

managing risk with responsibility

Aston A. Henry, Supervisor

Risk Management Department

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September 25,	2012	Signature on File	For Custodial Supervis	or Use Only
TO: Jeannie Floyd, Principal			Custodial Issues Add	ressed
	Lauderhill Middle School		Custodial Issues Not .	Addressed
FROM:	Robert Krickovich, Coordinator Facilities Design and Construct	<i>'</i>		
SUBJECT:	Indoor Air Quality (IAQ) Asses	ssment		

On September 14, 2012, I conducted an assessment at **Lauderhill Middle 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 754-321-1907.

cc: Directors, School Performance & Accountability
Shelley Meloni, Executive Director, Facilities Design and Construction
Mark Dorsett, Manager, Zone 1, Physical Plant Operations Division
Roy Norton, Manager, Custodial/Grounds, Physical Plant Operations Division
Aston Henry, Supervisor, Risk Management
Sonja Coley, Senior Project Manager, Facilities Design and Construction
Broward Teachers Union
Federation of Public Employees

RK/tc Enc.

Lauderhill Middle	Evaluation Date	September 14, 20	Time of Day	1:00
Outdoor Conditions Temperature 91.7	Relative	Humidity 58.3	Ambient CO2	161
	 i		Range # 0 09 MAX 700 > Ambient	ccupants 18
	ter damage / ning?	Visible microbial growth?	Amount of material affected	
	es	No	2 tiles	
Walls Plaster N	0	No		
Floor 12" x 12" Vinyl	0	No		
	AC Supply lls Clean	Yes	HVAC Return Grills Clean	Yes
Insi	ide of Supply ct Clean	Yes	Inside of Return Duct Clean	N/A
	ling at Supply lls Clean	Yes		
	Fans Working	N/A	Unapproved Chemicals / Cleaners in Room	No
	rain Traps Wet red in Room is containers	N/A	Air Fresheners in Room	No
Mechanical Equipment Location 2nd Floor Mech	anical Room		Mechanical Room Clean	Yes
Filters Installed Properly Yes	Filters Clean	Yes	Inside of HVAC Unit Clean	Yes
Condensate Pan Clean Yes Cooli	ng Coil Clean	Yes		
Fresh Air Intake Location Roof top		▼	Fresh Air Intake Free of Obstruction	Yes
Pollutant Sources Near Air Intake		▼		
Observations				
Non Ducted Return - Two stained ceiling tiles, Or states leaks were repaired but tiles not changed.		rior wall and One in	front of classroom door	HFSP
Corrective Actions to be Completed by Site Base	ed Staff	Corrective Ac	tions to be Completed by P	PO
Remove and replace stained ceiling tiles and				▼
stains return, contact COMPASS for work ord	er ▼ ▼			▼
	▼			▼
	▼			▼
	▼			▼
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Lauderhill Middle	Evaluation Date	e September 14,	2012 Time of Day	1:00
Outdoor Conditions Temperature 91.7	Relative	Humidity 58.	3 Ambient CO2	461
	 .	Range % - 60%	850 Range MAX 700 > Ambient	# Occupants
	iter damage / ining?	Visible microbia growth?	al Amount o material affe	
Ceiling 2' X 4' Lay in Y	es	No	1 tile	•
Walls Plaster	lo	No		
Floor 12" x 12" Vinyl	lo	No		
Gri Walls Clean Yes	AC Supply Ils Clean ide of Supply	Yes	HVAC Retur	Yes
	ct Clean	Yes	Inside of Re Duct Clean	N/A
	iling at Supply Ils Clean	Yes		
	Fans Working	N/A	Unapproved Chem Cleaners in Room	icals / No
	rain Traps Wet	N/A	Air Fresheners	No
Room Cluttered No Food if Sto in Sealed C	ored in Room is Containers	N/A	in Room	
Mechanical Equipment Location 2nd Floor Mech	nanical Room		Mechanical Room	Clean Yes
Filters Installed Properly Yes	Filters Clean	Yes	Inside of HVAC Unit	Clean Yes
Condensate Pan Clean Yes Cool	ing Coil Clean	Yes		
Fresh Air Intake Location Roof top			Fresh Air Intake	Free Yes
Pollutant Sources Near Air Intake None			▼ Of Obstruction	
Observations				
Non Ducted Return - One stained ceiling tile fron changed.	nt right corner o	of room - HFSP st	ates leaks were repaired	d but tiles not
Corrective Actions to be Completed by Site Bas	ed Staff	Corrective A	Actions to be Completed	l by PPO
Remove and replace stained ceiling tiles and				▼
stains return, contact COMPASS for work ord	ler ▼			▼ ▼
	▼			▼
	▼			▼
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	IAW ASSESS		<u> </u>		
Lauderhill	Middle Evaluation Da	September 14, 2012	Time of Day	1:00	
Outdoor Conditions Temperature	91.7 Relativ	re Humidity 58.3	Ambient CO2 4	.61	
Outdoor Conditions Temperature	91.7 Relativ	e number 56.5	Ambient CO2 4	01	
Fish Temperature Range	Relative Humidity	Range CO ²	Range # O	ccupants	
126 73.0 72 - 78	66.7	0% - 60% 1000	MAX 700 > Ambient	19	
Noticeable Odor No	Visible water damage / staining?	Visible microbial growth?	Amount of material affected		
Ceiling 2' X 4' Lay in	Yes	No	1 tile over clock		
Walls Plaster	No	No			
Floor 12" x 12" Vinyl	Yes	No	1 tile 10' in from do	or	
Ceiling Clean Yes	HVAC Supply	Yes	HVAC Return	Yes	
Walls Clean Yes	Grills Clean	103	Grills Clean	103	
Flooring Clean Yes	Inside of Supply Duct Clean	Yes	Inside of Return Duct Clean	N/A	
Room Surfaces Yes	Ceiling at Supply	Yes			
Clean	Grills Clean	163			
Trook Borroad V	Folkered Four Montine	[N/A]			
Trash Removed Yes	Exhaust Fans Working	N/A	Unapproved Chemicals / Cleaners in Room	No	
Signs of Pests No	Drain Traps Wet	N/A	Air Frank and a	- No	
Room Cluttered No	Food if Stored in Room is in Sealed Containers	N/A	Air Fresheners in Room	No	
Mechanical Equipment Location 2nd	Floor Mechanical Room		Mechanical Room Clean	Yes	
Filters Installed Properly Yes	Filters Clean	Yes	nside of HVAC Unit Clean	Yes	
Condensate Pan Clean Yes	Cooling Coil Clean	Yes			
Fresh Air Intake Location Roc	of top	▼	Fresh Air Intake Free		
Pollutant Sources Near Air	•		of Obstruction	Yes	
Intake Nor	10	▼			
Observations					
Non Ducted Return - One stained ceil					
from door - water stained floor tile 10 changed.	feet in from door along v	wall - HFSP states leaks	were repaired but tiles n	ot	
Corrective Actions to be Completed by Site Based Staff Corrective Actions to be Completed by PPO					
Remove and replace stained ceiling tiles and if ▼ Repair HVAC to reduce humidity level ▼					
stains return, contact COMPASS for work order ▼					

Remove and replace stained ceiling tiles and if	▼
stains return, contact COMPASS for work order	▼
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Lauderhill Mid	dle Evaluation Date Septe	mber 14, 2012 Tim	e of Day 1:00		
Outdoor Conditions Temperature	91.7 Relative Humidit	y 58.3 Am	bient CO2 461		
Fish Temperature Range 133A 75.9 72 - 78	Relative Humidity Range 64.8 30% - 60%	CO ² 1207	Range # Occupar MAX 700 > 22 Ambient	nts	
Noticeable Odor No	isible water damage i	e microbial rowth? n	Amount of naterial affected		
Ceiling 2' X 4' Lay in	Yes	No	1 tile left wall	$\exists \mid$	
Walls Plaster	No	No		┚┃	
Floor 12" x 12" Vinyl	No	No		$\exists \mid$	
Ceiling Clean Yes Walls Clean Yes	HVAC Supply Grills Clean Yes	•	HVAC Return Grills Clean		
Flooring Clean Yes	Inside of Supply Duct Clean Yes		nside of Return Duct Clean		
Room Surfaces Yes Clean	Ceiling at Supply Grills Clean				
	Exhaust Fans Working N/A		oved Chemicals / s in Room		
Signs of Pests No	Drain Traps Wet N/A	Δir Fr	esheners No	\neg	
1100111 010110100	ood if Stored in Room is Sealed Containers	in Roo		_	
Mechanical Equipment Location 2nd Flo	oor Mechanical Room	Mechan	ical Room Clean Yes	<u>"</u>	
Filters Installed Properly Yes	Filters Clean Yes	Inside of	HVAC Unit Clean Yes	.	
Condensate Pan Clean Yes	Cooling Coil Clean Yes				
Fresh Air Intake Location Roof to	pp		n Air Intake Free	<u>, </u>	
Pollutant Sources Near Air Intake		▼		_	
Observations					
Non Ducted Return - Minor dust on ceilir slightly elevated - HFSP states leaks wer			- Humidity and CO2	_	
				_	
Corrective Actions to be Completed by Site Based Staff Corrective Actions to be Completed by PPO					
Clean ceilings around HVAC supply grills ▼ Repair HVAC to reduce humidity level ▼					
Remove and replace stained ceiling tiles and if ▼ Repair HVAC to reduce CO2 levels ▼					
stains return, contact COMPASS for v	vork order ▼ ▼			▼	

Lauderhill Middle	Evaluation Date	September 14, 2012	Time of Day	1:00		
Outdoor Conditions Temperature 91.	7 Relative Hu	midity 58.3	Ambient CO2 4	61		
Fish Temperature Range Rel 142 75.2 72 - 78	Ran 63.5 30% - 0	072	Range # Oo MAX 700 > Ambient	ccupants 21		
Noticeable Odor No Visible	water damage / staining?	Visible microbial growth?	Amount of material affected			
Ceiling 2' X 4' Lay in	Yes	Yes	3 tiles along left wa	II		
Walls Plaster	No	No				
Floor 12" x 12" Vinyl	No	No				
Ceiling Clean Yes	HVAC Supply Grills Clean	Yes	HVAC Return Grills Clean	Yes		
Walls Clean Yes Flooring Clean Yes	Inside of Supply Duct Clean	Yes	Inside of Return Duct Clean	N/A		
Room Surfaces Yes Clean	Ceiling at Supply Grills Clean	Yes				
	_	<u> </u>	Inapproved Chemicals / Eleaners in Room	No		
Signs of Pests No	Drain Traps Wet	N/A	Air Fresheners	No		
Troom orational 1110	Stored in Room is ed Containers	N/A	in Room	NO		
Mechanical Equipment Location 2nd Floor M	echanical Room	N	lechanical Room Clean	Yes		
Filters Installed Properly Yes	Filters Clean	Yes Ins	ide of HVAC Unit Clean	Yes		
Condensate Pan Clean Yes C	ooling Coil Clean	Yes				
Fresh Air Intake Location Roof top		▼	Fresh Air Intake Free of Obstruction	Yes		
Pollutant Sources Near Air Intake		▼				
Observations						
Non Ducted Return - Two stained tiles with microbial growth - Humidity slightly elevated - HFSP states leaks were repaired but tiles not changed.						
Corrective Actions to be Completed by Site Based Staff Corrective Actions to be Completed by PPO						
Remove and replace stained ceiling tiles and if ▼ Repair HVAC to reduce humidity level ▼						
stains return, contact COMPASS for work				▼		
	 			▼		
	▼					