ENVIRO TEAM NORTH AMERICA
BUILDING DIAGNOSTICS & IAQ

ENVIRONMENTAL SAMPLING

(Results of Assessment Performed on 9/12/19)

For

Scientific Air Management (S.A.M.)
1301 West Copans Road Suite D1
Pompano Beach Florida 33060

Enviro Team North America Project #: 190172

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LIC#CAC042599

CONTENTS

Executive Summary

September 19, 2019

Scientific Air Management (S.A.M.)
Attn: Randy Nobles, CMO Chief Marketing Officer
1301 West Copans Road Suite D1
Pompano Beach Florida 33060

Project: Florida Hospital

Mr. Nobles,

At your request, Enviro Team North America performed limited environmental sampling at the above referenced subject project on September 12th, 2019. The purpose was to measure indoor particle concentrations in multiple indoor locations before (baseline) and after (final) the placement and operation of local S400 air disinfection devices. The respirable particle sampling was reportedly requested by Baptist Health to have a non-affiliated 3rd party evaluation, and as a result, S.A.M. retained Enviro Team North America to perform an independent assessment.

Assessment Methodology: Enviro Team North America performed direct reading measurements for respirable particle concentrations in the 0.3µm, 0.5µm, 1.0µm, 2.0µm, 5.0µm, and 10.0µm particle sizes using a Fluke 983 and Met-One GT-526S. The particle counters were purged and zeroed between each location using a STERAPORE zero count filter. The sample volumes were set in concentration mode to capture a 60 second sample at 1/10th foot³/2.83L of air, as the indoor particle concentrations varied as a result of different locations and use. Multiple baseline and multiple final measurements were collected in their respective areas and totals were averaged.

Site Conditions/Measurement Parameters:

- Locations of indoor measurements:
  - Medical Arts Building
    - 2nd floor Fitness Center
    - 2nd floor Physical Therapy
  - Main Hospital
    - 1st floor Waiting Room
    - 1st floor Emergency Department

  - 1st floor O.R. Suite (Hallway at Nurse Station and Recovery)
  - 2nd floor Cardio Pulminary Admin. Offices
  - 2nd floor Cardio Pulminary Services Room
  - 2nd floor Acute Multi-specialty Care
  - Detached Laundry Room (Dirty)
- Indoor measurements were procured during normal day operations with typical occupancy. 2nd floor fitness center baseline measurements had approximately three individuals performing workout activities, and collection of our final measurements had approximately twenty individuals performing workout activities.
- The 1st floor waiting room and emergency department had operable doors to the exterior for ingress and egress.
- The fitness center had two S400 devices and physical therapy area had one S400 device in operation during the collection of our final measurements. These were in operation for an approximate 1-hour timeframe between the baseline and final measurements.
- The emergency department had three S400 devices operating during the collection of our final measurements. These were in operation for an approximate 30-minute timeframe between the baseline and final measurements.
- The acute multi-specialty care had two S400 devices operating during the collection of our final measurements. These were in operation for an approximate 30-minute timeframe between the baseline and final measurements.
- The remaining locations had one S400 devices operating during the collection of our final measurements. These were in operation for an approximate 30-minute timeframe between the baseline and final measurements.

<u>Conclusion:</u> The results of our measurements demonstrated that the use of the S400 devices resulted in an overall respirable particle count reduction ranging from 25%-65% indoors

The results of the tests represent conditions only at the time testing or sampling occurred. Thus, this report should not be relied on to represent conditions at other locations, times, or dates. Enviro Team North America reserves the right to supplement this report if more information and/or further issues are discovered. If needed, we are available to assist you with any of the recommendations or suggestions listed herein. Health related questions, or concerns, must be addressed (along with this report) by a qualified physician to give appropriate clinical meaning.

Limitations: Our opinions are based on the findings and upon our professional expertise with no warranty or guarantee implied herein. This report is intended for the sole use of your firm and your assigned agents. Enviro Team North America accepts no responsibility for interpretation of this report by others. Its contents shall not be used or relied upon by other parties without prior written authorization of Enviro Team North America.

Sincerely,
Enviro Team North America

Jason Popovic, CIE
Consultant, Building Sciences
State of Florida Licensed Mold Assessor #MRSA137

Enviro Team North America
6278 North Federal Highway, #450, Fort Lauderdale, FL 33308 (954) 978-8839 *Project #190172*

Airborne Particle Count Report

Project: Scientific Air Management – Hospital

Date: 9/12/19

Purpose: The airborne particle count report, using laser particle counting technology, is a screening tool that identifies particles present (or generated) within the space.

Health effects: First and foremost it should be understood that this method is not intended to establish mass concentration for compliance purposes. Appropriate NIOSH methods should be used for compliance purposes.

Particulates that are below 10 micrometers in size are considered respirable. Elevated levels (exceeding ASHRAE recommended levels) of respirable particulates can present a wide range of potential health effects including but not limited to chronic cough, chronic phlegm, shortness of breath, itching eyes, nasal congestion and sore throat.

Collection method: Airborne particle counts are measured with a state-of-the-art laser-based instrument. The air is pulled into a sensor through an inlet nozzle or an isokinetic sample tube. Particles in the sample pass through the optical detection (view) volume where a laser light source is concentrated. Particles scatter the laser light, which is then focused onto a photo diode. The photo diode detects and converts the light signal to electrical pulses. The height of the pulses is directly proportional to the particle size. The pulses are counted and measured by electronics on a circuit board containing counter/threshold circuitry, a microprocessor (CPU) and communications circuitry. The particles are measured in units of micrometers (µm). The 0.3µm, 0.5µm, 1.0µm, 2.0µm, 5.0µm, and 10.0µm particle sizes are measured.

Analysis method: The sample volume was set in concentration mode (for direct comparison to Met-One GT526S) to capture a 60 second sample at 1/10th foot^3/2.83L of air, as the indoor particle concentrations varied greatly due to different locations and use (i.e. outdoors, dirty laundry, operating room suite, etc.), and unknown particle levels. Measurements were collected with counting data in differential as cumulative is listed in the totals data below.

Findings/Results:

Location: Fitness Center

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	4650.0	2909.0	-37.4%
0.5	862.0	637.0	-26.1%
1.0	204.0	196.0	-3.9%
2.0	50.0	29.0	-42.0%
5.0	8.0	5.0	-37.5%
10.0	1.0	0.0	-100.0%
Total	5775.0	3776.0	-34.6%

Location: Physical Therapy

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	5190.0	2324.0	-55.2%
0.5	1002.0	474.0	-52.7%
1.0	263.0	142.0	-46.0%
2.0	78.0	42.0	-46.2%
5.0	4.0	4.0	0.0%
10.0	1.0	0.0	-100.0%
Total	6538.0	2986.0	-54.3%

Location: Waiting Room

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	4066.0	2666.0	-34.4%
0.5	834.0	560.0	-32.9%
1.0	434.0	228.0	-47.5%
2.0	293.0	147.0	-49.8%
5.0	12.0	6.0	-50.0%
10.0	1.0	0.0	-100.0%
Total	5640.0	3607.0	-36.0%

Location: Emergency Department

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	2711.0	1164.0	-57.1%
0.5	508.0	153.0	-69.9%
1.0	224.0	114.0	-49.1%
2.0	133.0	33.0	-75.2%
5.0	6.0	2.0	-66.7%
10.0	1.0	0.0	-100.0%
Total	3583.0	1466.0	-59.1%

Location: Cardiopulminary Admin. Office

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	1842.0	1140.0	-38.1%
0.5	258.0	187.0	-27.5%
1.0	83.0	65.0	-21.7%
2.0	35.0	26.0	-25.7%
5.0	9.0	3.0	-66.7%
10.0	1.0	0.0	-100.0%
Total	2228.0	1421.0	-36.2%

Location: Cardiopulminary Services Office

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	1851.0	701.0	-62.1%
0.5	296.0	128.0	-56.8%
1.0	91.0	40.0	-56.0%
2.0	26.0	20.0	-23.1%
5.0	14.0	3.0	-78.6%
10.0	1.0	0.0	-100.0%
Total	2279.0	892.0	-60.9%

Location: Acute Multi-Specialty Care

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	4373.0	2618.0	-40.1%
0.5	633.0	585.0	-7.6%
1.0	637.0	202.0	-68.3%
2.0	147.0	96.0	-34.7%
5.0	16.0	2.0	-87.5%
10.0	1.0	0.0	-100.0%
Total	5807.0	3503.0	-39.7%

Location: Laundry (Dirty)

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	10235.0	3839.0	-62.5%
0.5	2818.0	1011.0	-64.1%
1.0	1014.0	241.0	-76.2%
2.0	574.0	46.0	-92.0%
5.0	17.0	3.0	-82.4%
10.0	1.0	0.0	-100.0%
Total	14659.0	5140.0	-64.9%

Location: O.R. Suite West Hallway (Non-Surgical)

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	2293.0	1471.0	-35.8%
0.5	315.0	307.0	-2.5%
1.0	210.0	148.0	-29.5%
2.0	82.0	40.0	-51.2%
5.0	4.0	1.0	-75.0%
10.0	1.0	0.0	-100.0%
Total	2905.0	1967.0	-32.3%

Location: O.R. Suite Recovery Room (Non-Surgical)

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	1974.0	923.0	-53.2%
0.5	299.0	126.0	-57.9%
1.0	93.0	25.0	-73.1%
2.0	37.0	9.0	-75.7%
5.0	1.0	1.0	0.0%
10.0	1.0	0.0	-100.0%
Total	2405.0	1084.0	-54.9%

Location: Outdoor Air vs. Total Indoor Air (Averaged)

Particle Size (micrometers)	***Outdoor Air***	***Indoor Ambient Air (Averaged)***	***Percentage Reduction or Increase***
0.3	20398.0	3562.0	-82.5%
0.5	2953.0	712.0	-75.9%
1.0	1360.0	295.0	-78.3%
2.0	1259.0	133.0	-89.4%
5.0	55.0	8.0	-85.5%
10.0	1.0	1.0	0.0%
Total	26026.0	4711.0	-81.9%

Enviro Team North America
6278 North Federal Highway, #450, Fort Lauderdale, FL 33308 (954) 978-8839 *Project #190172*

Airborne Particle Count Report

Project: Scientific Air Management

Date: 9/12/19

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Analysis method: The sample volume was set in concentration mode (for direct comparison to Fluke 983) to capture a 60 second sample at $1/10^{th}$ $foot^3$/2.83L of air, as the indoor particle concentrations varied greatly due to different locations and use (i.e. outdoors, dirty laundry, operating room suite, etc.), and unknown particle levels. Measurements were collected with counting data in differential as cumulative is listed in the totals data below.

Findings/Results:

Location: Fitness Center

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	20176.0	12742.0	-36.8%
0.5	2900.0	2161.0	-25.5%
1.0	675.0	560.0	-17.0%
2.0	202.0	215.0	6.4%
5.0	44.0	40.0	-9.1%
10.0	9.0	0.0	-100.0%
Total	24006.0	15718.0	-34.5%

Location: Physical Therapy

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	22674.0	10896.0	-51.9%
0.5	3481.0	2094.0	-39.8%
1.0	852.0	490.0	-42.5%
2.0	306.0	226.0	-26.1%
5.0	48.0	28.0	-41.7%
10.0	23.0	0.0	-100.0%
Total	27384.0	13734.0	-49.8%

Location: Waiting Room

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	17719.0	11779.0	-33.5%
0.5	2909.0	1766.0	-39.3%
1.0	1316.0	742.0	-43.6%
2.0	1041.0	552.0	-47.0%
5.0	71.0	37.0	-47.9%
10.0	17.0	3.0	-82.4%
Total	23073.0	14879.0	-35.5%

Location: Emergency Department

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	15045.0	6244.0	-58.5%
0.5	2804.0	984.0	-64.9%
1.0	1148.0	362.0	-68.5%
2.0	510.0	159.0	-68.8%
5.0	44.0	23.0	-47.7%
10.0	13.0	0.0	-100.0%
Total	19564.0	7772.0	-60.3%

Location: Cardiopulminary Admin. Office

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	8207.0	4986.0	-39.2%
0.5	892.0	630.0	-29.4%
1.0	286.0	227.0	-20.6%
2.0	153.0	104.0	-32.0%
5.0	26.0	9.0	-65.4%
10.0	17.0	0.0	-100.0%
Total	9581.0	5956.0	-37.8%

Location: Cardiopulminary Services Office

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	8535.0	3925.0	-54.0%
0.5	987.0	549.0	-44.4%
1.0	232.0	156.0	-32.8%
2.0	142.0	88.0	-38.0%
5.0	23.0	26.0	13.0%
10.0	20.0	0.0	-100.0%
Total	9939.0	4744.0	-52.3%

Location: Acute Multi-Specialty Care

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	18537.0	11923.0	-35.7%
0.5	3189.0	2032.0	-36.3%
1.0	954.0	699.0	-26.7%
2.0	583.0	388.0	-33.4%
5.0	40.0	26.0	-35.0%
10.0	20.0	0.0	-100.0%
Total	23323.0	15068.0	-35.4%

Location: Laundry (Dirty)

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	44000.0	18053.0	-59.0%
0.5	9809.0	3724.0	-62.0%
1.0	3255.0	1036.0	-68.2%
2.0	2267.0	150.0	-93.4%
5.0	105.0	17.0	-83.8%
10.0	20.0	3.0	-85.0%
Total	59456.0	22983.0	-61.3%

Location: O.R. Suite West Hallway (Non-Surgical)

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	10086.0	7525.0	-25.4%
0.5	1305.0	1132.0	-13.3%
1.0	408.0	178.0	-56.4%
2.0	249.0	153.0	-38.6%
5.0	26.0	9.0	-65.4%
10.0	17.0	0.0	-100.0%
Total	12091.0	8997.0	-25.6%

Location: O.R. Suite Recovery Room (Non-Surgical)

Particle Size (micrometers)	***Indoor Air Before***	***Indoor Air After***	***Percentage Reduction or Increase***
0.3	8875.0	4372.0	-50.7%
0.5	1092.0	461.0	-57.8%
1.0	289.0	85.0	-70.6%
2.0	144.0	37.0	-74.3%
5.0	11.0	6.0	-45.5%
10.0	11.0	0.0	-100.0%
Total	10422.0	4961.0	-52.4%

Location: Outdoor Air vs. Total Indoor Air (Averaged)

Particle Size (micrometers)	***Outdoor Air***	***Indoor Ambient Air (Averaged)***	***Percentage Reduction or Increase***
0.3	86154.0	9244.5	-89.3%
0.5	9812.0	1553.3	-84.2%
1.0	4511.0	453.5	-89.9%
2.0	4497.0	207.2	-95.4%
5.0	258.0	22.1	-91.4%
10.0	17.0	0.3	-98.2%
Total	105249.0	11480.9	-89.1%