Quality Air Distribution Inc. Air & Hydronic Balancing

476 Oakwood Drive. Pickering, Ontario. L1W 2M7. Tel.(905) 492-3111 www.qualityairdistribution.com



Certified Member of the National Building Comfort Testing Association (NBCTA) Reg. No. 003-52

Test and Air/Hydronic Balance Analysis

Project name:	PAUL LEWIS Therapeutic Services.					
Project Address:	831 North Service Road. Mississauga, Ontario.					
Owner: Architect: Engineer:	PAUL LEWIS					
Our Job No. 21032896 Issued: 03/06/2021						
General: Mechanical: Sheet Metal: Control:						

Testing Personnel: D. Niezgoda P.Eng. Reported by: D. Niezgoda P.Eng.

The results, herein listed in this report, were tested in accordance with the latest NBCTA requirements for this trade

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Friday, March 05, 2021.

Project Name: PAUL LEWIS Therapeutic Services.

Project Address: 831 North Service Road. Mississauga, Ontario.

On Friday, March 05, 2021 I conducted test and adjustment for Energy Recovery Ventilators Servicing Treatment Rooms and Public Waiting Area of above-mentioned facility.

The purpose of this test and adjustments was achievement of negative pressure in the Treatment Rooms, positive pressure in the Common space (waiting area) and calculation of air changes (ACH)in the serviced areas.

Treatment Rooms and Common space are served by four Energy Recovery Ventilation Units, equipped with speed controllers allowing to control speed of air supply and exhaust fans separately.

All ERV terminals in the Treatment Rooms have their Exhaust Fans speed set to HI, Supply Fans only 70 percent of their nominal speed.

Energy Recovery Ventilator Unit Servicing Common area is setup reversely, Supply Fan HI speed and Exhaust Fan 70 percent of its nominal speed.

As a result, tested pressure in Treatment Rooms with reference to Common space is as follow:

- Treatment Room № 1: -0.007" WC
- Treatment Room № 2: -0.003" WC
- Treatment Room № 3: -0.004" WC

DISCLAIMER:

This document has no meaning to override or substitute for an Existing Regulations /Guide Lines governing HVAC equipment installation and its adjustment for Medical Industry.



Project/Address PAUL LEWIS Therapeutic Services. 831 North Service Road. Mississauga, Ontario. Independent Enery Recover Ventilation Units Name Lx W x H (FT) (CFT) ACH-total O.A. ACH Intake № Type CFM ACH AC	Air Changes per Hour (ACH) test sheet									Page № Index №	1		
System Independent Enery Recover Ventilation Units Room № Rm. dimentions Rm. Vol. (CFT) Required ACH-total Outlet / Outlet / Outlet / Intake № Required CFM ACH ACH ACH ACH ACH ACH ACH ACH Therapy 1 10 9.5 8 760.0 Exhaust opening 126 9.9 Therapy 2 15 9.5 8 1140.0 Exhaust opening 188 9.9	Project/Add	Irocc		ΡΔΙΙΙ	I EW/IS T	heraneutic '	Sarvicas 8'	31 North S	ervice Road I	Miceieeau	na Ontario		ı
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	тпстару о	10.0	10.5	U	1033.3			LAHAUSI	opening		100	0.1	

NOTES: Air Change per Hour Calculation: ACH= CFM x 60 / Room Volume
To calculate time (minutes) for airborne contaminant removal: 414.5 /ACH (in minutes)

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QALL	DIFFUSER & GRILLE TEST SHEET						Index No.	1	
Project Name: PAUL LEWIS Therapeutic Services. 831 North Service Road. Miss									
ystem No./	Name:		Multiple Energy Recov	very Ventilation	on Units.				
Room No. Otle		Code	Size in ich's	A.k.	REQUESTED		First reading		JAL
	Intake		Description	Factor	fpm	cfm	fpm/cfm	fpm	cfm
					==>				
			I hei	rapy Room #	‡1 ERV-1				
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Therapy 1 Therapy 1	Supply Exhaust		4 Ø	0.087				1440	126
тпетару т	Exilaust	OFE	4 V	0.067				1440	120
			Thei	rapy Room #	#2 ERV-2				
Therapy 2	Supply	OPE	6 Ø	0.196				770	151
Therapy 2	Exhaust	OPE	6 Ø	0.196				960	188
			The		10 ED) / 0				
			I hei	rapy Room #	#3 EKV-3				
Therapy 3	Supply	OPE	5 Ø	0.136			+	780	106
Therapy 3			5 Ø	0.136			+	1170	159
crapy 0	-Alladot	٥. ١	<u> </u>	3.100					100
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Corridor	Supply	D	5 Ø	hood					121
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