Adopted Emission factor (Year 2023)

FBSD

Pollutant	Warm Idling (g/s)	Cold Idling (g/s)[1]	Running (g/km, at 10kph) [2]
TSP	6.27E-05	6.27E-05	2.81E-01
RSP	6.27E-05	6.27E-05	2.81E-01
FSP	6.27E-05	6.27E-05	2.59E-01

Note

[1]: For TSP/RSP/FSP no emission factor has been provided in "Calculation od Start Emissions in Air Quality Impact Assessment" by EPD, emission factor is assumed the same as warm idling emission factor stated in "Road tunnels: Vehicle emission and air demand for ventilation, PIARC, 2019" for conservative assessments.

[2]: Running emission is extracted from Emfac v4.3.

FBDD

Pollutant	Warm Idling (g/s)	Cold Idling (g/s)[1]	Running (g/km, at 10kph) [2]
TSP	5.37E-05	5.37E-05	3.42E-01
RSP	5.37E-05	5.37E-05	3.42E-01
FSP	5.37E-05	5.37E-05	3.14E-01

Note

[1]: For TSP/RSP/FSP no emission factor has been provided in "Calculation od Start Emissions in Air Quality Impact Assessment" by EPD, emission factor is assumed the same as warm idling emission factor stated in "Road tunnels: Vehicle emission and air demand for ventilation, PIARC, 2019" for conservative assessments.

[2]: Running emission is extracted from Emfac v4.3.

Suvery Data and Emission Inventory for PTIs

Location: **Yat Tung Estate PTI**

Routing (m)	
Bypass route	140
Running inside PTI	390
Circulating Lane	90

Idling time (min)	
Bypass	0.5
Terminating	2

Dated 20200224

PTI ID	Hour		No. of Single Deck Bus																			No of Double Deck Bus																		
	Start	End	0	5	10	20	30	40	50	60	120	180	240	300	360	420	480	540	600	660	720	0	5	10	20	30	40	50	60	120	180	240	300	360	420	480	540	600	660	720
YTE	10	11	1			2																7			31															
	11	12				2																7			31															
	12	13	1			2																7			32															
	13	14				2																7			32															
	14	15	1			2																7			32															
	15	16	1			4																7			32															
	16	17	1			4																7			32															
	17	18	1			4																8			33															
	18	19	1			4																8			33															
	19	20	1			3																8			32															
	20	21	1			2																8			31															
	21	22	1			2																8			31															
	22	23	1			2																8			32															
	23	0				2																7			30															
	0	1				1																1			12															
	1	2																							2															
	2	3																							2															
	3	4																							2															
	4	5																							2															
	5	6																				3			18											2				
	6	7				2																6			36											2				
	7	8	2			6																14			43											4				
	8	9	2			4																7			39															
	9	10	1			2																8			32															

Hour		Emission (g/s)_FBSD											
		TSP				RSP				FSP			
Start	End	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane
10	11	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	6.61E-05	2.59E-05
11	12	0.00E+00	4.22E-06	6.09E-05	2.81E-05	0.00E+00	4.22E-06	6.09E-05	2.81E-05	0.00E+00	4.22E-06	5.60E-05	2.59E-05
12	13	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	6.61E-05	2.59E-05
13	14	0.00E+00	4.22E-06	6.09E-05	2.81E-05	0.00E+00	4.22E-06	6.09E-05	2.81E-05	0.00E+00	4.22E-06	5.60E-05	2.59E-05
14	15	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	6.61E-05	2.59E-05
15	16	5.28E-07	8.44E-06	1.33E-04	5.62E-05	5.28E-07	8.44E-06	1.33E-04	5.62E-05	5.28E-07	8.44E-06	1.22E-04	5.17E-05
16	17	5.28E-07	8.44E-06	1.33E-04	5.62E-05	5.28E-07	8.44E-06	1.33E-04	5.62E-05	5.28E-07	8.44E-06	1.22E-04	5.17E-05
17	18	5.28E-07	8.44E-06	1.33E-04	5.62E-05	5.28E-07	8.44E-06	1.33E-04	5.62E-05	5.28E-07	8.44E-06	1.22E-04	5.17E-05
18	19	5.28E-07	8.44E-06	1.33E-04	5.62E-05	5.28E-07	8.44E-06	1.33E-04	5.62E-05	5.28E-07	8.44E-06	1.22E-04	5.17E-05
19	20	5.28E-07	6.33E-06	1.02E-04	4.22E-05	5.28E-07	6.33E-06	1.02E-04	4.22E-05	5.28E-07	6.33E-06	9.41E-05	3.88E-05
20	21	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	6.61E-05	2.59E-05
21	22	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	6.61E-05	2.59E-05
22	23	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	6.61E-05	2.59E-05
23	0	0.00E+00	4.22E-06	6.09E-05	2.81E-05	0.00E+00	4.22E-06	6.09E-05	2.81E-05	0.00E+00	4.22E-06	5.60E-05	2.59E-05
0	1	0.00E+00	2.11E-06	3.05E-05	1.41E-05	0.00E+00	2.11E-06	3.05E-05	1.41E-05	0.00E+00	2.11E-06	2.80E-05	1.29E-05
1	2	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
2	3	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
3	4	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
4	5	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
5	6	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
6	7	0.00E+00	4.22E-06	6.09E-05	2.81E-05	0.00E+00	4.22E-06	6.09E-05	2.81E-05	0.00E+00	4.22E-06	5.60E-05	2.59E-05
7	8	1.06E-06	1.27E-05	2.05E-04	8.43E-05	1.06E-06	1.27E-05	2.05E-04	8.43E-05	1.06E-06	1.27E-05	1.88E-04	7.76E-05
8	9	1.06E-06	8.44E-06	1.44E-04	5.62E-05	1.06E-06	8.44E-06	1.44E-04	5.62E-05	1.06E-06	8.44E-06	1.32E-04	5.17E-05
9	10	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	7.18E-05	2.81E-05	5.28E-07	4.22E-06	6.61E-05	2.59E-05

Hour		Emission Rate (g/s)_FBDD											
		TSP				RSP				FSP			
Start	End	Idling (Bypass)	Idling (Terminating)	Running within PTI	Start and Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane
10	11	3.13E-06	5.55E-05	1.24E-03	5.29E-04	3.13E-06	5.55E-05	1.24E-03	5.29E-04	3.13E-06	5.55E-05	1.14E-03	4.87E-04
11	12	3.13E-06	5.55E-05	1.24E-03	5.29E-04	3.13E-06	5.55E-05	1.24E-03	5.29E-04	3.13E-06	5.55E-05	1.14E-03	4.87E-04
12	13	3.13E-06	5.72E-05	1.28E-03	5.47E-04	3.13E-06	5.72E-05	1.28E-03	5.47E-04	3.13E-06	5.72E-05	1.18E-03	5.03E-04
13	14	3.13E-06	5.72E-05	1.28E-03	5.47E-04	3.13E-06	5.72E-05	1.28E-03	5.47E-04	3.13E-06	5.72E-05	1.18E-03	5.03E-04
14	15	3.13E-06	5.72E-05	1.28E-03	5.47E-04	3.13E-06	5.72E-05	1.28E-03	5.47E-04	3.13E-06	5.72E-05	1.18E-03	5.03E-04
15	16	3.13E-06	5.72E-05	1.28E-03	5.47E-04	3.13E-06	5.72E-05	1.28E-03	5.47E-04	3.13E-06	5.72E-05	1.18E-03	5.03E-04
16	17	3.13E-06	5.72E-05	1.28E-03	5.47E-04	3.13E-06	5.72E-05	1.28E-03	5.47E-04	3.13E-06	5.72E-05	1.18E-03	5.03E-04
17	18	3.58E-06	5.90E-05	1.33E-03	5.64E-04	3.58E-06	5.90E-05	1.33E-03	5.64E-04	3.58E-06	5.90E-05	1.22E-03	5.19E-04
18	19	3.58E-06	5.90E-05	1.33E-03	5.64E-04	3.58E-06	5.90E-05	1.33E-03	5.64E-04	3.58E-06	5.90E-05	1.22E-03	5.19E-04
19	20	3.58E-06	5.72E-05	1.29E-03	5.47E-04	3.58E-06	5.72E-05	1.29E-03	5.47E-04	3.58E-06	5.72E-05	1.19E-03	5.03E-04
20	21	3.58E-06	5.55E-05	1.25E-03	5.29E-04	3.58E-06	5.55E-05	1.25E-03	5.29E-04	3.58E-06	5.55E-05	1.15E-03	4.87E-04
21	22	3.58E-06	5.55E-05	1.25E-03	5.29E-04	3.58E-06	5.55E-05	1.25E-03	5.29E-04	3.58E-06	5.55E-05	1.15E-03	4.87E-04
22	23	3.58E-06	5.72E-05	1.29E-03	5.47E-04	3.58E-06	5.72E-05	1.29E-03	5.47E-04	3.58E-06	5.72E-05	1.19E-03	5.03E-04
23	0	3.13E-06	5.37E-05	1.20E-03	5.12E-04	3.13E-06	5.37E-05	1.20E-03	5.12E-04	3.13E-06	5.37E-05	1.11E-03	4.71E-04
0	1	4.47E-07	2.15E-05	4.57E-04	2.05E-04	4.47E-07	2.15E-05	4.57E-04	2.05E-04	4.47E-07	2.15E-05	4.21E-04	1.89E-04
1	2	0.00E+00	3.58E-06	7.40E-05	3.42E-05	0.00E+00	3.58E-06	7.40E-05	3.42E-05	0.00E+00	3.58E-06	6.81E-05	3.14E-05
2	3	0.00E+00	3.58E-06	7.40E-05	3.42E-05	0.00E+00	3.58E-06	7.40E-05	3.42E-05	0.00E+00	3.58E-06	6.81E-05	3.14E-05
3	4	0.00E+00	3.58E-06	7.40E-05	3.42E-05	0.00E+00	3.58E-06	7.40E-05	3.42E-05	0.00E+00	3.58E-06	6.81E-05	3.14E-05
4	5	0.00E+00	3.58E-06	7.40E-05	3.42E-05	0.00E+00	3.58E-06	7.40E-05	3.42E-05	0.00E+00	3.58E-06	6.81E-05	3.14E-05
5	6	1.34E-06	3.58E-05	7.80E-04	3.42E-04	1.34E-06	3.58E-05	7.80E-04	3.42E-04	1.34E-06	3.58E-05	7.18E-04	3.14E-04
6	7	2.68E-06	6.80E-05	1.49E-03	6.49E-04	2.68E-06	6.80E-05	1.49E-03	6.49E-04	2.68E-06	6.80E-05	1.37E-03	5.97E-04
7	8	6.26E-06	8.41E-05	1.93E-03	8.03E-04	6.26E-06	8.41E-05	1.93E-03	8.03E-04	6.26E-06	8.41E-05	1.77E-03	7.39E-04
8	9	3.13E-06	6.98E-05	1.54E-03	6.66E-04	3.13E-06	6.98E-05	1.54E-03	6.66E-04	3.13E-06	6.98E-05	1.41E-03	6.13E-04
9	10	3.58E-06	5.72E-05	1.29E-03	5.47E-04	3.58E-06	5.72E-05	1.29E-03	5.47E-04	3.58E-06	5.72E-05	1.19E-03	5.03E-04

Note: Since there is not start emission of diesel vehicles according to Emfac-HK v4.3, soak time is not adopted for calculation.

Location: **Planned PTI at Area 113**

Routing (m)	
Bypass route	400
Running Route	400

Idling time (min)	
Bypass	0.5
Terminating	2

Dated 20200224

PTI ID	Hour		No. of Single Deck Bus																			No of Double Deck Bus																		
	Start	End	0	5	10	20	30	40	50	60	120	180	240	300	360	420	480	540	600	660	720	0	5	10	20	30	40	50	60	120	180	240	300	360	420	480	540	600	660	720
P113	10	11																				20			11															
	11	12																				20			9															
	12	13																				20			8															
	13	14																				20			9															
	14	15																				20			8															
	15	16																				20			9															
	16	17																				20			15															
	17	18																				26			27															
	18	19																				26			30															
	19	20																				26			27															
	20	21																				22			16															
	21	22																				20			16															
	22	23																				16			8															
	23	0																				16			8															
	0	1																				16			4															
	1	2																																						
	2	3																																						
	3	4																																						
	4	5																																						
	5	6																	2			12			5											2				
	6	7																	3			16			10											2				
	7	8																	5			26			25											2				
	8	9																				26			30															
	9	10																				26			24															

Hour		Emission Rate (g/s)_FBSD											
		TSP				RSP				FSP			
Start	End	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane
10	11	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
11	12	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
12	13	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
13	14	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
14	15	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
15	16	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
16	17	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
17	18	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
18	19	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
19	20	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
20	21	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
21	22	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
22	23	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
23	0	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
0	1	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
1	2	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
2	3	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
3	4	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
4	5	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
5	6	0.00E+00	4.22E-06	6.25E-05	-	0.00E+00	4.22E-06	6.25E-05	-	0.00E+00	4.22E-06	5.75E-05	-
6	7	0.00E+00	6.33E-06	9.37E-05	-	0.00E+00	6.33E-06	9.37E-05	-	0.00E+00	6.33E-06	8.62E-05	-
7	8	0.00E+00	1.06E-05	1.56E-04	-	0.00E+00	1.06E-05	1.56E-04	-	0.00E+00	1.06E-05	1.44E-04	-
8	9	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
9	10	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-

Hour		Emission Rate (g/s)_FBDD											
		TSP				RSP				FSP			
Start	End	Idling (Bypass)	Idling (Terminating)	Running within PTI	Start and Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane
10	11	8.94E-06	1.97E-05	1.18E-03	-	8.94E-06	1.97E-05	1.18E-03	0.00E+00	8.94E-06	1.97E-05	1.08E-03	0.00E+00
11	12	8.94E-06	1.61E-05	1.10E-03	-	8.94E-06	1.61E-05	1.10E-03	0.00E+00	8.94E-06	1.61E-05	1.01E-03	0.00E+00
12	13	8.94E-06	1.43E-05	1.06E-03	-	8.94E-06	1.43E-05	1.06E-03	0.00E+00	8.94E-06	1.43E-05	9.78E-04	0.00E+00
13	14	8.94E-06	1.61E-05	1.10E-03	-	8.94E-06	1.61E-05	1.10E-03	0.00E+00	8.94E-06	1.61E-05	1.01E-03	0.00E+00
14	15	8.94E-06	1.43E-05	1.06E-03	-	8.94E-06	1.43E-05	1.06E-03	0.00E+00	8.94E-06	1.43E-05	9.78E-04	0.00E+00
15	16	8.94E-06	1.61E-05	1.10E-03	-	8.94E-06	1.61E-05	1.10E-03	0.00E+00	8.94E-06	1.61E-05	1.01E-03	0.00E+00
16	17	8.94E-06	2.68E-05	1.33E-03	-	8.94E-06	2.68E-05	1.33E-03	0.00E+00	8.94E-06	2.68E-05	1.22E-03	0.00E+00
17	18	1.16E-05	4.83E-05	2.01E-03	-	1.16E-05	4.83E-05	2.01E-03	0.00E+00	1.16E-05	4.83E-05	1.85E-03	0.00E+00
18	19	1.16E-05	5.37E-05	2.13E-03	-	1.16E-05	5.37E-05	2.13E-03	0.00E+00	1.16E-05	5.37E-05	1.96E-03	0.00E+00
19	20	1.16E-05	4.83E-05	2.01E-03	-	1.16E-05	4.83E-05	2.01E-03	0.00E+00	1.16E-05	4.83E-05	1.85E-03	0.00E+00
20	21	9.84E-06	2.86E-05	1.44E-03	-	9.84E-06	2.86E-05	1.44E-03	0.00E+00	9.84E-06	2.86E-05	1.33E-03	0.00E+00
21	22	8.94E-06	2.86E-05	1.37E-03	-	8.94E-06	2.86E-05	1.37E-03	0.00E+00	8.94E-06	2.86E-05	1.26E-03	0.00E+00
22	23	7.15E-06	1.43E-05	9.11E-04	-	7.15E-06	1.43E-05	9.11E-04	0.00E+00	7.15E-06	1.43E-05	8.38E-04	0.00E+00
23	0	7.15E-06	1.43E-05	9.11E-04	-	7.15E-06	1.43E-05	9.11E-04	0.00E+00	7.15E-06	1.43E-05	8.38E-04	0.00E+00
0	1	7.15E-06	7.15E-06	7.59E-04	-	7.15E-06	7.15E-06	7.59E-04	0.00E+00	7.15E-06	7.15E-06	6.98E-04	0.00E+00
1	2	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
2	3	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
3	4	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
4	5	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
5	6	5.37E-06	1.25E-05	7.21E-04	-	5.37E-06	1.25E-05	7.21E-04	0.00E+00	5.37E-06	1.25E-05	6.64E-04	0.00E+00
6	7	7.15E-06	2.15E-05	1.06E-03	-	7.15E-06	2.15E-05	1.06E-03	0.00E+00	7.15E-06	2.15E-05	9.78E-04	0.00E+00
7	8	1.16E-05	4.83E-05	2.01E-03	-	1.16E-05	4.83E-05	2.01E-03	0.00E+00	1.16E-05	4.83E-05	1.85E-03	0.00E+00
8	9	1.16E-05	5.37E-05	2.13E-03	-	1.16E-05	5.37E-05	2.13E-03	0.00E+00	1.16E-05	5.37E-05	1.96E-03	0.00E+00
9	10	1.16E-05	4.29E-05	1.90E-03	-	1.16E-05	4.29E-05	1.90E-03	0.00E+00	1.16E-05	4.29E-05	1.75E-03	0.00E+00

Note: Since there is not start emission of diesel vehicles according to Emfac-HK v4.3, soak time is not adopted for calculation.

Location: **Planned PTI at Area 38**

Routing (m)	
Bypass route	215
Running Route	315

Idling time (min)	
Bypass	0.5
Terminating	2

Dated 20200423

PTI ID	Hour		No. of Single Deck Bus																			No of Double Deck Bus																		
	Start	End	0	5	10	20	30	40	50	60	120	180	240	300	360	420	480	540	600	660	720	0	5	10	20	30	40	50	60	120	180	240	300	360	420	480	540	600	660	720
P38	10	11	3																			23			17															
	11	12	2																			23			17															
	12	13	3																			23			17															
	13	14	2																			24			17															
	14	15	3																			23			19															
	15	16	5																			24			19															
	16	17	5																			35			19															
	17	18	5																			37			19															
	18	19	5																			37			20															
	19	20	4																			34			20															
	20	21	4																			24			20															
	21	22	3																			24			18															
	22	23	3																			24			16															
	23	0	2																			16			14															
	0	1	1																			11			7															
	1	2																				4			3															
	2	3																				4			2															
	3	4																				4			2															
	4	5																				4			2															
	5	6																				11			8											2				
	6	7	1																			25			17											2				
	7	8	6																			43			23											5				
	8	9	7																			39			23															
	9	10	4																			34			19															

Hour		Emission Rate (g/s)_FBSD											
		TSP				RSP				FSP			
Start	End	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane
10	11	1.58E-06	0.00E+00	5.04E-05	-	1.58E-06	0.00E+00	5.04E-05	-	1.58E-06	0.00E+00	4.63E-05	-
11	12	1.06E-06	0.00E+00	3.36E-05	-	1.06E-06	0.00E+00	3.36E-05	-	1.06E-06	0.00E+00	3.09E-05	-
12	13	1.58E-06	0.00E+00	5.04E-05	-	1.58E-06	0.00E+00	5.04E-05	-	1.58E-06	0.00E+00	4.63E-05	-
13	14	1.06E-06	0.00E+00	3.36E-05	-	1.06E-06	0.00E+00	3.36E-05	-	1.06E-06	0.00E+00	3.09E-05	-
14	15	1.58E-06	0.00E+00	5.04E-05	-	1.58E-06	0.00E+00	5.04E-05	-	1.58E-06	0.00E+00	4.63E-05	-
15	16	2.64E-06	0.00E+00	8.39E-05	-	2.64E-06	0.00E+00	8.39E-05	-	2.64E-06	0.00E+00	7.72E-05	-
16	17	2.64E-06	0.00E+00	8.39E-05	-	2.64E-06	0.00E+00	8.39E-05	-	2.64E-06	0.00E+00	7.72E-05	-
17	18	2.64E-06	0.00E+00	8.39E-05	-	2.64E-06	0.00E+00	8.39E-05	-	2.64E-06	0.00E+00	7.72E-05	-
18	19	2.64E-06	0.00E+00	8.39E-05	-	2.64E-06	0.00E+00	8.39E-05	-	2.64E-06	0.00E+00	7.72E-05	-
19	20	2.11E-06	0.00E+00	6.72E-05	-	2.11E-06	0.00E+00	6.72E-05	-	2.11E-06	0.00E+00	6.18E-05	-
20	21	2.11E-06	0.00E+00	6.72E-05	-	2.11E-06	0.00E+00	6.72E-05	-	2.11E-06	0.00E+00	6.18E-05	-
21	22	1.58E-06	0.00E+00	5.04E-05	-	1.58E-06	0.00E+00	5.04E-05	-	1.58E-06	0.00E+00	4.63E-05	-
22	23	1.58E-06	0.00E+00	5.04E-05	-	1.58E-06	0.00E+00	5.04E-05	-	1.58E-06	0.00E+00	4.63E-05	-
23	0	1.06E-06	0.00E+00	3.36E-05	-	1.06E-06	0.00E+00	3.36E-05	-	1.06E-06	0.00E+00	3.09E-05	-
0	1	5.28E-07	0.00E+00	1.68E-05	-	5.28E-07	0.00E+00	1.68E-05	-	5.28E-07	0.00E+00	1.54E-05	-
1	2	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
2	3	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
3	4	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
4	5	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
5	6	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-
6	7	5.28E-07	0.00E+00	1.68E-05	-	5.28E-07	0.00E+00	1.68E-05	-	5.28E-07	0.00E+00	1.54E-05	-
7	8	3.17E-06	0.00E+00	1.01E-04	-	3.17E-06	0.00E+00	1.01E-04	-	3.17E-06	0.00E+00	9.27E-05	-
8	9	3.69E-06	0.00E+00	1.18E-04	-	3.69E-06	0.00E+00	1.18E-04	-	3.69E-06	0.00E+00	1.08E-04	-
9	10	2.11E-06	0.00E+00	6.72E-05	-	2.11E-06	0.00E+00	6.72E-05	-	2.11E-06	0.00E+00	6.18E-05	-

Hour		Emission Rate (g/s)_FBDD											
		TSP				RSP				FSP			
Start	End	Idling (Bypass)	Idling (Terminating)	Running within PTI	Start and Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane
10	11	1.03E-05	3.04E-05	9.77E-04	-	1.03E-05	3.04E-05	9.77E-04	0.00E+00	1.03E-05	3.04E-05	8.99E-04	0.00E+00
11	12	1.03E-05	3.04E-05	9.77E-04	-	1.03E-05	3.04E-05	9.77E-04	0.00E+00	1.03E-05	3.04E-05	8.99E-04	0.00E+00
12	13	1.03E-05	3.04E-05	9.77E-04	-	1.03E-05	3.04E-05	9.77E-04	0.00E+00	1.03E-05	3.04E-05	8.99E-04	0.00E+00
13	14	1.07E-05	3.04E-05	9.98E-04	-	1.07E-05	3.04E-05	9.98E-04	0.00E+00	1.07E-05	3.04E-05	9.18E-04	0.00E+00
14	15	1.03E-05	3.40E-05	1.04E-03	-	1.03E-05	3.40E-05	1.04E-03	0.00E+00	1.03E-05	3.40E-05	9.54E-04	0.00E+00
15	16	1.07E-05	3.40E-05	1.06E-03	-	1.07E-05	3.40E-05	1.06E-03	0.00E+00	1.07E-05	3.40E-05	9.73E-04	0.00E+00
16	17	1.57E-05	3.40E-05	1.28E-03	-	1.57E-05	3.40E-05	1.28E-03	0.00E+00	1.57E-05	3.40E-05	1.18E-03	0.00E+00
17	18	1.65E-05	3.40E-05	1.32E-03	-	1.65E-05	3.40E-05	1.32E-03	0.00E+00	1.65E-05	3.40E-05	1.22E-03	0.00E+00
18	19	1.65E-05	3.58E-05	1.35E-03	-	1.65E-05	3.58E-05	1.35E-03	0.00E+00	1.65E-05	3.58E-05	1.24E-03	0.00E+00
19	20	1.52E-05	3.58E-05	1.29E-03	-	1.52E-05	3.58E-05	1.29E-03	0.00E+00	1.52E-05	3.58E-05	1.19E-03	0.00E+00
20	21	1.07E-05	3.58E-05	1.09E-03	-	1.07E-05	3.58E-05	1.09E-03	0.00E+00	1.07E-05	3.58E-05	1.00E-03	0.00E+00
21	22	1.07E-05	3.22E-05	1.03E-03	-	1.07E-05	3.22E-05	1.03E-03	0.00E+00	1.07E-05	3.22E-05	9.46E-04	0.00E+00
22	23	1.07E-05	2.86E-05	9.68E-04	-	1.07E-05	2.86E-05	9.68E-04	0.00E+00	1.07E-05	2.86E-05	8.91E-04	0.00E+00
23	0	7.15E-06	2.50E-05	7.45E-04	-	7.15E-06	2.50E-05	7.45E-04	0.00E+00	7.15E-06	2.50E-05	6.85E-04	0.00E+00
0	1	4.92E-06	1.25E-05	4.34E-04	-	4.92E-06	1.25E-05	4.34E-04	0.00E+00	4.92E-06	1.25E-05	3.99E-04	0.00E+00
1	2	1.79E-06	5.37E-06	1.71E-04	-	1.79E-06	5.37E-06	1.71E-04	0.00E+00	1.79E-06	5.37E-06	1.58E-04	0.00E+00
2	3	1.79E-06	3.58E-06	1.41E-04	-	1.79E-06	3.58E-06	1.41E-04	0.00E+00	1.79E-06	3.58E-06	1.30E-04	0.00E+00
3	4	1.79E-06	3.58E-06	1.41E-04	-	1.79E-06	3.58E-06	1.41E-04	0.00E+00	1.79E-06	3.58E-06	1.30E-04	0.00E+00
4	5	1.79E-06	3.58E-06	1.41E-04	-	1.79E-06	3.58E-06	1.41E-04	0.00E+00	1.79E-06	3.58E-06	1.30E-04	0.00E+00
5	6	4.92E-06	1.79E-05	5.23E-04	-	4.92E-06	1.79E-05	5.23E-04	0.00E+00	4.92E-06	1.79E-05	4.81E-04	0.00E+00
6	7	1.12E-05	3.40E-05	1.08E-03	-	1.12E-05	3.40E-05	1.08E-03	0.00E+00	1.12E-05	3.40E-05	9.92E-04	0.00E+00
7	8	1.92E-05	5.01E-05	1.71E-03	-	1.92E-05	5.01E-05	1.71E-03	0.00E+00	1.92E-05	5.01E-05	1.58E-03	0.00E+00
8	9	1.74E-05	4.11E-05	1.48E-03	-	1.74E-05	4.11E-05	1.48E-03	0.00E+00	1.74E-05	4.11E-05	1.36E-03	0.00E+00
9	10	1.52E-05	3.40E-05	1.26E-03	-	1.52E-05	3.40E-05	1.26E-03	0.00E+00	1.52E-05	3.40E-05	1.16E-03	0.00E+00

Note: Since there is not start emission of diesel vehicles according to Emfac-HK v4.3, soak time is not adopted for calculation.

Location: **Tung Chung Temporary Bus Terminus**

Routing (m)	
Bypass route	240
Running Route	240

Idling time (min)	
Bypass	0.5
Terminating	2

Dated 20200423

PTI ID	Hour		No. of Single Deck Bus																			No of Double Deck Bus																		
	Start	End	0	5	10	20	30	40	50	60	120	180	240	300	360	420	480	540	600	660	720	0	5	10	20	30	40	50	60	120	180	240	300	360	420	480	540	600	660	720
TBT	10	11				5																4																		
	11	12				3																4																		
	12	13				4																4																		
	13	14				4																4																		
	14	15				4																6																		
	15	16				2																6																		
	16	17				3																6																		
	17	18				3																6																		
	18	19				3																6																		
	19	20				2																6																		
	20	21				1																6																		
	21	22				1																5																		
	22	23																				4																		
	23	0																				4																		
	0	1																				4																		
	1	2																				3																		
	2	3																				2																		
	3	4																				2																		
	4	5																				2																		
	5	6																		3		2														2				
	6	7																		3		3														2				
	7	8				3														6		6														4				
	8	9				3																6																		
	9	10				3																6																		

PTI ID	Hour		Emission Rate (g/s)_FBSD												Emission Rate (g/s)_FBDD											
			TSP				RSP				FSP				TSP				RSP				FSP			
	Start	End	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Start and Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane
TBT	10	11	0.00E+00	1.06E-05	9.37E-05	-	0.00E+00	1.06E-05	9.37E-05	-	0.00E+00	1.06E-05	8.62E-05	-	1.79E-06	0.00E+00	9.11E-05	-	1.79E-06	0.00E+00	9.11E-05	0.00E+00	1.79E-06	0.00E+00	8.38E-05	0.00E+00
	11	12	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.17E-05	-	1.79E-06	0.00E+00	9.11E-05	-	1.79E-06	0.00E+00	9.11E-05	0.00E+00	1.79E-06	0.00E+00	8.38E-05	0.00E+00
	12	13	0.00E+00	8.44E-06	7.50E-05	-	0.00E+00	8.44E-06	7.50E-05	-	0.00E+00	8.44E-06	6.90E-05	-	1.79E-06	0.00E+00	9.11E-05	-	1.79E-06	0.00E+00	9.11E-05	0.00E+00	1.79E-06	0.00E+00	8.38E-05	0.00E+00
	13	14	0.00E+00	8.44E-06	7.50E-05	-	0.00E+00	8.44E-06	7.50E-05	-	0.00E+00	8.44E-06	6.90E-05	-	1.79E-06	0.00E+00	9.11E-05	-	1.79E-06	0.00E+00	9.11E-05	0.00E+00	1.79E-06	0.00E+00	8.38E-05	0.00E+00
	14	15	0.00E+00	8.44E-06	7.50E-05	-	0.00E+00	8.44E-06	7.50E-05	-	0.00E+00	8.44E-06	6.90E-05	-	2.68E-06	0.00E+00	1.37E-04	-	2.68E-06	0.00E+00	1.37E-04	0.00E+00	2.68E-06	0.00E+00	1.26E-04	0.00E+00
	15	16	0.00E+00	4.22E-06	3.75E-05	-	0.00E+00	4.22E-06	3.75E-05	-	0.00E+00	4.22E-06	3.45E-05	-	2.68E-06	0.00E+00	1.37E-04	-	2.68E-06	0.00E+00	1.37E-04	0.00E+00	2.68E-06	0.00E+00	1.26E-04	0.00E+00
	16	17	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.17E-05	-	2.68E-06	0.00E+00	1.37E-04	-	2.68E-06	0.00E+00	1.37E-04	0.00E+00	2.68E-06	0.00E+00	1.26E-04	0.00E+00
	17	18	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.17E-05	-	2.68E-06	0.00E+00	1.37E-04	-	2.68E-06	0.00E+00	1.37E-04	0.00E+00	2.68E-06	0.00E+00	1.26E-04	0.00E+00
	18	19	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.17E-05	-	2.68E-06	0.00E+00	1.37E-04	-	2.68E-06	0.00E+00	1.37E-04	0.00E+00	2.68E-06	0.00E+00	1.26E-04	0.00E+00
	19	20	0.00E+00	4.22E-06	3.75E-05	-	0.00E+00	4.22E-06	3.75E-05	-	0.00E+00	4.22E-06	3.45E-05	-	2.68E-06	0.00E+00	1.37E-04	-	2.68E-06	0.00E+00	1.37E-04	0.00E+00	2.68E-06	0.00E+00	1.26E-04	0.00E+00
	20	21	0.00E+00	2.11E-06	1.87E-05	-	0.00E+00	2.11E-06	1.87E-05	-	0.00E+00	2.11E-06	1.72E-05	-	2.68E-06	0.00E+00	1.37E-04	-	2.68E-06	0.00E+00	1.37E-04	0.00E+00	2.68E-06	0.00E+00	1.26E-04	0.00E+00
	21	22	0.00E+00	2.11E-06	1.87E-05	-	0.00E+00	2.11E-06	1.87E-05	-	0.00E+00	2.11E-06	1.72E-05	-	2.24E-06	0.00E+00	1.14E-04	-	2.24E-06	0.00E+00	1.14E-04	0.00E+00	2.24E-06	0.00E+00	1.05E-04	0.00E+00
	22	23	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.79E-06	0.00E+00	9.11E-05	-	1.79E-06	0.00E+00	9.11E-05	0.00E+00	1.79E-06	0.00E+00	8.38E-05	0.00E+00
	23	0	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.79E-06	0.00E+00	9.11E-05	-	1.79E-06	0.00E+00	9.11E-05	0.00E+00	1.79E-06	0.00E+00	8.38E-05	0.00E+00
	0	1	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.79E-06	0.00E+00	9.11E-05	-	1.79E-06	0.00E+00	9.11E-05	0.00E+00	1.79E-06	0.00E+00	8.38E-05	0.00E+00
	1	2	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.34E-06	0.00E+00	6.83E-05	-	1.34E-06	0.00E+00	6.83E-05	0.00E+00	1.34E-06	0.00E+00	6.29E-05	0.00E+00
	2	3	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	8.94E-07	0.00E+00	4.55E-05	-	8.94E-07	0.00E+00	4.55E-05	0.00E+00	8.94E-07	0.00E+00	4.19E-05	0.00E+00
	3	4	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	8.94E-07	0.00E+00	4.55E-05	-	8.94E-07	0.00E+00	4.55E-05	0.00E+00	8.94E-07	0.00E+00	4.19E-05	0.00E+00
	4	5	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	8.94E-07	0.00E+00	4.55E-05	-	8.94E-07	0.00E+00	4.55E-05	0.00E+00	8.94E-07	0.00E+00	4.19E-05	0.00E+00
	5	6	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.17E-05	-	8.94E-07	3.58E-06	9.11E-05	-	8.94E-07	3.58E-06	9.11E-05	0.00E+00	8.94E-07	3.58E-06	8.38E-05	0.00E+00
	6	7	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.17E-05	-	1.34E-06	3.58E-06	1.14E-04	-	1.34E-06	3.58E-06	1.14E-04	0.00E+00	1.34E-06	3.58E-06	1.05E-04	0.00E+00
	7	8	0.00E+00	1.90E-05	1.69E-04	-	0.00E+00	1.90E-05	1.69E-04	-	0.00E+00	1.90E-05	1.55E-04	-	2.68E-06	7.15E-06	2.28E-04	-	2.68E-06	7.15E-06	2.28E-04	0.00E+00	2.68E-06	7.15E-06	2.10E-04	0.00E+00
	8	9	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.17E-05	-	2.68E-06	0.00E+00	1.37E-04	-	2.68E-06	0.00E+00	1.37E-04	0.00E+00	2.68E-06	0.00E+00	1.26E-04	0.00E+00
	9	10	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.62E-05	-	0.00E+00	6.33E-06	5.17E-05	-	2.68E-06	0.00E+00	1.37E-04	-	2.68E-06	0.00E+00	1.37E-04	0.00E+00	2.68E-06	0.00E+00	1.26E-04	0.00E+00

Note: Since there is not start emission of diesel vehicles according to Emfac-HK v4.3, soak time is not adopted for calculation.

Location: **Planned PTI at Area 99**

Routing (m)	
Bypass route	260
Running Route	260

Idling time (min)	
Bypass	0.5
Terminating	2

Dated 20200423

PTI ID	Hour		No. of Single Deck Bus																			No of Double Deck Bus																		
	Start	End	0	5	10	20	30	40	50	60	120	180	240	300	360	420	480	540	600	660	720	0	5	10	20	30	40	50	60	120	180	240	300	360	420	480	540	600	660	720
P99	10	11																				6			12															
	11	12																				4			12															
	12	13																				4			12															
	13	14																				4			12															
	14	15																				4			12															
	15	16																				6			13															
	16	17																				12			12															
	17	18																				24			15															
	18	19																				24			16															
	19	20																				24			16															
	20	21																				12			13															
	21	22																				12			12															
	22	23																				4			11															
	23	0																				4			11															
	0	1																				4			11															
	1	2																							4															
	2	3																																						
	3	4																																						
	4	5																																						
	5	6																		1		4			6															
	6	7																		1		6			12											1				
	7	8																		2		20			15											1				
	8	9																				24			15															
	9	10																				20			14															

PTI ID	Hour		Emission Rate (g/s)_FBSD												Emission Rate (g/s)_FBDD											
			TSP				RSP				FSP				TSP				RSP				FSP			
	Start	End	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Start and Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane
P99	10	11	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	2.68E-06	2.15E-05	4.44E-04	-	2.68E-06	2.15E-05	4.44E-04	0.00E+00	2.68E-06	2.15E-05	4.09E-04	0.00E+00
	11	12	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.79E-06	2.15E-05	3.95E-04	-	1.79E-06	2.15E-05	3.95E-04	0.00E+00	1.79E-06	2.15E-05	3.63E-04	0.00E+00
	12	13	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.79E-06	2.15E-05	3.95E-04	-	1.79E-06	2.15E-05	3.95E-04	0.00E+00	1.79E-06	2.15E-05	3.63E-04	0.00E+00
	13	14	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.79E-06	2.15E-05	3.95E-04	-	1.79E-06	2.15E-05	3.95E-04	0.00E+00	1.79E-06	2.15E-05	3.63E-04	0.00E+00
	14	15	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.79E-06	2.15E-05	3.95E-04	-	1.79E-06	2.15E-05	3.95E-04	0.00E+00	1.79E-06	2.15E-05	3.63E-04	0.00E+00
	15	16	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	2.68E-06	2.33E-05	4.69E-04	-	2.68E-06	2.33E-05	4.69E-04	0.00E+00	2.68E-06	2.33E-05	4.31E-04	0.00E+00
	16	17	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	5.37E-06	2.15E-05	5.92E-04	-	5.37E-06	2.15E-05	5.92E-04	0.00E+00	5.37E-06	2.15E-05	5.45E-04	0.00E+00
	17	18	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.07E-05	2.68E-05	9.62E-04	-	1.07E-05	2.68E-05	9.62E-04	0.00E+00	1.07E-05	2.68E-05	8.85E-04	0.00E+00
	18	19	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.07E-05	2.86E-05	9.87E-04	-	1.07E-05	2.86E-05	9.87E-04	0.00E+00	1.07E-05	2.86E-05	9.08E-04	0.00E+00
	19	20	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.07E-05	2.86E-05	9.87E-04	-	1.07E-05	2.86E-05	9.87E-04	0.00E+00	1.07E-05	2.86E-05	9.08E-04	0.00E+00
	20	21	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	5.37E-06	2.33E-05	6.17E-04	-	5.37E-06	2.33E-05	6.17E-04	0.00E+00	5.37E-06	2.33E-05	5.67E-04	0.00E+00
	21	22	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	5.37E-06	2.15E-05	5.92E-04	-	5.37E-06	2.15E-05	5.92E-04	0.00E+00	5.37E-06	2.15E-05	5.45E-04	0.00E+00
	22	23	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.79E-06	1.97E-05	3.70E-04	-	1.79E-06	1.97E-05	3.70E-04	0.00E+00	1.79E-06	1.97E-05	3.40E-04	0.00E+00
	23	0	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.79E-06	1.97E-05	3.70E-04	-	1.79E-06	1.97E-05	3.70E-04	0.00E+00	1.79E-06	1.97E-05	3.40E-04	0.00E+00
	0	1	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.79E-06	1.97E-05	3.70E-04	-	1.79E-06	1.97E-05	3.70E-04	0.00E+00	1.79E-06	1.97E-05	3.40E-04	0.00E+00
	1	2	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	7.15E-06	9.87E-05	-	0.00E+00	7.15E-06	9.87E-05	0.00E+00	0.00E+00	7.15E-06	9.08E-05	0.00E+00
	2	3	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
	3	4	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
	4	5	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
	5	6	0.00E+00	2.11E-06	2.03E-05	-	0.00E+00	2.11E-06	2.03E-05	-	0.00E+00	2.11E-06	1.87E-05	-	1.79E-06	1.07E-05	2.47E-04	-	1.79E-06	1.07E-05	2.47E-04	0.00E+00	1.79E-06	1.07E-05	2.27E-04	0.00E+00
	6	7	0.00E+00	2.11E-06	2.03E-05	-	0.00E+00	2.11E-06	2.03E-05	-	0.00E+00	2.11E-06	1.87E-05	-	2.68E-06	2.33E-05	4.69E-04	-	2.68E-06	2.33E-05	4.69E-04	0.00E+00	2.68E-06	2.33E-05	4.31E-04	0.00E+00
	7	8	0.00E+00	4.22E-06	4.06E-05	-	0.00E+00	4.22E-06	4.06E-05	-	0.00E+00	4.22E-06	3.74E-05	-	8.94E-06	2.86E-05	8.88E-04	-	8.94E-06	2.86E-05	8.88E-04	0.00E+00	8.94E-06	2.86E-05	8.17E-04	0.00E+00
	8	9	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	1.07E-05	2.68E-05	9.62E-04	-	1.07E-05	2.68E-05	9.62E-04	0.00E+00	1.07E-05	2.68E-05	8.85E-04	0.00E+00
	9	10	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	8.94E-06	2.50E-05	8.39E-04	-	8.94E-06	2.50E-05	8.39E-04	0.00E+00	8.94E-06	2.50E-05	7.72E-04	0.00E+00

Note: Since there is not start emission of diesel vehicles according to Emfac-HK v4.3, soak time is not adopted for calculation.

Location: **Tung Chung Town Centre Bus Terminus**

Routing (m)	
Bypass route	340
Running Route	340

Idling time (min)	
Bypass	0.5
Terminating	2

Dated 20200423

PTI ID	Hour		No. of Single Deck Bus																			No of Double Deck Bus																		
	Start	End	0	5	10	20	30	40	50	60	120	180	240	300	360	420	480	540	600	660	720	0	5	10	20	30	40	50	60	120	180	240	300	360	420	480	540	600	660	720
CBT	10	11	4			4																49			31															
	11	12	4			4																49			34															
	12	13	4			4																49			32															
	13	14	4			3																50			35															
	14	15	4			4																51			32															
	15	16	8			3																50			33															
	16	17	8			3																50			47															
	17	18	9			3																52			48															
	18	19	9			3																54			48															
	19	20	6			3																52			43															
	20	21	5			3																50			32															
	21	22	4			2																48			33															
	22	23	5			2																49			32															
	23	0	5			1																47			23															
	0	1	3			2																19			18															
	1	2	1			1																7			6															
	2	3																				2			2															
	3	4	1																			2			2															
	4	5	2																			2			2															
	5	6	1																	4		18			14											3				
	6	7	5			2														4		47			33											3				
	7	8	21			4														9		58			50											6				
	8	9	15			4																61			49															
	9	10	5			3																50			45															

PTI ID	Hour		Emission Rate (g/s)_FBSD												Emission Rate (g/s)_FBDD											
			TSP				RSP				FSP				TSP				RSP				FSP			
	Start	End	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Start and Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane	Idling (Bypass)	Idling (Terminating)	Running within PTI	Run on Circulating Lane
CBT	10	11	2.11E-06	8.44E-06	2.12E-04	-	2.11E-06	8.44E-06	2.12E-04	-	2.11E-06	8.44E-06	1.95E-04	-	2.19E-05	5.55E-05	2.58E-03	-	2.19E-05	5.55E-05	2.58E-03	0.00E+00	2.19E-05	5.55E-05	2.37E-03	0.00E+00
	11	12	2.11E-06	8.44E-06	2.12E-04	-	2.11E-06	8.44E-06	2.12E-04	-	2.11E-06	8.44E-06	1.95E-04	-	2.19E-05	6.08E-05	2.68E-03	-	2.19E-05	6.08E-05	2.68E-03	0.00E+00	2.19E-05	6.08E-05	2.46E-03	0.00E+00
	12	13	2.11E-06	8.44E-06	2.12E-04	-	2.11E-06	8.44E-06	2.12E-04	-	2.11E-06	8.44E-06	1.95E-04	-	2.19E-05	5.72E-05	2.61E-03	-	2.19E-05	5.72E-05	2.61E-03	0.00E+00	2.19E-05	5.72E-05	2.40E-03	0.00E+00
	13	14	2.11E-06	6.33E-06	1.86E-04	-	2.11E-06	6.33E-06	1.86E-04	-	2.11E-06	6.33E-06	1.71E-04	-	2.24E-05	6.26E-05	2.74E-03	-	2.24E-05	6.26E-05	2.74E-03	0.00E+00	2.24E-05	6.26E-05	2.52E-03	0.00E+00
	14	15	2.11E-06	8.44E-06	2.12E-04	-	2.11E-06	8.44E-06	2.12E-04	-	2.11E-06	8.44E-06	1.95E-04	-	2.28E-05	5.72E-05	2.68E-03	-	2.28E-05	5.72E-05	2.68E-03	0.00E+00	2.28E-05	5.72E-05	2.46E-03	0.00E+00
	15	16	4.22E-06	6.33E-06	2.92E-04	-	4.22E-06	6.33E-06	2.92E-04	-	4.22E-06	6.33E-06	2.69E-04	-	2.24E-05	5.90E-05	2.68E-03	-	2.24E-05	5.90E-05	2.68E-03	0.00E+00	2.24E-05	5.90E-05	2.46E-03	0.00E+00
	16	17	4.22E-06	6.33E-06	2.92E-04	-	4.22E-06	6.33E-06	2.92E-04	-	4.22E-06	6.33E-06	2.69E-04	-	2.24E-05	8.41E-05	3.13E-03	-	2.24E-05	8.41E-05	3.13E-03	0.00E+00	2.24E-05	8.41E-05	2.88E-03	0.00E+00
	17	18	4.75E-06	6.33E-06	3.19E-04	-	4.75E-06	6.33E-06	3.19E-04	-	4.75E-06	6.33E-06	2.93E-04	-	2.33E-05	8.59E-05	3.23E-03	-	2.33E-05	8.59E-05	3.23E-03	0.00E+00	2.33E-05	8.59E-05	2.97E-03	0.00E+00
	18	19	4.75E-06	6.33E-06	3.19E-04	-	4.75E-06	6.33E-06	3.19E-04	-	4.75E-06	6.33E-06	2.93E-04	-	2.41E-05	8.59E-05	3.29E-03	-	2.41E-05	8.59E-05	3.29E-03	0.00E+00	2.41E-05	8.59E-05	3.03E-03	0.00E+00
	19	20	3.17E-06	6.33E-06	2.39E-04	-	3.17E-06	6.33E-06	2.39E-04	-	3.17E-06	6.33E-06	2.20E-04	-	2.33E-05	7.69E-05	3.06E-03	-	2.33E-05	7.69E-05	3.06E-03	0.00E+00	2.33E-05	7.69E-05	2.82E-03	0.00E+00
	20	21	2.64E-06	6.33E-06	2.12E-04	-	2.64E-06	6.33E-06	2.12E-04	-	2.64E-06	6.33E-06	1.95E-04	-	2.24E-05	5.72E-05	2.65E-03	-	2.24E-05	5.72E-05	2.65E-03	0.00E+00	2.24E-05	5.72E-05	2.43E-03	0.00E+00
	21	22	2.11E-06	4.22E-06	1.59E-04	-	2.11E-06	4.22E-06	1.59E-04	-	2.11E-06	4.22E-06	1.47E-04	-	2.15E-05	5.90E-05	2.61E-03	-	2.15E-05	5.90E-05	2.61E-03	0.00E+00	2.15E-05	5.90E-05	2.40E-03	0.00E+00
	22	23	2.64E-06	4.22E-06	1.86E-04	-	2.64E-06	4.22E-06	1.86E-04	-	2.64E-06	4.22E-06	1.71E-04	-	2.19E-05	5.72E-05	2.61E-03	-	2.19E-05	5.72E-05	2.61E-03	0.00E+00	2.19E-05	5.72E-05	2.40E-03	0.00E+00
	23	0	2.64E-06	2.11E-06	1.59E-04	-	2.64E-06	2.11E-06	1.59E-04	-	2.64E-06	2.11E-06	1.47E-04	-	2.10E-05	4.11E-05	2.26E-03	-	2.10E-05	4.11E-05	2.26E-03	0.00E+00	2.10E-05	4.11E-05	2.08E-03	0.00E+00
	0	1	1.58E-06	4.22E-06	1.33E-04	-	1.58E-06	4.22E-06	1.33E-04	-	1.58E-06	4.22E-06	1.22E-04	-	8.50E-06	3.22E-05	1.19E-03	-	8.50E-06	3.22E-05	1.19E-03	0.00E+00	8.50E-06	3.22E-05	1.10E-03	0.00E+00
	1	2	5.28E-07	2.11E-06	5.31E-05	-	5.28E-07	2.11E-06	5.31E-05	-	5.28E-07	2.11E-06	4.88E-05	-	3.13E-06	1.07E-05	4.19E-04	-	3.13E-06	1.07E-05	4.19E-04	0.00E+00	3.13E-06	1.07E-05	3.86E-04	0.00E+00
	2	3	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	0.00E+00	0.00E+00	0.00E+00	-	8.94E-07	3.58E-06	1.29E-04	-	8.94E-07	3.58E-06	1.29E-04	0.00E+00	8.94E-07	3.58E-06	1.19E-04	0.00E+00
	3	4	5.28E-07	0.00E+00	2.65E-05	-	5.28E-07	0.00E+00	2.65E-05	-	5.28E-07	0.00E+00	2.44E-05	-	8.94E-07	3.58E-06	1.29E-04	-	8.94E-07	3.58E-06	1.29E-04	0.00E+00	8.94E-07	3.58E-06	1.19E-04	0.00E+00
	4	5	1.06E-06	0.00E+00	5.31E-05	-	1.06E-06	0.00E+00	5.31E-05	-	1.06E-06	0.00E+00	4.88E-05	-	8.94E-07	3.58E-06	1.29E-04	-	8.94E-07	3.58E-06	1.29E-04	0.00E+00	8.94E-07	3.58E-06	1.19E-04	0.00E+00
	5	6	5.28E-07	8.44E-06	1.33E-04	-	5.28E-07	8.44E-06	1.33E-04	-	5.28E-07	8.44E-06	1.22E-04	-	8.05E-06	3.04E-05	1.13E-03	-	8.05E-06	3.04E-05	1.13E-03	0.00E+00	8.05E-06	3.04E-05	1.04E-03	0.00E+00
	6	7	2.64E-06	1.27E-05	2.92E-04	-	2.64E-06	1.27E-05	2.92E-04	-	2.64E-06	1.27E-05	2.69E-04	-	2.10E-05	6.44E-05	2.68E-03	-	2.10E-05	6.44E-05	2.68E-03	0.00E+00	2.10E-05	6.44E-05	2.46E-03	0.00E+00
	7	8	1.11E-05	2.74E-05	9.03E-04	-	1.11E-05	2.74E-05	9.03E-04	-	1.11E-05	2.74E-05	8.30E-04	-	2.59E-05	1.00E-04	3.68E-03	-	2.59E-05	1.00E-04	3.68E-03	0.00E+00	2.59E-05	1.00E-04	3.38E-03	0.00E+00
	8	9	7.92E-06	8.44E-06	5.04E-04	-	7.92E-06	8.44E-06	5.04E-04	-	7.92E-06	8.44E-06	4.64E-04	-	2.73E-05	8.76E-05	3.55E-03	-	2.73E-05	8.76E-05	3.55E-03	0.00E+00	2.73E-05	8.76E-05	3.27E-03	0.00E+00
	9	10	2.64E-06	6.33E-06	2.12E-04	-	2.64E-06	6.33E-06	2.12E-04	-	2.64E-06	6.33E-06	1.95E-04	-	2.24E-05	8.05E-05	3.06E-03	-	2.24E-05	8.05E-05	3.06E-03	0.00E+00	2.24E-05	8.05E-05	2.82E-03	0.00E+00

Note: Since there is not start emission of diesel vehicles according to Emfac-HK v4.3, soak time is not adopted for calculation.

Emission Inventory for PTIs (TSP - Outside PTI)

Enclosure ID	Route	Source ID	Type	X	Y	Base Elevation	Release Height [1]	x dim.	y dim.	Rotation angle	Initial Vertical Dim [2]	Precentage of Routing	Hourly Emission Rate (g/s or g/s/sq. m)																							Total Area (sq. m)	Length Ratio
				(m)	(m)	(m)	(m)	(m)	(m)	(o)	(m)	%	Hr 00	Hr 01	Hr 02	Hr 03	Hr 04	Hr 05	Hr 06	Hr 07	Hr 08	Hr 09	Hr 10	Hr 11	Hr 12	Hr 13	Hr 14	Hr 15	Hr 16	Hr 17	Hr 18	Hr 19	Hr 20	Hr 21	Hr 22	Hr 23		
YTE	Circulating	YTE_C1_50	AREA	811458	815937	0.0	3.8	19.5	17.3	3.3	3.57	100%	1.76E-07	2.75E-08	2.75E-08	2.75E-08	2.75E-08	2.75E-07	5.45E-07	7.14E-07	5.82E-07	4.63E-07	4.49E-07	4.49E-07	4.63E-07	4.63E-07	4.63E-07	4.85E-07	4.85E-07	4.99E-07	4.99E-07	4.74E-07	4.49E-07	4.49E-07	4.63E-07	4.35E-07	337	27%
		YTE_C1_51	AREA	811478	815936	0.0	3.8	9.6	32.8	184.2	3.57	100%	3.18E-07	4.96E-08	4.96E-08	4.96E-08	4.96E-08	4.96E-07	9.82E-07	1.29E-06	1.05E-06	8.34E-07	8.09E-07	8.09E-07	8.34E-07	8.34E-07	8.34E-07	8.75E-07	8.75E-07	8.99E-07	8.99E-07	8.54E-07	8.09E-07	8.09E-07	8.34E-07	7.84E-07	315	46%
		YTE_C1_52	AREA	811475	815903	0.0	3.8	19.5	17.2	183.3	3.57	100%	1.77E-07	2.77E-08	2.77E-08	2.77E-08	2.77E-08	2.77E-07	5.48E-07	7.18E-07	5.85E-07	4.65E-07	4.52E-07	4.52E-07	4.65E-07	4.65E-07	4.65E-07	4.88E-07	4.88E-07	5.02E-07	5.02E-07	4.77E-07	4.52E-07	4.52E-07	4.65E-07	4.38E-07	335	27%

Note:

1. According to Appendix J of "Transportation Conformity Guidance for Quantitative Hot-spot Analyses in PM2.5 and PM10 Nonattainment and Maintenance Areas" issued by USEPA in Nov 2015, release height = 0.5 x 1.7 x vehicle height. Vehicle heights of FBDD is 4.6m and FBSD is 3.5m. Vehicle heights adopted weight average of the proportion of daily FBSD and FBDD.

2. According to Appendix J of "Transportation Conformity Guidance for Quantitative Hot-spot Analyses in PM2.5 and PM10 Nonattainment and Maintenance Areas" issued by USEPA in Nov 2015, initial vertical dimension = 1.7 x vehicle height/ 2.15. Vehicle heights of FBDD is 4.6m and FBSD is 3.5m. Vehicle heights adopted weight average of the proportion of daily FBSD and FBDD.

Emission Inventory for PTIs (RSP - Outside PTI)

Enclosure ID	Route	Source ID	Type	X	Y	Base Elevation	Release Height [1]	x dim.	y dim.	Rotation angle	Initial Vertical Dim [2]	Precentage of Routing	Hourly Emission Rate (g/s or g/s/sq. m)																							Total Area (sq. m)	Length Ratio
				(m)	(m)	(m)	(m)	(m)	(m)	(o)	(m)	%	Hr 00	Hr 01	Hr 02	Hr 03	Hr 04	Hr 05	Hr 06	Hr 07	Hr 08	Hr 09	Hr 10	Hr 11	Hr 12	Hr 13	Hr 14	Hr 15	Hr 16	Hr 17	Hr 18	Hr 19	Hr 20	Hr 21	Hr 22	Hr 23		
YTE	Circulating	YTE_C1_50	AREA	811458	815937	0.0	3.8	19.5	17.3	3.3	3.57	100%	1.76E-07	2.75E-08	2.75E-08	2.75E-08	2.75E-08	2.75E-07	5.45E-07	7.14E-07	5.82E-07	4.63E-07	4.49E-07	4.49E-07	4.63E-07	4.63E-07	4.63E-07	4.85E-07	4.85E-07	4.99E-07	4.99E-07	4.74E-07	4.49E-07	4.49E-07	4.63E-07	4.35E-07	337	27%
		YTE_C1_51	AREA	811478	815936	0.0	3.8	9.6	32.8	184.2	3.57	100%	3.18E-07	4.96E-08	4.96E-08	4.96E-08	4.96E-08	4.96E-07	9.82E-07	1.29E-06	1.05E-06	8.34E-07	8.09E-07	8.09E-07	8.34E-07	8.34E-07	8.34E-07	8.75E-07	8.75E-07	8.99E-07	8.99E-07	8.54E-07	8.09E-07	8.09E-07	8.34E-07	7.84E-07	315	46%
		YTE_C1_52	AREA	811475	815903	0.0	3.8	19.5	17.2	183.3	3.57	100%	1.77E-07	2.77E-08	2.77E-08	2.77E-08	2.77E-08	2.77E-07	5.48E-07	7.18E-07	5.85E-07	4.65E-07	4.52E-07	4.52E-07	4.65E-07	4.65E-07	4.65E-07	4.88E-07	4.88E-07	5.02E-07	5.02E-07	4.77E-07	4.52E-07	4.52E-07	4.65E-07	4.38E-07	335	27%

Note:

1. According to Appendix J of "Transportation Conformity Guidance for Quantitative Hot-spot Analyses in PM2.5 and PM10 Nonattainment and Maintenance Areas" issued by USEPA in Nov 2015, release height = 0.5 x 1.7 x vehicle height. Vehicle heights of FBDD is 4.6m and FBSD is 3.5m. Vehicle heights adopted weight average of the proportion of daily FBSD and FBDD.

2. According to Appendix J of "Transportation Conformity Guidance for Quantitative Hot-spot Analyses in PM2.5 and PM10 Nonattainment and Maintenance Areas" issued by USEPA in Nov 2015, initial vertical dimension = 1.7 x vehicle height/ 2.15. Vehicle heights of FBDD is 4.6m and FBSD is 3.5m. Vehicle heights adopted weight average of the proportion of daily FBSD and FBDD.

Emission Inventory for PTIs (FSP - Outside PTI)

Enclosure ID	Route	Source ID	Type	X	Y	Base Elevation	Release Height [1]	x dim.	y dim.	Rotation angle	Initial Vertical Dim [2]	Precentage of Routing	Hourly Emission Rate (g/s or g/s/sq. m)																							Total Area (sq. m)	Length Ratio
				(m)	(m)	(m)	(m)	(m)	(m)	(o)	(m)	%	Hr 00	Hr 01	Hr 02	Hr 03	Hr 04	Hr 05	Hr 06	Hr 07	Hr 08	Hr 09	Hr 10	Hr 11	Hr 12	Hr 13	Hr 14	Hr 15	Hr 16	Hr 17	Hr 18	Hr 19	Hr 20	Hr 21	Hr 22	Hr 23		
YTE	Circulating	YTE_C1_50	AREA	811458	815937	0.0	3.8	19.5	17.3	3.3	3.57	100%	1.62E-07	2.53E-08	2.53E-08	2.53E-08	2.53E-08	2.53E-07	5.02E-07	6.57E-07	5.35E-07	4.26E-07	4.13E-07	4.13E-07	4.26E-07	4.26E-07	4.26E-07	4.46E-07	4.46E-07	4.59E-07	4.59E-07	4.36E-07	4.13E-07	4.13E-07	4.26E-07	4.00E-07	337	27%
		YTE_C1_51	AREA	811478	815936	0.0	3.8	9.6	32.8	184.2	3.57	100%	2.92E-07	4.56E-08	4.56E-08	4.56E-08	4.56E-08	4.56E-07	9.04E-07	1.18E-06	9.64E-07	7.67E-07	7.44E-07	7.44E-07	7.67E-07	7.67E-07	7.67E-07	8.05E-07	8.05E-07	8.27E-07	8.27E-07	7.86E-07	7.44E-07	7.44E-07	7.67E-07	7.21E-07	315	46%
		YTE_C1_52	AREA	811475	815903	0.0	3.8	19.5	17.2	183.3	3.57	100%	1.63E-07	2.55E-08	2.55E-08	2.55E-08	2.55E-08	2.55E-07	5.04E-07	6.61E-07	5.38E-07	4.28E-07	4.15E-07	4.15E-07	4.28E-07	4.28E-07	4.28E-07	4.49E-07	4.49E-07	4.62E-07	4.62E-07	4.39E-07	4.15E-07	4.15E-07	4.28E-07	4.03E-07	335	27%

Note:

1. According to Appendix J of "Transportation Conformity Guidance for Quantitative Hot-spot Analyses in PM2.5 and PM10 Nonattainment and Maintenance Areas" issued by USEPA in Nov 2015, release height = 0.5 x 1.7 x vehicle height. Vehicle heights of FBDD is 4.6m and FBSD is 3.5m. Vehicle heights adopted weight average of the proportion of daily FBSD and FBDD.

2. According to Appendix J of "Transportation Conformity Guidance for Quantitative Hot-spot Analyses in PM2.5 and PM10 Nonattainment and Maintenance Areas" issued by USEPA in Nov 2015, initial vertical dimension = 1.7 x vehicle height/ 2.15. Vehicle heights of FBDD is 4.6m and FBSD is 3.5m. Vehicle heights adopted weight average of the proportion of daily FBSD and FBDD.

Emission Inventory for PTIs (TSP - Within PTI)

PTI ID	Description	Source ID	Type	X	Y	Base Elevation	Release Height	x dim.	y dim.	Rotation angle	Exit Temperature	Exit Velocity	Stack Diameter	Hourly Emission Rate (g/s or g/s/sq. m)																							Source Area (sq. m)	Total Emission Area of PTI (sq. m)
				(m)	(m)	(m)	(m)	(m)	(m)	(o)	(K)	(m/s)	(m)	Hr 00	Hr 01	Hr 02	Hr 03	Hr 04	Hr 05	Hr 06	Hr 07	Hr 08	Hr 09	Hr 10	Hr 11	Hr 12	Hr 13	Hr 14	Hr 15	Hr 16	Hr 17	Hr 18	Hr 19	Hr 20	Hr 21	Hr 22	Hr 23		
YTE	**Yat Tung Estate**	YTE_LL_01	AREA	811402	815961	0.0	0.0	13.0	2.0	94.6	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	26	1070
		YTE_LL_02	AREA	811397	815899	0.0	0.0	2.0	44.6	4.6	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	89	1070
		YTE_LL_03	AREA	811397	815899	0.0	0.0	16.3	2.0	49.0	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	33	1070
		YTE_LL_04	AREA	811424	815887	0.0	0.0	2.0	27.9	94.9	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	56	1070
		YTE_LL_05	AREA	811458	815959	0.0	0.0	76.5	2.0	94.4	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	153	1070
		YTE_LL_06	AREA	811402	815961	0.0	2.0	13.0	2.0	94.6	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	26	1070
		YTE_LL_07	AREA	811397	815899	0.0	2.0	2.0	44.6	4.6	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	89	1070
		YTE_LL_08	AREA	811397	815899	0.0	2.0	16.3	2.0	49.0	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	33	1070
		YTE_LL_09	AREA	811424	815887	0.0	2.0	2.0	27.9	94.9	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	56	1070
		YTE_LL_10	AREA	811458	815959	0.0	2.0	76.5	2.0	94.4	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	153	1070
		YTE_LL_11	AREA	811402	815961	0.0	4.0	13.0	2.0	94.6	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	26	1070
		YTE_LL_12	AREA	811397	815899	0.0	4.0	2.0	44.6	4.6	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	89	1070
		YTE_LL_13	AREA	811397	815899	0.0	4.0	16.3	2.0	49.0	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	33	1070
		YTE_LL_14	AREA	811424	815887	0.0	4.0	2.0	27.9	94.9	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	56	1070
		YTE_LL_15	AREA	811458	815959	0.0	4.0	76.5	2.0	94.4	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	153	1070
P113	**Planned PTI at Area 113**	P113_PTI401	AREA	813960	817846	0.0	0.0	7.3	2.0	88.5	-	-	-	1.77E-05	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.84E-05	2.72E-05	5.11E-05	5.00E-05	4.46E-05	2.75E-05	2.57E-05	2.48E-05	2.57E-05	2.48E-05	2.57E-05	3.11E-05	4.73E-05	5.00E-05	4.73E-05	3.38E-05	3.21E-05	2.13E-05	2.13E-05	15	44
		P113_PTI402	AREA	813960	817846	0.0	2.0	7.3	2.0	88.5	-	-	-	1.77E-05	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.84E-05	2.72E-05	5.11E-05	5.00E-05	4.46E-05	2.75E-05	2.57E-05	2.48E-05	2.57E-05	2.48E-05	2.57E-05	3.11E-05	4.73E-05	5.00E-05	4.73E-05	3.38E-05	3.21E-05	2.13E-05	2.13E-05	15	44
		P113_PTI403	AREA	813960	817846	0.0	4.0	7.3	2.0	88.5	-	-	-	1.77E-05	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.84E-05	2.72E-05	5.11E-05	5.00E-05	4.46E-05	2.75E-05	2.57E-05	2.48E-05	2.57E-05	2.48E-05	2.57E-05	3.11E-05	4.73E-05	5.00E-05	4.73E-05	3.38E-05	3.21E-05	2.13E-05	2.13E-05	15	44
P38	**Planned PTI**	P38_LL_01	AREA	811187	815657	0.0	0.0	82.4	33.3	161.7	-	-	-	1.71E-07	6.50E-08	5.35E-08	5.35E-08	5.35E-08	1.99E-07	4.16E-07	6.88E-07	6.06E-07	5.03E-07	3.90E-07	3.84E-07	3.90E-07	3.91E-07	4.13E-07	4.33E-07	5.17E-07	5.32E-07	5.44E-07	5.14E-07	4.38E-07	4.09E-07	3.86E-07	2.96E-07	2744	2744
TBT	**Tung Chung Temporary Bus Terminus**	TBT_PTI201	AREA	811748	816878	0.0	0.0	61.8	59.5	46.0	-	-	-	2.53E-08	1.89E-08	1.26E-08	1.26E-08	1.26E-08	4.30E-08	4.93E-08	1.16E-07	5.49E-08	5.49E-08	5.36E-08	4.23E-08	4.79E-08	4.79E-08	6.06E-08	4.92E-08	5.49E-08	5.49E-08	5.49E-08	4.92E-08	4.36E-08	3.72E-08	2.53E-08	2.53E-08	3677	3677
P99	**Planned PTI at Area 99**	P99_PTI301	AREA	813125	817603	0.0	0.0	2.0	8.9	84.0	-	-	-	7.33E-06	1.98E-06	0.00E+00	0.00E+00	0.00E+00	5.27E-06	9.68E-06	1.82E-05	1.87E-05	1.63E-05	8.77E-06	7.83E-06	7.83E-06	7.83E-06	7.83E-06	9.26E-06	1.16E-05	1.87E-05	1.92E-05	1.92E-05	1.21E-05	1.16E-05	7.33E-06	7.33E-06	18	53
		P99_PTI302	AREA	813125	817603	0.0	2.0	2.0	8.9	84.0	-	-	-	7.33E-06	1.98E-06	0.00E+00	0.00E+00	0.00E+00	5.27E-06	9.68E-06	1.82E-05	1.87E-05	1.63E-05	8.77E-06	7.83E-06	7.83E-06	7.83E-06	7.83E-06	9.26E-06	1.16E-05	1.87E-05	1.92E-05	1.92E-05	1.21E-05	1.16E-05	7.33E-06	7.33E-06	18	53
		P99_PTI303	AREA	813125	817603	0.0	4.0	2.0	8.9	84.0	-	-	-	7.33E-06	1.98E-06	0.00E+00	0.00E+00	0.00E+00	5.27E-06	9.68E-06	1.82E-05	1.87E-05	1.63E-05	8.77E-06	7.83E-06	7.83E-06	7.83E-06	7.83E-06	9.26E-06	1.16E-05	1.87E-05	1.92E-05	1.92E-05	1.21E-05	1.16E-05	7.33E-06	7.33E-06	18	53
CBT	**Tung Chung Town Centre Bus Terminus**	CBT_PTI101	POINTHOR	811908	816853	0.0	8.0	-	-	-	0	3.5	2.8	2.29E-04	8.15E-05	2.23E-05	2.68E-05	3.13E-05	2.18E-04	5.12E-04	7.91E-04	6.97E-04	5.65E-04	4.80E-04	4.97E-04	4.86E-04	5.04E-04	4.97E-04	5.10E-04	5.90E-04	6.11E-04	6.22E-04	5.69E-04	4.91E-04	4.77E-04	4.81E-04	4.14E-04	-	-
		CBT_PTI102	POINTHOR	811794	816801	0.0	12.0	-	-	-	0	3.5	5.6	2.29E-04	8.15E-05	2.23E-05	2.68E-05	3.13E-05	2.18E-04	5.12E-04	7.91E-04	6.97E-04	5.65E-04	4.80E-04	4.97E-04	4.86E-04	5.04E-04	4.97E-04	5.10E-04	5.90E-04	6.11E-04	6.22E-04	5.69E-04	4.91E-04	4.77E-04	4.81E-04	4.14E-04	-	-
		CBT_PTI103	POINTHOR	811831	816833	0.0	13.0	-	-	-	0	3.5	3.9	2.29E-04	8.15E-05	2.23E-05	2.68E-05	3.13E-05	2.18E-04	5.12E-04	7.91E-04	6.97E-04	5.65E-04	4.80E-04	4.97E-04	4.86E-04	5.04E-04	4.97E-04	5.10E-04	5.90E-04	6.11E-04	6.22E-04	5.69E-04	4.91E-04	4.77E-04	4.81E-04	4.14E-04	-	-
		CBT_PTI104	POINTHOR	811837	816837	0.0	13.0	-	-	-	0	3.5	3.9	2.29E-04	8.15E-05	2.23E-05	2.68E-05	3.13E-05	2.18E-04	5.12E-04	7.91E-04	6.97E-04	5.65E-04	4.80E-04	4.97E-04	4.86E-04	5.04E-04	4.97E-04	5.10E-04	5.90E-04	6.11E-04	6.22E-04	5.69E-04	4.91E-04	4.77E-04	4.81E-04	4.14E-04	-	-
		CBT_PTI105	POINTHOR	811844	816840	0.0	13.0	-	-	-	0	3.5	2.3	2.29E-04	8.15E-05	2.23E-05	2.68E-05	3.13E-05	2.18E-04	5.12E-04	7.91E-04	6.97E-04	5.65E-04	4.80E-04	4.97E-04	4.86E-04	5.04E-04	4.97E-04	5.10E-04	5.90E-04	6.11E-04	6.22E-04	5.69E-04	4.91E-04	4.77E-04	4.81E-04	4.14E-04	-	-
		CBT_PTI106	POINTHOR	811884	816801	0.0	15.0	-	-	-	0	3.5	4.0	2.29E-04	8.15E-05	2.23E-05	2.68E-05	3.13E-05	2.18E-04	5.12E-04	7.91E-04	6.97E-04	5.65E-04	4.80E-04	4.97E-04	4.86E-04	5.04E-04	4.97E-04	5.10E-04	5.90E-04	6.11E-04	6.22E-04	5.69E-04	4.91E-04	4.77E-04	4.81E-04	4.14E-04	-	-

Note

[1] The operation parameters including coordinates, perimeters, rotation angle, exit velocity , stack diameter and exit temperature are made reference to environmental assessment of Tung Chung New Town Extension (East) - Design and Construction and Tung Chung New Town Extension (West) - Design and Construction.

Emission Inventory for PTIs (RSP - Within PTI)

PTI ID	Description	Source ID	Type	X	Y	Base Elevation	Release Height	x dim.	y dim.	Rotation angle	Exit Temperature	Exit Velocity	Stack Diameter	Hourly Emission Rate (g/s or g/s/sq. m)																							Source Area (sq. m)	Total Emission Area of PTI (sq. m)
				(m)	(m)	(m)	(m)	(m)	(m)	(o)	(K)	(m/s)	(m)	Hr 00	Hr 01	Hr 02	Hr 03	Hr 04	Hr 05	Hr 06	Hr 07	Hr 08	Hr 09	Hr 10	Hr 11	Hr 12	Hr 13	Hr 14	Hr 15	Hr 16	Hr 17	Hr 18	Hr 19	Hr 20	Hr 21	Hr 22	Hr 23		
YTE	**Yat Tung Estate**	YTE_LL_01	AREA	811402	815961	0.0	0.0	13.0	2.0	94.6	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	26	1070
		YTE_LL_02	AREA	811397	815899	0.0	0.0	2.0	44.6	4.6	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	89	1070
		YTE_LL_03	AREA	811397	815899	0.0	0.0	16.3	2.0	49.0	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	33	1070
		YTE_LL_04	AREA	811424	815887	0.0	0.0	2.0	27.9	94.9	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	56	1070
		YTE_LL_05	AREA	811458	815959	0.0	0.0	76.5	2.0	94.4	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	153	1070
		YTE_LL_06	AREA	811402	815961	0.0	2.0	13.0	2.0	94.6	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	26	1070
		YTE_LL_07	AREA	811397	815899	0.0	2.0	2.0	44.6	4.6	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	89	1070
		YTE_LL_08	AREA	811397	815899	0.0	2.0	16.3	2.0	49.0	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	33	1070
		YTE_LL_09	AREA	811424	815887	0.0	2.0	2.0	27.9	94.9	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	56	1070
		YTE_LL_10	AREA	811458	815959	0.0	2.0	76.5	2.0	94.4	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	153	1070
		YTE_LL_11	AREA	811402	815961	0.0	4.0	13.0	2.0	94.6	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	26	1070
		YTE_LL_12	AREA	811397	815899	0.0	4.0	2.0	44.6	4.6	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	89	1070
		YTE_LL_13	AREA	811397	815899	0.0	4.0	16.3	2.0	49.0	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	33	1070
		YTE_LL_14	AREA	811424	815887	0.0	4.0	2.0	27.9	94.9	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	56	1070
		YTE_LL_15	AREA	811458	815959	0.0	4.0	76.5	2.0	94.4	-	-	-	4.78E-07	7.25E-08	7.25E-08	7.25E-08	7.25E-08	7.64E-07	1.52E-06	2.09E-06	1.65E-06	1.33E-06	1.29E-06	1.27E-06	1.32E-06	1.31E-06	1.32E-06	1.38E-06	1.38E-06	1.43E-06	1.43E-06	1.37E-06	1.30E-06	1.30E-06	1.33E-06	1.24E-06	153	1070
P113	**Planned PTI at Area 113**	P113_PTI401	AREA	813960	817846	0.0	0.0	7.3	2.0	88.5	-	-	-	1.77E-05	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.84E-05	2.72E-05	5.11E-05	5.00E-05	4.46E-05	2.75E-05	2.57E-05	2.48E-05	2.57E-05	2.48E-05	2.57E-05	3.11E-05	4.73E-05	5.00E-05	4.73E-05	3.38E-05	3.21E-05	2.13E-05	2.13E-05	15	44
		P113_PTI402	AREA	813960	817846	0.0	2.0	7.3	2.0	88.5	-	-	-	1.77E-05	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.84E-05	2.72E-05	5.11E-05	5.00E-05	4.46E-05	2.75E-05	2.57E-05	2.48E-05	2.57E-05	2.48E-05	2.57E-05	3.11E-05	4.73E-05	5.00E-05	4.73E-05	3.38E-05	3.21E-05	2.13E-05	2.13E-05	15	44
		P113_PTI403	AREA	813960	817846	0.0	4.0	7.3	2.0	88.5	-	-	-	1.77E-05	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.84E-05	2.72E-05	5.11E-05	5.00E-05	4.46E-05	2.75E-05	2.57E-05	2.48E-05	2.57E-05	2.48E-05	2.57E-05	3.11E-05	4.73E-05	5.00E-05	4.73E-05	3.38E-05	3.21E-05	2.13E-05	2.13E-05	15	44
P38	**Planned PTI**	P38_LL_01	AREA	811187	815657	0.0	0.0	82.4	33.3	161.7	-	-	-	1.71E-07	6.50E-08	5.35E-08	5.35E-08	5.35E-08	1.99E-07	4.16E-07	6.88E-07	6.06E-07	5.03E-07	3.90E-07	3.84E-07	3.90E-07	3.91E-07	4.13E-07	4.33E-07	5.17E-07	5.32E-07	5.44E-07	5.14E-07	4.38E-07	4.09E-07	3.86E-07	2.96E-07	2744	2744
TBT	**Tung Chung Temporary Bus Terminus**	TBT_PTI201	AREA	811748	816878	0.0	0.0	61.8	59.5	46.0	-	-	-	2.53E-08	1.89E-08	1.26E-08	1.26E-08	1.26E-08	4.30E-08	4.93E-08	1.16E-07	5.49E-08	5.49E-08	5.36E-08	4.23E-08	4.79E-08	4.79E-08	6.06E-08	4.92E-08	5.49E-08	5.49E-08	5.49E-08	4.92E-08	4.36E-08	3.72E-08	2.53E-08	2.53E-08	3677	3677
P99	**Planned PTI at Area 99**	P99_PTI301	AREA	813125	817603	0.0	0.0	2.0	8.9	84.0	-	-	-	7.33E-06	1.98E-06	0.00E+00	0.00E+00	0.00E+00	5.27E-06	9.68E-06	1.82E-05	1.87E-05	1.63E-05	8.77E-06	7.83E-06	7.83E-06	7.83E-06	7.83E-06	9.26E-06	1.16E-05	1.87E-05	1.92E-05	1.92E-05	1.21E-05	1.16E-05	7.33E-06	7.33E-06	18	53
		P99_PTI302	AREA	813125	817603	0.0	2.0	2.0	8.9	84.0	-	-	-	7.33E-06	1.98E-06	0.00E+00	0.00E+00	0.00E+00	5.27E-06	9.68E-06	1.82E-05	1.87E-05	1.63E-05	8.77E-06	7.83E-06	7.83E-06	7.83E-06	7.83E-06	9.26E-06	1.16E-05	1.87E-05	1.92E-05	1.92E-05	1.21E-05	1.16E-05	7.33E-06	7.33E-06	18	53
		P99_PTI303	AREA	813125	817603	0.0	4.0	2.0	8.9	84.0	-	-	-	7.33E-06	1.98E-06	0.00E+00	0.00E+00	0.00E+00	5.27E-06	9.68E-06	1.82E-05	1.87E-05	1.63E-05	8.77E-06	7.83E-06	7.83E-06	7.83E-06	7.83E-06	9.26E-06	1.16E-05	1.87E-05	1.92E-05	1.92E-05	1.21E-05	1.16E-05	7.33E-06	7.33E-06	18	53
CBT	**Tung Chung Town Centre Bus Terminus**	CBT_PTI101	POINTHOR	811908	816853	0.0	8.0	-	-	-	0	3.5	2.8	2.29E-04	8.15E-05	2.23E-05	2.68E-05	3.13E-05	2.18E-04	5.12E-04	7.91E-04	6.97E-04	5.65E-04	4.80E-04	4.97E-04	4.86E-04	5.04E-04	4.97E-04	5.10E-04	5.90E-04	6.11E-04	6.22E-04	5.69E-04	4.91E-04	4.77E-04	4.81E-04	4.14E-04	-	-
		CBT_PTI102	POINTHOR	811794	816801	0.0	12.0	-	-	-	0	3.5	5.6	2.29E-04	8.15E-05	2.23E-05	2.68E-05	3.13E-05	2.18E-04	5.12E-04	7.91E-04	6.97E-04	5.65E-04	4.80E-04	4.97E-04	4.86E-04	5.04E-04	4.97E-04	5.10E-04	5.90E-04	6.11E-04	6.22E-04	5.69E-04	4.91E-04	4.77E-04	4.81E-04	4.14E-04	-	-
		CBT_PTI103	POINTHOR	811831	816833	0.0	13.0	-	-	-	0	3.5	3.9	2.29E-04	8.15E-05	2.23E-05	2.68E-05	3.13E-05	2.18E-04	5.12E-04	7.91E-04	6.97E-04	5.65E-04	4.80E-04	4.97E-04	4.86E-04	5.04E-04	4.97E-04	5.10E-04	5.90E-04	6.11E-04	6.22E-04	5.69E-04	4.91E-04	4.77E-04	4.81E-04	4.14E-04	-	-
		CBT_PTI104	POINTHOR	811837	816837	0.0	13.0	-	-	-	0	3.5	3.9	2.29E-04	8.15E-05	2.23E-05	2.68E-05	3.13E-05	2.18E-04	5.12E-04	7.91E-04	6.97E-04	5.65E-04	4.80E-04	4.97E-04	4.86E-04	5.04E-04	4.97E-04	5.10E-04	5.90E-04	6.11E-04	6.22E-04	5.69E-04	4.91E-04	4.77E-04	4.81E-04	4.14E-04	-	-
		CBT_PTI105	POINTHOR	811844	816840	0.0	13.0	-	-	-	0	3.5	2.3	2.29E-04	8.15E-05	2.23E-05	2.68E-05	3.13E-05	2.18E-04	5.12E-04	7.91E-04	6.97E-04	5.65E-04	4.80E-04	4.97E-04	4.86E-04	5.04E-04	4.97E-04	5.10E-04	5.90E-04	6.11E-04	6.22E-04	5.69E-04	4.91E-04	4.77E-04	4.81E-04	4.14E-04	-	-
		CBT_PTI106	POINTHOR	811884	816801	0.0	15.0	-	-	-	0	3.5	4.0	2.29E-04	8.15E-05	2.23E-05	2.68E-05	3.13E-05	2.18E-04	5.12E-04	7.91E-04	6.97E-04	5.65E-04	4.80E-04	4.97E-04	4.86E-04	5.04E-04	4.97E-04	5.10E-04	5.90E-04	6.11E-04	6.22E-04	5.69E-04	4.91E-04	4.77E-04	4.81E-04	4.14E-04	-	-

Source:

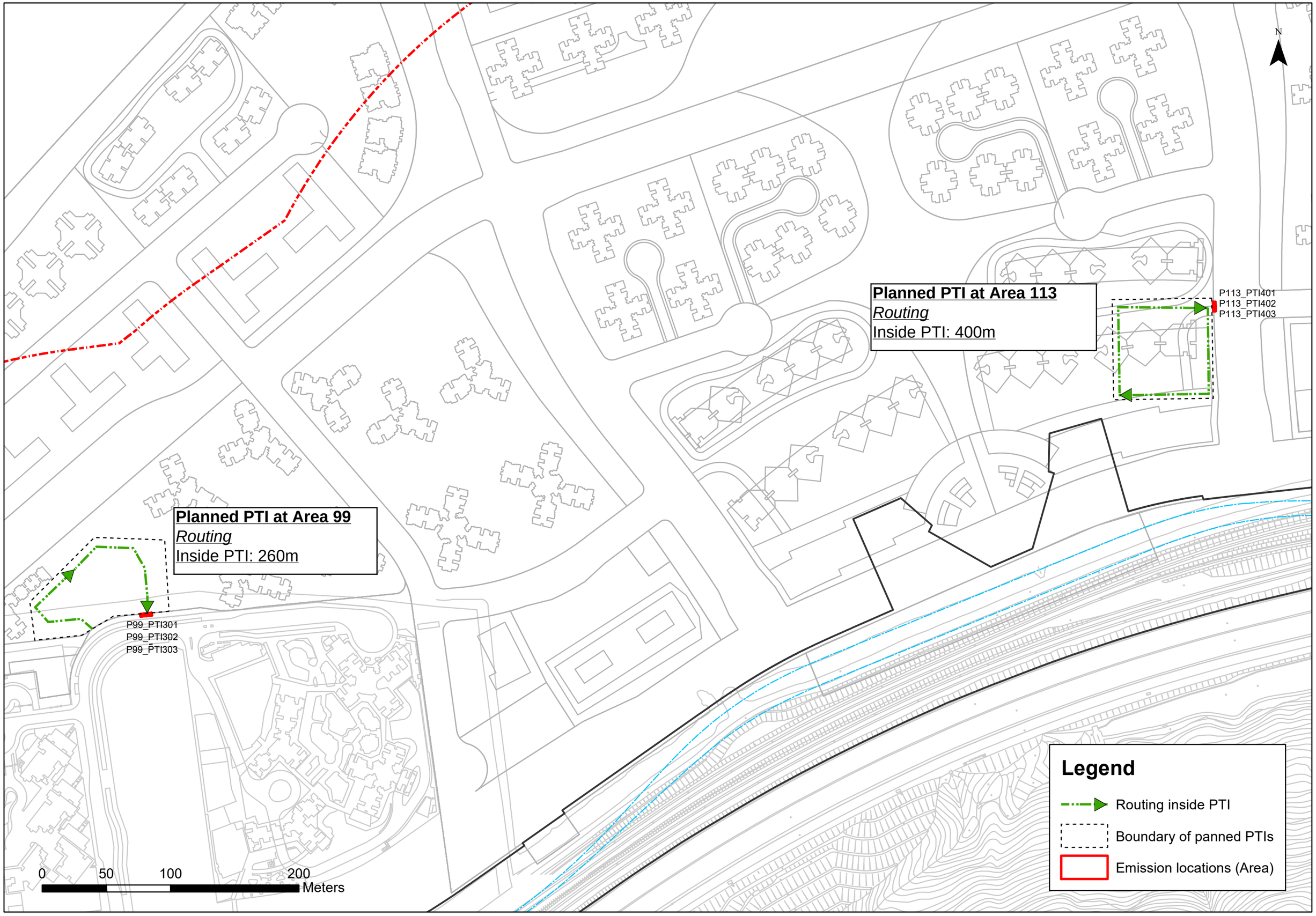
[1] The operation parameters including coordinates, perimeters, rotation angle, exit velocity , stack diameter and exit temperature are made reference to environmental assessment of Tung Chung New Town Extension (East) - Design and Construction and Tung Chung New Town Extension (West) - Design and Construction.

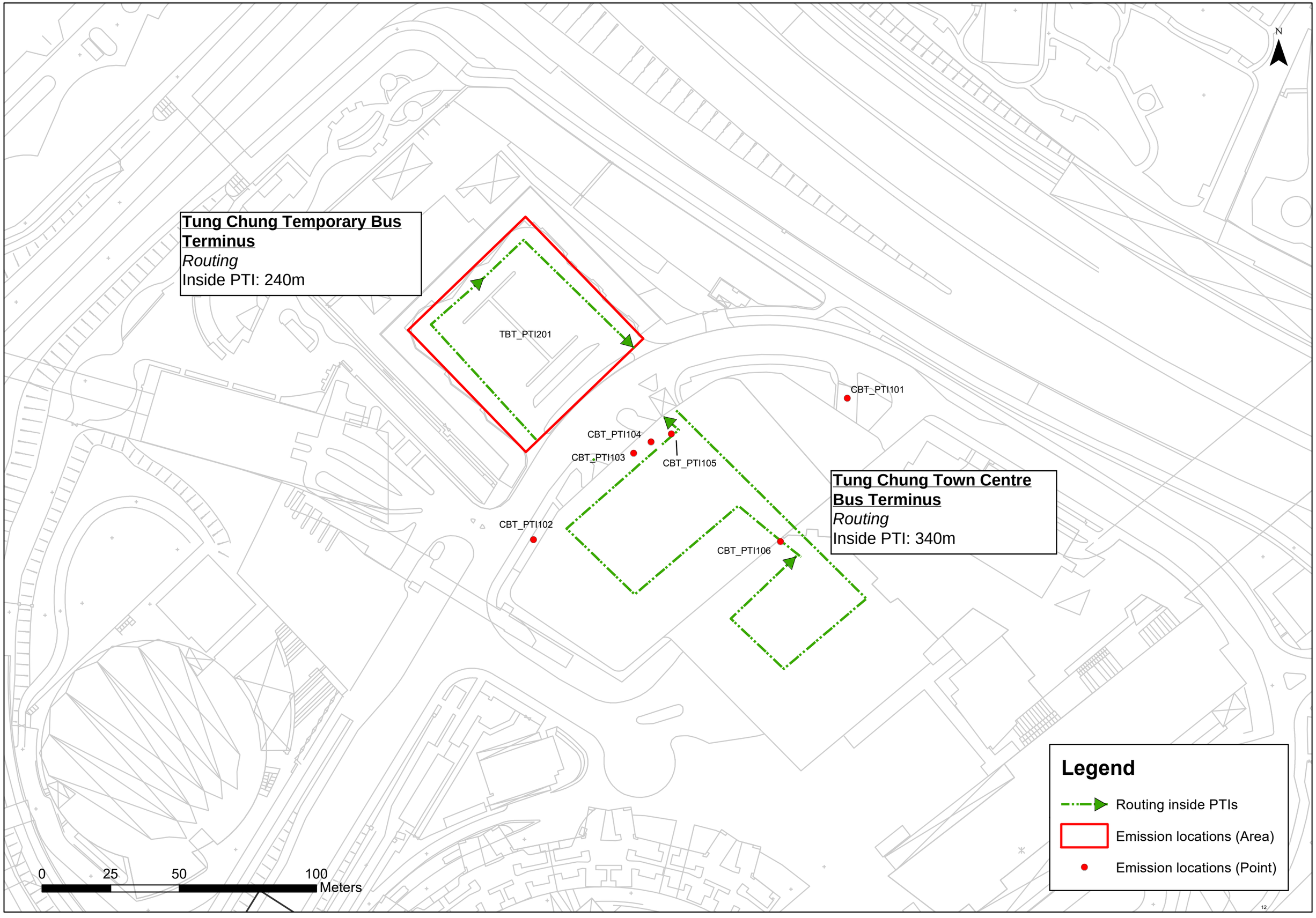
Emission Inventory for PTIs (FSP - Within PTI)

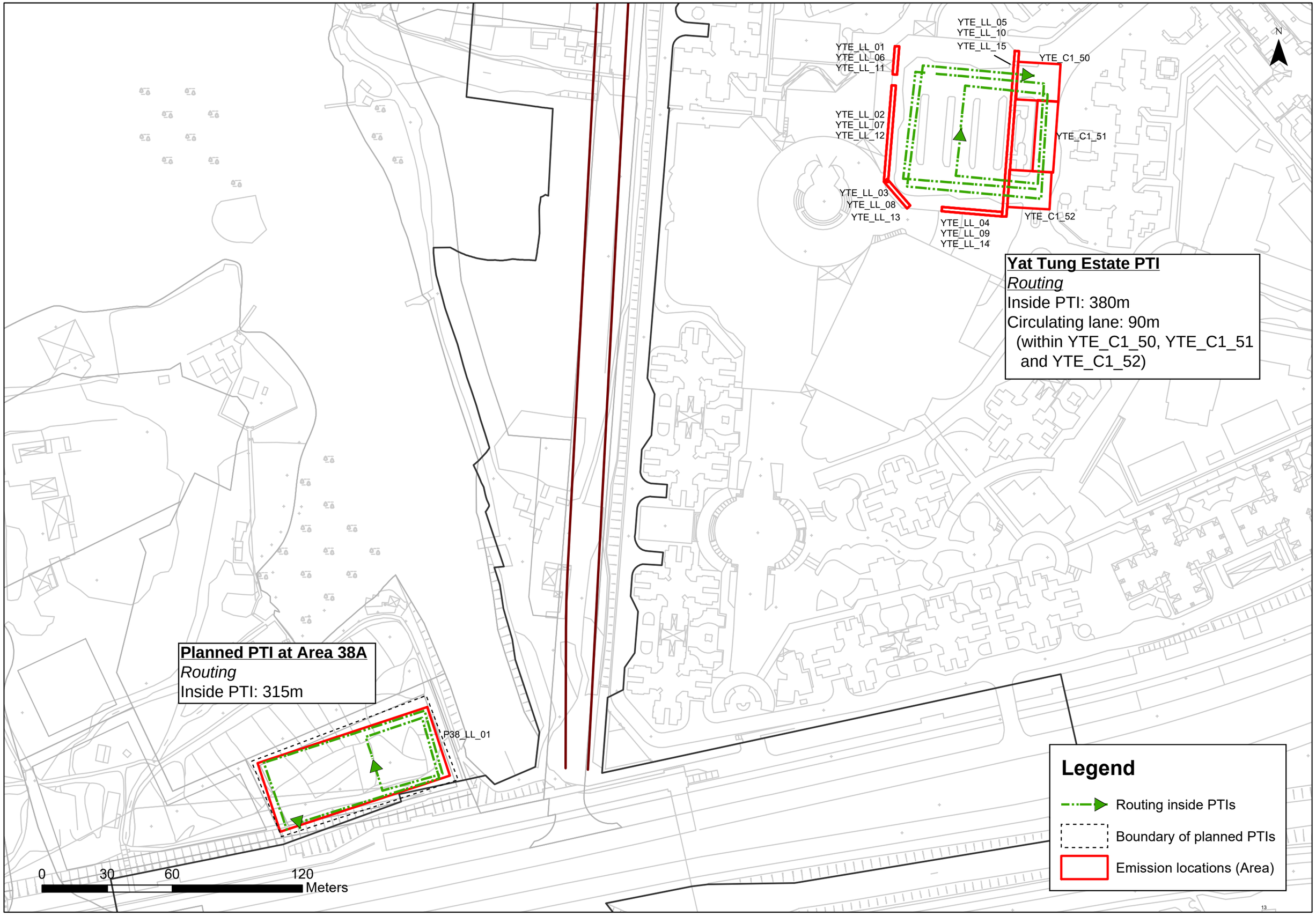
PTI ID	Description	Source ID	Type	X	Y	Base Elevation	Release Height	x dim.	y dim.	Rotation angle	Exit Temperature	Exit Velocity	Stack Diameter	Hourly Emission Rate (g/s or g/s/sq. m)																							Source Area (sq. m)	Total Emission Area of PTI (sq. m)
				(m)	(m)	(m)	(m)	(m)	(m)	(o)	(K)	(m/s)	(m)	Hr 00	Hr 01	Hr 02	Hr 03	Hr 04	Hr 05	Hr 06	Hr 07	Hr 08	Hr 09	Hr 10	Hr 11	Hr 12	Hr 13	Hr 14	Hr 15	Hr 16	Hr 17	Hr 18	Hr 19	Hr 20	Hr 21	Hr 22	Hr 23		
YTE	**Yat Tung Estate**	YTE_LL_01	AREA	811402	815961	0.0	0.0	13.0	2.0	94.6	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	26	1070
		YTE_LL_02	AREA	811397	815899	0.0	0.0	2.0	44.6	4.6	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	89	1070
		YTE_LL_03	AREA	811397	815899	0.0	0.0	16.3	2.0	49.0	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	33	1070
		YTE_LL_04	AREA	811424	815887	0.0	0.0	2.0	27.9	94.9	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	56	1070
		YTE_LL_05	AREA	811458	815959	0.0	0.0	76.5	2.0	94.4	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	153	1070
		YTE_LL_06	AREA	811402	815961	0.0	2.0	13.0	2.0	94.6	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	26	1070
		YTE_LL_07	AREA	811397	815899	0.0	2.0	2.0	44.6	4.6	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	89	1070
		YTE_LL_08	AREA	811397	815899	0.0	2.0	16.3	2.0	49.0	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	33	1070
		YTE_LL_09	AREA	811424	815887	0.0	2.0	2.0	27.9	94.9	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	56	1070
		YTE_LL_10	AREA	811458	815959	0.0	2.0	76.5	2.0	94.4	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	153	1070
		YTE_LL_11	AREA	811402	815961	0.0	4.0	13.0	2.0	94.6	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	26	1070
		YTE_LL_12	AREA	811397	815899	0.0	4.0	2.0	44.6	4.6	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	89	1070
		YTE_LL_13	AREA	811397	815899	0.0	4.0	16.3	2.0	49.0	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	33	1070
		YTE_LL_14	AREA	811424	815887	0.0	4.0	2.0	27.9	94.9	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	56	1070
		YTE_LL_15	AREA	811458	815959	0.0	4.0	76.5	2.0	94.4	-	-	-	4.42E-07	6.70E-08	6.70E-08	6.70E-08	6.70E-08	7.06E-07	1.40E-06	1.93E-06	1.52E-06	1.23E-06	1.19E-06	1.18E-06	1.22E-06	1.21E-06	1.22E-06	1.28E-06	1.28E-06	1.32E-06	1.32E-06	1.26E-06	1.20E-06	1.20E-06	1.23E-06	1.14E-06	153	1070
P113	**Planned PTI at Area 113**	P113_PTI401	AREA	813960	817846	0.0	0.0	7.3	2.0	88.5	-	-	-	1.63E-05	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.70E-05	2.51E-05	4.71E-05	4.61E-05	4.11E-05	2.54E-05	2.37E-05	2.29E-05	2.37E-05	2.29E-05	2.37E-05	2.87E-05	4.36E-05	4.61E-05	4.36E-05	3.12E-05	2.96E-05	1.96E-05	1.96E-05	15	44
		P113_PTI402	AREA	813960	817846	0.0	2.0	7.3	2.0	88.5	-	-	-	1.63E-05	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.70E-05	2.51E-05	4.71E-05	4.61E-05	4.11E-05	2.54E-05	2.37E-05	2.29E-05	2.37E-05	2.29E-05	2.37E-05	2.87E-05	4.36E-05	4.61E-05	4.36E-05	3.12E-05	2.96E-05	1.96E-05	1.96E-05	15	44
		P113_PTI403	AREA	813960	817846	0.0	4.0	7.3	2.0	88.5	-	-	-	1.63E-05	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.70E-05	2.51E-05	4.71E-05	4.61E-05	4.11E-05	2.54E-05	2.37E-05	2.29E-05	2.37E-05	2.29E-05	2.37E-05	2.87E-05	4.36E-05	4.61E-05	4.36E-05	3.12E-05	2.96E-05	1.96E-05	1.96E-05	15	44
P38	**Planned PTI**	P38_LL_01	AREA	811187	815657	0.0	0.0	82.4	33.3	161.7	-	-	-	1.58E-07	6.00E-08	4.94E-08	4.94E-08	4.94E-08	1.84E-07	3.84E-07	6.35E-07	5.59E-07	4.64E-07	3.60E-07	3.54E-07	3.60E-07	3.61E-07	3.81E-07	4.00E-07	4.77E-07	4.91E-07	5.02E-07	4.75E-07	4.05E-07	3.78E-07	3.56E-07	2.73E-07	2744	2744
TBT	**Tung Chung Temporary Bus Terminus**	TBT_PTI201	AREA	811748	816878	0.0	0.0	61.8	59.5	46.0	-	-	-	2.33E-08	1.75E-08	1.16E-08	1.16E-08	1.16E-08	3.98E-08	4.56E-08	1.07E-07	5.07E-08	5.07E-08	4.96E-08	3.91E-08	4.43E-08	4.43E-08	5.60E-08	4.54E-08	5.07E-08	5.07E-08	5.07E-08	4.54E-08	4.02E-08	3.44E-08	2.33E-08	2.33E-08	3677	3677
P99	**Planned PTI at Area 99**	P99_PTI301	AREA	813125	817603	0.0	0.0	2.0	8.9	84.0	-	-	-	6.78E-06	1.83E-06	0.00E+00	0.00E+00	0.00E+00	4.87E-06	8.95E-06	1.68E-05	1.73E-05	1.51E-05	8.10E-06	7.24E-06	7.24E-06	7.24E-06	7.24E-06	8.56E-06	1.07E-05	1.73E-05	1.77E-05	1.77E-05	1.12E-05	1.07E-05	6.78E-06	6.78E-06	18	53
		P99_PTI302	AREA	813125	817603	0.0	2.0	2.0	8.9	84.0	-	-	-	6.78E-06	1.83E-06	0.00E+00	0.00E+00	0.00E+00	4.87E-06	8.95E-06	1.68E-05	1.73E-05	1.51E-05	8.10E-06	7.24E-06	7.24E-06	7.24E-06	7.24E-06	8.56E-06	1.07E-05	1.73E-05	1.77E-05	1.77E-05	1.12E-05	1.07E-05	6.78E-06	6.78E-06	18	53
		P99_PTI303	AREA	813125	817603	0.0	4.0	2.0	8.9	84.0	-	-	-	6.78E-06	1.83E-06	0.00E+00	0.00E+00	0.00E+00	4.87E-06	8.95E-06	1.68E-05	1.73E-05	1.51E-05	8.10E-06	7.24E-06	7.24E-06	7.24E-06	7.24E-06	8.56E-06	1.07E-05	1.73E-05	1.77E-05	1.77E-05	1.12E-05	1.07E-05	6.78E-06	6.78E-06	18	53
CBT	**Tung Chung Town Centre Bus Terminus**	CBT_PTI101	POINTHOR	811908	816853	0.0	8.0	-	-	-	0	3.5	2.8	2.11E-04	7.52E-05	2.05E-05	2.47E-05	2.89E-05	2.01E-04	4.72E-04	7.30E-04	6.43E-04	5.21E-04	4.43E-04	4.59E-04	4.48E-04	4.65E-04	4.58E-04	4.71E-04	5.44E-04	5.64E-04	5.74E-04	5.25E-04	4.53E-04	4.40E-04	4.44E-04	3.82E-04	-	-
		CBT_PTI102	POINTHOR	811794	816801	0.0	12.0	-	-	-	0	3.5	5.6	2.11E-04	7.52E-05	2.05E-05	2.47E-05	2.89E-05	2.01E-04	4.72E-04	7.30E-04	6.43E-04	5.21E-04	4.43E-04	4.59E-04	4.48E-04	4.65E-04	4.58E-04	4.71E-04	5.44E-04	5.64E-04	5.74E-04	5.25E-04	4.53E-04	4.40E-04	4.44E-04	3.82E-04	-	-
		CBT_PTI103	POINTHOR	811831	816833	0.0	13.0	-	-	-	0	3.5	3.9	2.11E-04	7.52E-05	2.05E-05	2.47E-05	2.89E-05	2.01E-04	4.72E-04	7.30E-04	6.43E-04	5.21E-04	4.43E-04	4.59E-04	4.48E-04	4.65E-04	4.58E-04	4.71E-04	5.44E-04	5.64E-04	5.74E-04	5.25E-04	4.53E-04	4.40E-04	4.44E-04	3.82E-04	-	-
		CBT_PTI104	POINTHOR	811837	816837	0.0	13.0	-	-	-	0	3.5	3.9	2.11E-04	7.52E-05	2.05E-05	2.47E-05	2.89E-05	2.01E-04	4.72E-04	7.30E-04	6.43E-04	5.21E-04	4.43E-04	4.59E-04	4.48E-04	4.65E-04	4.58E-04	4.71E-04	5.44E-04	5.64E-04	5.74E-04	5.25E-04	4.53E-04	4.40E-04	4.44E-04	3.82E-04	-	-
		CBT_PTI105	POINTHOR	811844	816840	0.0	13.0	-	-	-	0	3.5	2.3	2.11E-04	7.52E-05	2.05E-05	2.47E-05	2.89E-05	2.01E-04	4.72E-04	7.30E-04	6.43E-04	5.21E-04	4.43E-04	4.59E-04	4.48E-04	4.65E-04	4.58E-04	4.71E-04	5.44E-04	5.64E-04	5.74E-04	5.25E-04	4.53E-04	4.40E-04	4.44E-04	3.82E-04	-	-
		CBT_PTI106	POINTHOR	811884	816801	0.0	15.0	-	-	-	0	3.5	4.0	2.11E-04	7.52E-05	2.05E-05	2.47E-05	2.89E-05	2.01E-04	4.72E-04	7.30E-04	6.43E-04	5.21E-04	4.43E-04	4.59E-04	4.48E-04	4.65E-04	4.58E-04	4.71E-04	5.44E-04	5.64E-04	5.74E-04	5.25E-04	4.53E-04	4.40E-04	4.44E-04	3.82E-04	-	-

Source:

[1] The operation parameters including coordinates, perimeters, rotation angle, exit velocity , stack diameter and exit temperature are made reference to environmental assessment of Tung Chung New Town Extension (East) - Design and Construction and Tung Chung New Town Extension (West) - Design and Construction.


N
Planned PTI at Area 113
Routing
Inside PTI: 400m
P113_PTI401
P113_PTI402
P113_PTI403
Planned PTI at Area 99
Routing
Inside PTI: 260m
P99_PTI301
P99_PTI302
P99_PTI303
0
50
100
200
Meters
Legend
Routing inside PTI
Boundary of panned PTIs
Emission locations (Area)


N
Tung Chung Temporary Bus Terminus
Routing
Inside PTI: 240m
TBT_PTI201
CBT_PTI101
CBT_PTI104
CBT_PTI103
CBT_PTI105
CBT_PTI102
CBT_PTI106
Tung Chung Town Centre Bus Terminus
Routing
Inside PTI: 340m
Legend
Routing inside PTIs
Emission locations (Area)
Emission locations (Point)
0
25
50
100
Meters


YTE_LL_05
YTE_LL_10
YTE_LL_15
YTE_LL_01
YTE_LL_06
YTE_LL_11
YTE_C1_50
YTE_LL_02
YTE_LL_07
YTE_LL_12
YTE_C1_51
YTE_LL_03
YTE_LL_08
YTE_LL_13
YTE_LL_04
YTE_LL_09
YTE_LL_14
YTE_C1_52
N
Yat Tung Estate PTI
Routing
Inside PTI: 380m
Circulating lane: 90m
(within YTE_C1_50, YTE_C1_51
and YTE_C1_52)
Planned PTI at Area 38A
Routing
Inside PTI: 315m
P38_LL_01
0
30
60
120
Meters
Legend
Routing inside PTIs
Boundary of planned PTIs
Emission locations (Area)

Annex 1

Idling Emission

Population of diesel vehicle (Based on Emfac 4.3)

Assessmen Year : **2023**

FirstRegYear	Age	Population of Diesel Vehicle	
		14 - Franchised Bus (SD)	15 - Franchised Bus (DD)
2023	1	5	49
2022	2	0	176
2021	3	0	190
2020	4	0	322
2019	5	0	295
2018	6	0	648
2017	7	5	678
2016	8	0	835
2015	9	28	823
2014	10	0	442
2013	11	25	440
2012	12	54	221
2011	13	49	281
2010	14	36	177
2009	15	46	47
2008	16	10	45
2007	17	8	64
2006	18	9	110
2005	19	0	0
2004	20	0	0
2003	21	0	0
2002	22	0	0
2001	23	0	0
2000	24	0	0
1999	25	0	0
1998	26	0	0
1997	27	0	0
1996	28	0	0
1995	29	0	0
1994	30	0	0
1993	31	0	0
1992	32	0	0
1991	33	0	0
1990	34	0	0
1989	35	0	0
1988	36	0	0
1987	37	0	0
1986	38	0	0
1985	39	0	0
1984	40	0	0
1983	41	0	0
1982	42	0	0
1981	43	0	0
1980	44	0	0
1979	45	0	0

Note:
Only diesel vehicles are presented

Calculations of Composite Idling Emission Factors

Estimated Engine Type Distribution

Assessment Year : **2023**

FirstRegYear	Age	Estimated engine type distribution								Estimated engine type distribution							
		FBSD								FBDD							
		Population profile	pre-Euro with DOC	Euro I	Euro II	Euro III	Euro IV	Euro V	Euro VI	Population profile	pre-Euro with DOC	Euro I	Euro II	Euro III	Euro IV	Euro V	Euro VI
2023	1	1.8%	-	-	-	-	-	-	1.82%	0.84%	-	-	-	-	-	-	0.84%
2022	2	0.0%	-	-	-	-	-	-	0.00%	3.01%	-	-	-	-	-	-	3.01%
2021	3	0.0%	-	-	-	-	-	-	0.00%	3.25%	-	-	-	-	-	-	3.25%
2020	4	0.0%	-	-	-	-	-	-	0.00%	5.51%	-	-	-	-	-	-	5.51%
2019	5	0.0%	-	-	-	-	-	-	0.00%	5.05%	-	-	-	-	-	-	5.05%
2018	6	0.0%	-	-	-	-	-	0.00%	0.00%	11.09%	-	-	-	-	-	9.41%	1.68%
2017	7	1.8%	-	-	-	-	-	-	1.82%	11.60%	-	-	-	-	-	11.59%	0.02%
2016	8	0.0%	-	-	-	-	-	0.00%	-	14.29%	-	-	-	-	-	14.29%	-
2015	9	10.2%	-	-	-	-	-	10.18%	-	14.09%	-	-	-	-	-	14.09%	-
2014	10	0.0%	-	-	-	-	-	0.00%	-	7.56%	-	-	-	-	-	7.50%	0.07%
2013	11	9.1%	-	-	-	-	-	9.09%	-	7.53%	-	-	-	-	-	7.53%	-
2012	12	19.6%	-	-	-	-	-	19.64%	-	3.78%	-	-	-	-	-	3.78%	-
2011	13	17.8%	-	-	-	-	-	17.82%	-	4.81%	-	-	-	-	0.19%	4.62%	-
2010	14	13.1%	-	-	-	-	2.91%	10.18%	-	3.03%	-	-	-	-	0.96%	2.07%	-
2009	15	16.7%	-	-	-	-	16.73%	-	-	0.80%	-	-	-	-	0.80%	-	-
2008	16	3.6%	-	-	-	-	3.64%	-	-	0.77%	-	-	-	0.38%	0.39%	-	-
2007	17	2.9%	-	-	-	1.09%	1.82%	-	-	1.10%	-	-	-	1.04%	0.05%	-	-
2006	18	3.3%	-	-	-	3.27%	-	-	-	1.88%	-	-	-	1.85%	0.02%	0.02%	-
2005	19	0.0%	-	-	-	0.00%	-	-	-	0.00%	-	-	0.00%	0.00%	-	-	-
2004	20	0.0%	-	-	-	0.00%	-	-	-	0.00%	-	-	0.00%	0.00%	-	-	-
2003	21	0.0%	-	-	-	0.00%	-	-	-	0.00%	-	-	0.00%	0.00%	-	-	-
2002	22	0.0%	-	-	0.00%	-	-	-	-	0.00%	-	-	0.00%	0.00%	-	-	-
2001	23	0.0%	-	-	0.00%	-	-	-	-	0.00%	-	-	0.00%	0.00%	-	-	-
2000	24	0.0%	-	-	0.00%	-	-	-	-	0.00%	-	-	0.00%	-	-	-	-
1999	25	0.0%	-	-	0.00%	-	-	-	-	0.00%	-	-	0.00%	-	-	-	-
1998	26	0.0%	-	-	0.00%	-	-	-	-	0.00%	-	-	0.00%	-	-	-	-
1997	27	0.0%	-	-	0.00%	-	-	-	-	0.00%	-	0.00%	0.00%	-	-	-	-
1996	28	0.0%	-	0.00%	0.00%	-	-	-	-	0.00%	-	0.00%	-	-	-	-	-
1995	29	0.0%	-	0.00%	-	-	-	-	-	0.00%	-	0.00%	-	-	-	-	-
1994	30	0.0%	-	0.00%	-	-	-	-	-	0.00%	0.00%	0.00%	-	-	-	-	-
1993	31	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	0.00%	-	-	-	-	-
1992	32	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
1991	33	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
1990	34	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
1989	35	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
1988	36	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
1987	37	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
1986	38	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
1985	39	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
1984	40	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
1983	41	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
1982	42	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
1981	43	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
1980	44	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
1979	45	0.0%	0.00%	-	-	-	-	-	-	0.00%	0.00%	-	-	-	-	-	-
	Total	**100.0%**	**0.00%**	**0.00%**	**0.00%**	**4.36%**	**25.09%**	**66.91%**	**3.64%**	**100.00%**	**0.00%**	**0.00%**	**0.00%**	**3.27%**	**2.41%**	**74.89%**	**19.42%**

Warm Idling

Summary of Engine Type Distribution (Year 2023)

Euro Standard	Estimated engine type distribution	
	FBSD	FBDD
pre-Euro	0.00%	0.00%
Euro I	0.00%	0.00%
Euro II	0.00%	0.00%
Euro III	4.36%	3.27%
Euro IV	25.09%	2.41%
Euro V	66.91%	74.89%
Euro VI	3.64%	19.42%
Total	***100.00%***	***100.00%***

Basic Idling Emission Factors

Euro Standard	Truck/bus
	PM (g/h)
pre-Euro	6.62
Euro I	5.53
Euro II	1.43
Euro III	1.29
Euro IV	0.2
Euro V	0.1
Euro VI	0.01

Source : Road tunnels: Vehicle emission and air demand for ventilation, PIARC, 2019

Mass Factors

Pollutant	Mass Factor		
	15t	23t	32t
PM	0.9	1	1.2

Source : Road tunnels: Vehicle emission and air demand for ventilation, PIARC, 2019

According to PIARC (2019), PM is defined as particles in the air that can reduce visibility, whereas these components are abundant in the size range up to 0.7 um. Hence, the emission factors for PM is applied for TSP, RSP and FSP.

Composite Idling Emission Factors

Euro Standard	Composite Idling Emission Factors (g/h)	
	FBSD	FBDD
	PM	PM
pre-Euro	0.00	0.00
Euro I	0.00	0.00
Euro II	0.00	0.00
Euro III	0.06	0.04
Euro IV	0.05	0.00
Euro V	0.07	0.07
Euro VI	0.00	0.00
Composite Emission Factors(g/h)	*0.226*	*0.193*
Composite Emission Factors (g/s)	***6.27E-05***	***5.37E-05***

For conservative assessment, mass factor of 1 and 1.2 are used for FBSD (assuming >15 ton) and FBDD (assuming >23 ton) respectively.
An A/C loading factor of 1.3 has been include, same assumption as other EIAs.

Cold Idling for diesel vehicles with SCR

For cold idling, no PM emission factor has been provided in "Calculation of Start Emissions in Air Quality Impact Assessment" by EPD. Hence, emission factor is made reference to "Road tunnels: Vehicle emission and air demand for ventilation, PIARC, 2019" for conservative assessments.