Intake | Free Yes |
| Pollutant Sources Near Air Intake | No | | ▼ | of Obstruction | <u> </u> |
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Observations

| IAQ Concerns caused by numerous roof leaks and A/C system working at 50% capacity. Work-orders called in from School to address both concerns. |
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| Ceiling tiles need to be replaced - ASAP |
| Supply and Return grills need to be cleaned. |
| Ceiling tiles around the supply grills need to be cleaned / dusted |
| Check outside air damper in Fish #195 |
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Corrective Actions to be Completed by Site Based Staff

| Replace Ceiling tiles | ▼ |
|--|---|
| Clean Supply and Return grills | ▼ |
| Clean ceiling around the supply grills | ▼ |
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Corrective Actions to be Completed by PPO

| ce Humidity Levels | Repair HVAC to Red |
|------------------------|--------------------|
| DF LEAKS | Repair RO |
| outside air damper 🛛 🔻 | FISH #195 - Check |
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