



Palliser Airshed Society

Ambient Air Monitoring Network Summary

February 2005

Prepared By:
FOCUS
AIR QUALITY MONITORING

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Alberta Environment
Enforcement and Monitoring Division
11th Floor, Oxbridge Place
9820 - 106th Street
Edmonton, Alberta, T5K 2J6

Attention: Director of Monitoring and Evaluation

RE: Palliser Airshed Society (PAS) Ambient Air Monitoring Report – February 2005

Enclosed is the PAS Ambient Monitoring Report for the month of **February 2005**.

Please note that this report has been prepared in partial fulfillment of the City of Medicine Hat's air monitoring requirement as well as all members of the Palliser Airshed Society.

Continuous Monitoring – Crescent Heights

Included in this report are; monthly sampling table, detailed hourly average reports and multipoint calibration reports of all instruments. The measured ambient air quality was within the Provincial and Federal guidelines with no exceedences recorded. Operational time of all instruments was above 97% uptime for the month of February. Of particular note, the DACS system was upgraded in February with additional memory which resulted in 9 hours of no data being stored at the station. There were no significant events leading to emergency response for the month of February.

The following is a summary of the monthly averages recorded during sampling:

- Monthly average concentrations of NO₂ was 11.2 ppb
- Monthly average concentrations for O₃ was 22.4 ppb
- Monthly average concentrations for THC was 1.97 ppm
- Monthly average concentrations for PM_{2.5} was 2.8 µg/m³

Passive Monitoring – Six Stations throughout the PAS zone:

The following are the ranges for February 2005 recorded by the six passive stations located throughout the PAS zone:

- Monthly average concentrations for SO₂ passives ranged from 0.5 ppb to 0.8 ppb
- Monthly average concentrations for NO₂ passives ranged from 5.7 ppb to 10.6 ppb
- Monthly average concentrations for O₃ passives ranged from 20.9 ppb to 29.8 ppb

If you have any questions, please contact the Focus office at 1-888-466-6555 or 1-888-869-2252.

Gary Cross, C.E.T.
AQM Technical Manager

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AQM Environmental Specialist



February 2005 Monthly Overall Summary Report

Ambient Air Quality Data

Feb-2005		Palliser Airshed Society					Maximum Recorded Values						Operational Time (%)
Pollutant (units)	Guidelines		Station	Monthly Average	Exceedence		1-hr				24-hr		
	1-hr	24-hr			1-hr	24-hr	Conc	Day	WSPD (km/hr)	WDIR (Sector)	Conc	Day	
NO (ppb)			Crescent Heights	7.0	0	0	91.7	Feb-16	calm	N	27.7	Feb-25	98.2%
NO ₂ (ppb)	212	106	Crescent Heights	11.2	0	0	44.0	Feb-16	calm	N	19.7	Feb-25	98.2%
NO _x (ppb)			Crescent Heights	18.1	0	0	135.0	Feb-16	calm	N	47.1	Feb-25	98.2%
O ₃ (ppb)	82		Crescent Heights	22.4	0	0	45.9	Feb-28	7.0	SW	31.4	Feb-13	98.2%
THC (ppm)			Crescent Heights	1.97	0	0	2.87	Feb-28	2.3	NE	2.32	Feb-16	98.2%
PM _{2.5} (µg/m ³)		30 ^a	Crescent Heights	2.8	0	0	17.4	Feb-25	3.5	ESE	5.8	Feb-26	97.6%
RH (%)			Crescent Heights	58.9									98.1%
SR (W/m ²)			Crescent Heights	102.2									98.2%
Temp (°C)			Crescent Heights	-2.0									98.1%
WSPD v (km/hr)			Crescent Heights	4.0									98.1%
WSPD s (km/hr)			Crescent Heights	9.4									98.1%
WDIR (Deg)			Crescent Heights	WSW*									98.1%

Note: ^a the 24-hr Canada Wide Standard level is considered as an absolute value
 * Wind Direction is the predominate direction for the Month



Continuous Monitoring

Ambient Air Monitoring Network

Crescent Heights Station

General Station Issues

No unusual activities were noted during the station operation in the month of February, 2005.

Parameter	Make	Model	Units	Notes
Ozone	Teledyne - API	400E	ppb	Nine hours of data was lost due to the DACS unit being upgraded
Nitrogen Dioxide	Teledyne - API	200E	ppb	Nine hours of data was lost due to the DACS unit being upgraded
Total Hydrocarbons	Bendix	400A	ppm	Nine hours of data was lost due to the DACS unit being upgraded
PM 2.5	R&P TEOM	1400ab	$\mu\text{g}/\text{m}^3$	Nine hours of data was lost due to the DACS unit being upgraded
Wind Speed	Met One	010C	kph	Nine hours of data was lost due to the DACS unit being upgraded
Wind Direction	Met One	020C	Deg	Nine hours of data was lost due to the DACS unit being upgraded
Ambient Temperature	Met One	083D	DegC	Nine hours of data was lost due to the DACS unit being upgraded
Relative Humidity	Met One	083D	%	Nine hours of data was lost due to the DACS unit being upgraded
Solar Radiation	Met One	096-1	W/m^2	Nine hours of data was lost due to the DACS unit being upgraded
Data Acquisition System	Titan Logix	AP1000		Unit was upgraded with additional memory (resulting in 9 hours of downtime)



PAS - Crescent Heights Oxides of Nitrogen Monthly Summary

Station: Crescent Heights

HOURLY AVERAGE TABLE

Nitrogen Dioxide (NO₂)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Number of 1-hr Exceedances:	0
Number of 24-hr Exceedances:	0
Maximum 1-hr Average:	44 ppb 16-Feb 21:00 22:00
Maximum 24-hr Average:	20 ppb 25-Feb

Guideline Limit: Alberta Environment: 1-hr 212 ppb 24-hr 106 ppb

AIC Time:	30 hrs	Operational Time:	625 hrs					
Calibration Time:	5 hrs	AMD Operational Uptime:	98.2%					
Percentile	99	95	75	50	25	5	1	Average
	37	30	17	8	4	1	0	11.2 ppb

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	24-hour Average	Daily Maximum	
Hour End	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	0:00			
1-Feb-05	11	9	8	11	6	6	7	9	5	5	4	4	3	7	5	9	9	7	6	A	6	4	3	2	6.3	11.1	
2-Feb-05	4	2	2	2	2	1	2	2	3	4	3	2	3	3	6	7	4	9	A	38	38	35	15	7	8.3	38.2	
3-Feb-05	5	5	2	2	5	4	4	7	13	15	5	3	5	7	4	5	7	A	9	13	6	4	5	6	6.2	15.2	
4-Feb-05	4	3	4	4	4	3	4	3	3	2	2	2	2	2	2	3	A	6	3	2	2	4	3	4	2.9	5.5	
5-Feb-05	2	3	1	2	2	2	3	2	1	3	1	1	1	1	3	A	7	7	7	6	4	9	5	5	3.3	8.7	
6-Feb-05	8	10	9	6	8	5	3	5	2	0	0	0	0	0	A	2	0	0	1	2	1	2	13	8	3.7	12.5	
7-Feb-05	6	7	5	6	14	20	12	13	14	18	17	10	6	A	9	3	4	7	6	9	12	25	20	11	11.0	24.8	
8-Feb-05	12	8	21	28	25	26	23	20	8	3	3	3	A	13	14	10	4	10	13	17	31	25	25	10	15.2	31.2	
9-Feb-05	10	5	3	3	4	4	8	10	11	6	3	A	6	4	3	5	7	13	14	5	12	14	11	9	7.3	14.2	
10-Feb-05	12	8	8	4	10	19	23	29	20	8	A	6	5	4	3	5	10	14	15	8	9	8	6	4	10.3	29.1	
11-Feb-05	5	3	6	3	8	6	17	14	15	A	9	5	5	4	6	5	7	13	22	36	25	31	25	37	21	14.1	37.1
12-Feb-05	24	22	27	31	23	11	7	7	A	9	6	5	5	8	8	12	7	18	N	N	N	N	N	N	N	N	30.5
13-Feb-05	N	N	N	5	5	6	6	A	10	6	7	5	6	4	2	3	2	4	3	6	13	17	13	5	6.4	17.3	
14-Feb-05	1	1	1	2	3	4	A	27	30	27	15	N	4	5	3	4	7	20	22	36	34	35	31	22	15.2	35.5	
15-Feb-05	11	4	6	8	11	13	17	8	11	A	11	6	8	6	7	7	6	10	19	17	11	16	23	31	11.7	31.4	
16-Feb-05	23	13	10	19	28	24	11	12	A	C	C	3	2	3	3	N	N	C	C	C	A	44	36	25	N	44.0	
17-Feb-05	16	28	25	18	17	21	22	26	21	A	10	11	8	8	6	7	9	17	23	33	27	22	29	31	18.9	33.5	
18-Feb-05	31	31	22	22	19	21	24	22	18	A	3	2	1	1	1	2	9	5	0	0	1	2	0	0	10.2	30.7	
19-Feb-05	0	0	0	0	3	9	12	15	A	17	6	3	3	2	5	7	8	6	8	9	11	2	2	4	5.7	16.9	
20-Feb-05	10	11	9	10	10	7	8	A	13	8	5	4	2	2	2	3	3	8	25	22	25	28	29	23	11.5	28.6	
21-Feb-05	15	21	18	13	21	18	A	19	15	12	9	11	9	8	5	3	6	10	26	22	18	23	20	18	14.8	26.1	
22-Feb-05	13	16	26	23	23	A	25	25	13	4	2	3	6	3	6	3	4	9	11	11	23	38	33	22	14.8	37.5	
23-Feb-05	26	13	8	17	A	9	10	14	15	10	3	3	4	5	4	10	9	27	36	30	22	18	8	5	13.3	36.0	
24-Feb-05	7	4	5	A	7	8	10	11	7	4	4	5	4	4	4	6	5	9	13	29	27	23	16	33	10.7	33.2	
25-Feb-05	21	27	A	31	30	27	22	15	10	6	6	7	9	10	9	12	10	18	27	40	35	29	27	23	19.7	40.3	
26-Feb-05	18	A	20	23	22	21	25	23	15	13	14	11	8	6	4	4	8	11	17	30	36	30	24	30	17.8	36.1	
27-Feb-05	A	16	17	20	16	18	18	18	15	12	12	14	5	2	2	1	2	2	1	1	2	2	11	A	9.4	20.0	
28-Feb-05	19	24	20	26	20	21	21	26	24	16	5	5	10	7	4	2	3	9	30	12	9	29	A	42	16.8	41.8	
																										N	0.0
																										N	0.0
																										N	0.0
Hourly Avg	12.0	11.2	10.9	12.5	12.7	12.4	13.2	14.6	12.6	8.9	6.3	5.1	4.8	4.7	4.8	5.4	6.4	10.7	14.8	16.8	17.2	18.9	17.1	15.5			
Hourly Max	30.6	30.7	27.0	31.3	29.5	27.4	25.0	29.1	29.6	26.9	17.3	13.7	9.5	12.9	13.6	12.0	13.3	26.5	36.0	40.3	37.9	44.0	37.1	41.8			

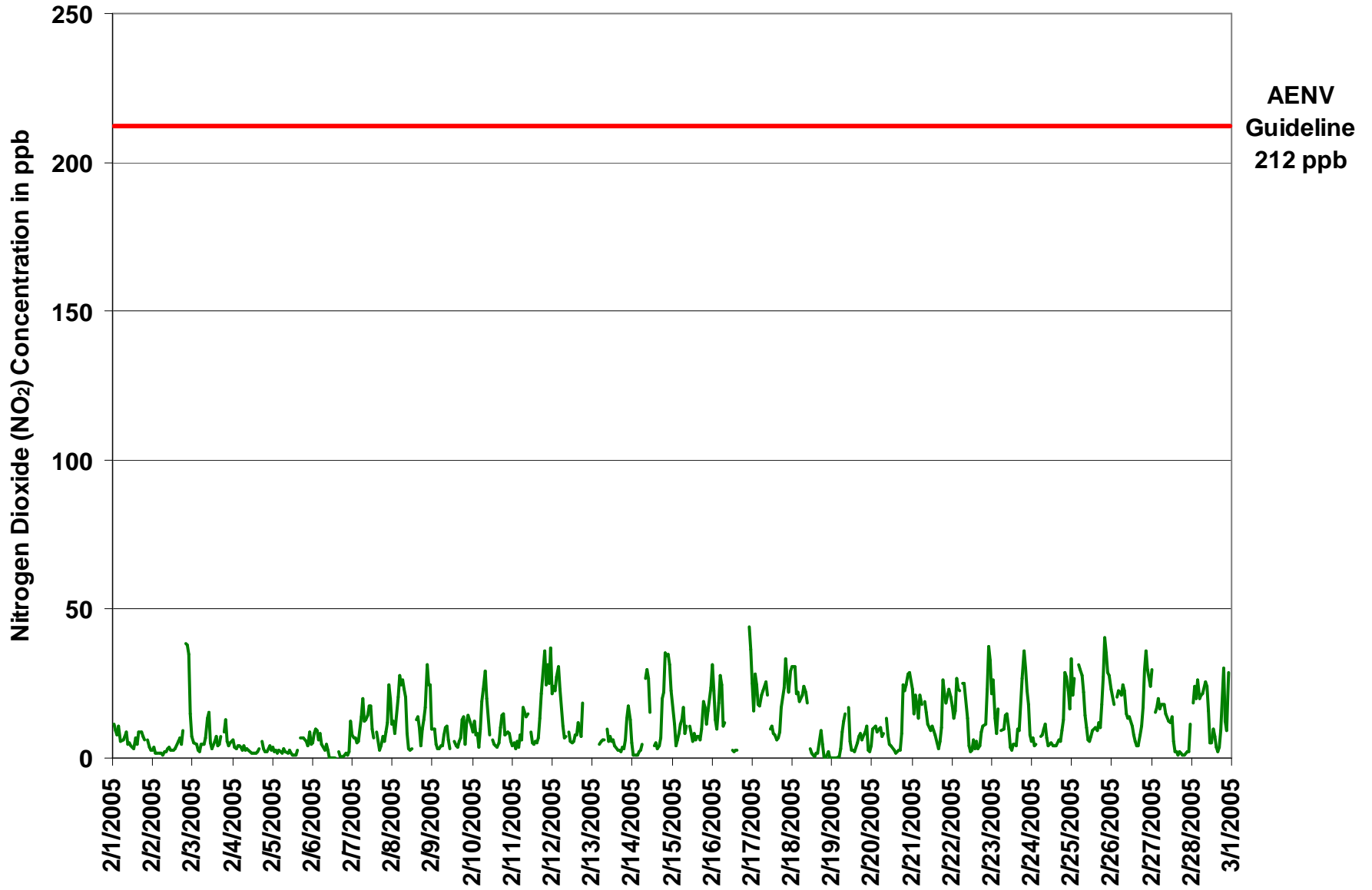


Figure 1. PAS - Crescent Heights Nitrogen Dioxide 1-hr Average Monthly Trend



Station: Crescent Heights

HOURLY MAXIMUM TABLE

Nitrogen Dioxide (NO₂)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005
Summary

Maximum 1-hr Value:	139.6	ppb	16-Feb	21:00 22:00
Maximum 24-hr Value:	27.5	ppb	25-Feb	

AIC Time:	30 hrs	Operational Time:	625 hrs					
Calibration Time:	5 hrs	AMD Operational Uptime:	98.2%					
Percentile	99	95	75	50	25	5	1	Average
	60	47	31	17	8	2	1	20.5 ppb

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day	Mountain Standard Time																								24-hour Average	Daily Maximum	
Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00			
Hour End	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	0:00			
1-Feb-05	27	22	26	36	11	30	16	11	8	40	21	15	5	25	13	37	26	9	11	A	9	5	26	35	20.1	40.2	
2-Feb-05	31	3	4	6	7	3	7	6	5	11	4	4	4	6	12	14	10	14	A	55	41	42	25	9	14.0	54.9	
3-Feb-05	8	22	7	5	24	13	29	32	31	31	14	23	7	37	9	7	52	A	11	35	26	6	9	10	19.4	51.8	
4-Feb-05	5	4	6	5	5	4	6	4	4	4	2	3	3	2	3	5	A	11	7	4	4	9	6	6	4.9	10.9	
5-Feb-05	4	8	2	4	3	3	5	5	2	4	2	2	2	3	6	A	13	9	10	20	5	27	8	7	6.7	27.2	
6-Feb-05	13	15	11	7	12	7	6	10	5	2	0	0	0	0	A	4	1	1	2	3	2	10	15	10	5.9	15.4	
7-Feb-05	8	9	7	10	19	22	19	22	18	19	19	14	10	A	56	34	12	12	27	12	45	33	27	15	20.3	55.7	
8-Feb-05	18	15	32	32	31	29	32	29	30	17	11	24	A	21	22	35	6	22	22	39	37	32	36	15	25.6	39.2	
9-Feb-05	42	8	5	6	9	5	25	24	25	17	10	A	22	6	17	30	37	36	51	13	23	30	17	12	20.6	50.8	
10-Feb-05	38	10	24	6	19	29	39	47	44	9	A	15	41	5	5	36	22	19	33	33	13	33	23	6	23.9	46.8	
11-Feb-05	29	6	49	7	24	10	49	20	22	A	12	15	8	9	8	18	22	36	48	34	42	38	60	40	26.3	59.8	
12-Feb-05	84	28	45	63	50	38	20	40	A	34	12	8	8	29	18	24	12	26	N	N	N	N	N	N	N	N	83.6
13-Feb-05	N	N	N	19	24	26	23	A	24	11	17	13	8	6	4	4	3	8	6	9	32	32	30	8	15.4	32.4	
14-Feb-05	2	2	3	3	5	6	A	41	39	34	28	N	6	26	6	23	15	33	32	40	38	50	55	32	23.6	55.3	
15-Feb-05	23	6	12	12	14	34	41	18	15	A	21	12	14	8	10	11	8	19	33	38	18	22	41	39	20.4	41.2	
16-Feb-05	35	46	40	35	31	33	17	37	A	C	C	10	17	12	6	N	N	C	C	C	A	140	47	39	N	139.6	
17-Feb-05	30	34	31	29	30	31	29	33	30	A	18	16	10	11	8	10	12	30	32	38	37	35	35	40	26.5	39.7	
18-Feb-05	40	59	29	28	21	25	36	25	29	A	5	2	2	1	9	7	35	10	2	1	3	3	1	1	16.3	58.9	
19-Feb-05	0	0	1	1	5	16	17	22	A	20	11	5	16	4	8	12	13	8	10	13	22	3	3	7	9.5	22.4	
20-Feb-05	16	22	11	13	20	11	17	A	22	10	10	35	19	2	17	43	14	28	50	32	34	31	39	37	23.3	50.4	
21-Feb-05	23	23	23	17	24	24	A	21	21	33	15	16	14	13	9	4	11	14	45	63	29	35	35	29	23.5	62.7	
22-Feb-05	26	32	34	27	41	A	68	54	29	26	3	7	12	5	10	5	6	15	13	15	36	54	48	37	26.2	68.2	
23-Feb-05	54	23	13	25	A	36	30	33	29	16	27	4	13	7	6	14	15	37	43	37	30	32	12	9	23.7	54.2	
24-Feb-05	30	8	24	A	10	22	40	30	10	6	14	35	5	5	22	9	8	15	37	33	42	31	32	44	22.2	43.7	
25-Feb-05	33	34	A	34	41	40	48	18	12	9	6	11	12	12	11	31	13	29	44	52	47	32	33	29	27.5	52.5	
26-Feb-05	20	A	23	25	24	23	62	27	27	18	18	13	11	16	5	7	11	13	26	41	48	42	37	49	25.5	62.4	
27-Feb-05	A	27	20	24	32	20	34	25	48	14	14	34	12	3	3	2	3	3	2	2	3	6	29	A	16.3	47.6	
28-Feb-05	27	28	25	30	29	24	30	33	29	21	11	8	19	21	7	4	9	16	49	37	14	58	A	47	25.1	58.0	
																										N	0.0
																										N	0.0
																										N	0.0
Hourly Avg	25.6	18.9	19.6	18.8	20.9	21.0	28.7	25.6	22.4	17.6	12.5	13.1	11.1	11.0	11.6	16.6	15.0	18.2	25.9	28.0	26.2	32.3	28.0	23.5			
Hourly Max	83.6	58.9	48.9	63.5	49.6	40.0	68.2	54.1	47.6	40.2	27.7	35.4	40.8	36.6	55.7	43.4	51.8	37.0	50.8	62.7	48.3	139.6	59.8	49.1			

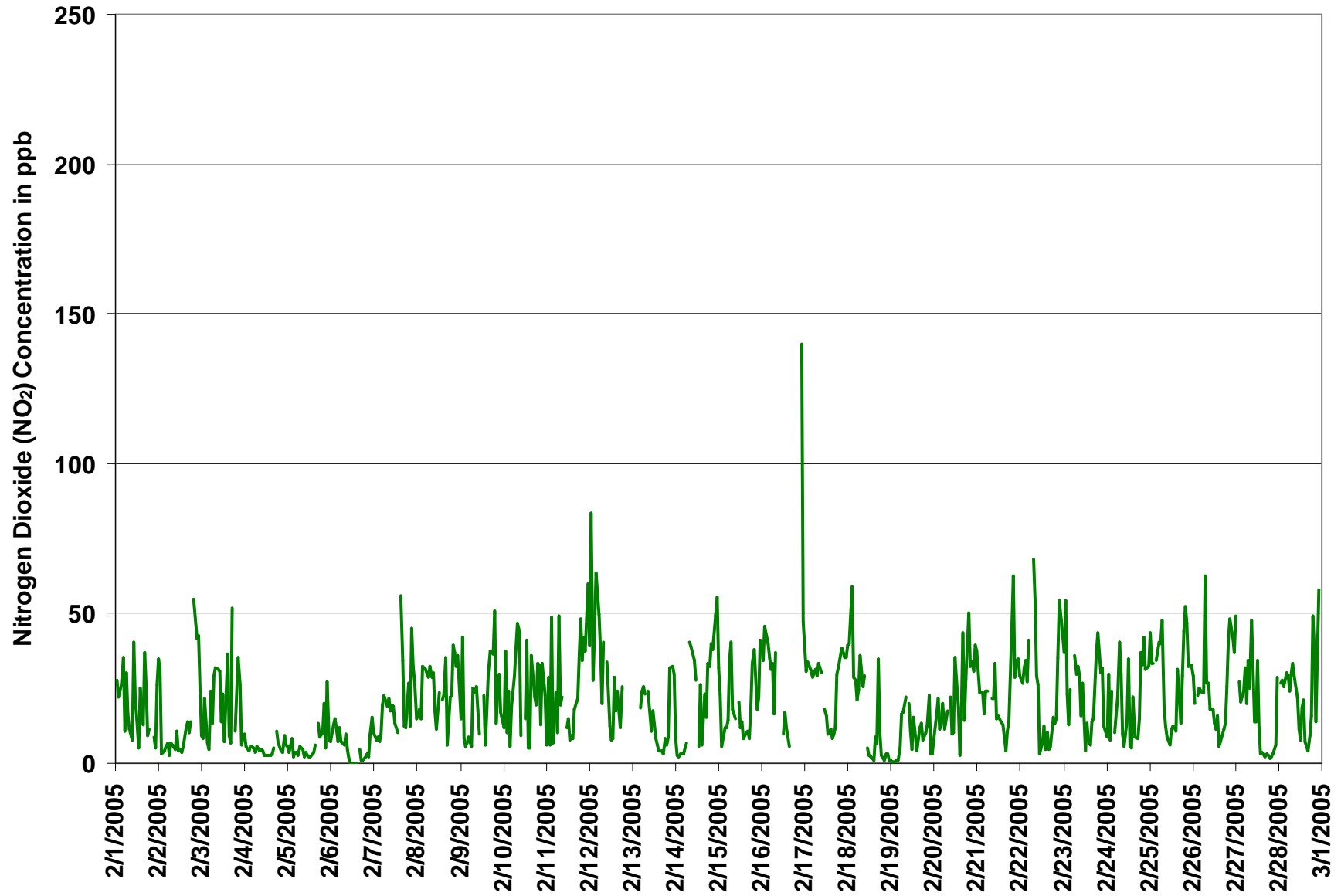
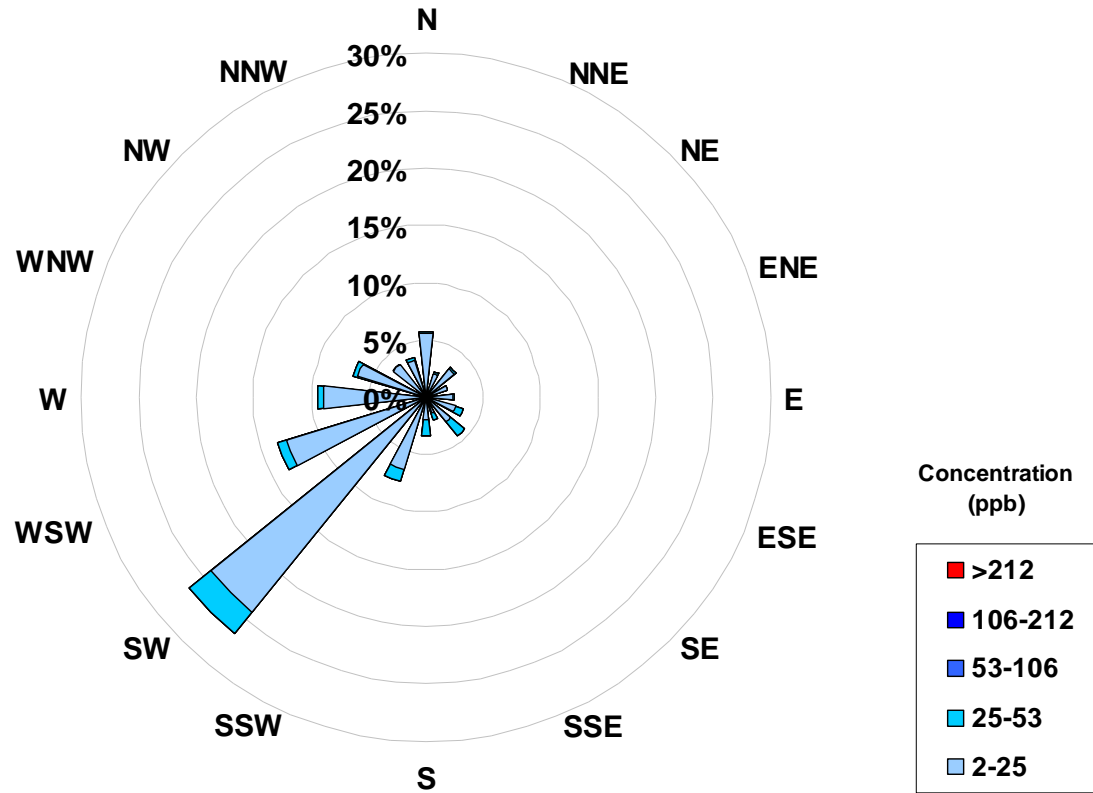


Figure 2. PAS - Crescent Heights Nitrogen Dioxide 1-hr Maximum Value Monthly Trend



Concentration Rose for the 1-hr NO₂ Average Concentration Occurrences at the Crescent Heights Site for February 2005



Frequency Distribution of NO ₂ in ppb			
Range		Frequency (hrs)	
0	< 2	55	
2	to 25	504	
25	to 53	66	
53	to 106	0	
106	to 212	0	
	> 212	0	
Total Non-Zero Values		625	

Calms	
Range	
ppb	
2-25	0.0%
25-53	0.0%
53-106	0.0%
106-212	0.0%
>212	0.0%



Station: Crescent Heights

HOURLY AVERAGE TABLE

Nitric Oxide (NO)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Number of 1-hr Exceedances:	0			
Number of 24-hr Exceedances:	0			
Maximum 1-hr Average:	92	ppb	16-Feb	21:00 22:00
Maximum 24-hr Average:	28	ppb	25-Feb	

Guideline Limit: Alberta Environment: 1-hr na ppb 24-hr na ppb

AIC Time:	30 hrs	Operational Time:	625 hrs					
Calibration Time:	5 hrs	AMD Operational Uptime:	98.2%					
Percentile	99	95	75	50	25	5	1	Average
	64	32	6	3	1	0	0	7.0 ppb

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	24-hour Average	Daily Maximum	
1-Feb-05	3	3	3	7	1	4	2	2	1	4	2	2	2	5	1	5	4	1	1	A	1	1	1	2	2.5	6.7	
2-Feb-05	4	0	0	0	0	0	1	1	1	4	1	1	1	1	2	2	1	1	A	21	22	20	2	0	3.7	21.7	
3-Feb-05	0	2	0	0	1	1	1	3	3	5	1	2	1	4	1	1	3	A	1	3	1	1	1	1	1.8	5.2	
4-Feb-05	0	0	0	1	0	0	1	1	1	0	1	1	1	1	1	1	A	1	1	1	1	1	1	1	0.7	1.2	
5-Feb-05	1	1	0	0	0	0	1	1	1	1	1	1	1	2	1	2	A	2	2	3	4	2	6	1	2	1.6	6.5
6-Feb-05	1	1	1	0	1	0	0	1	1	1	1	1	0	0	0	A	1	0	0	0	0	0	2	1	0.5	1.5	
7-Feb-05	1	2	1	1	2	6	4	2	6	19	18	6	4	A	6	2	1	1	2	1	5	13	4	0	4.7	18.8	
8-Feb-05	1	0	7	50	31	51	38	27	10	4	5	5	A	5	7	5	1	1	2	4	13	4	16	1	12.5	50.8	
9-Feb-05	6	1	0	1	0	1	3	3	5	4	2	A	3	2	1	2	3	3	7	1	2	1	2	1	2.3	7.2	
10-Feb-05	4	0	1	1	0	4	9	22	16	4	A	2	2	1	1	3	3	2	3	3	1	3	1	0	3.8	22.0	
11-Feb-05	3	0	4	0	1	1	8	2	3	A	3	2	1	2	2	2	2	3	46	5	27	7	61	6	8.3	60.8	
12-Feb-05	19	9	23	79	32	3	2	4	A	4	1	1	1	1	3	3	3	1	1	N	N	N	N	N	N	N	79.2
13-Feb-05	N	N	N	2	2	1	1	A	3	1	3	2	2	2	1	1	1	1	0	0	1	2	1	1	1.4	3.1	
14-Feb-05	0	0	0	0	0	0	A	8	18	27	15	N	3	5	2	2	2	4	2	15	25	46	45	11	10.5	45.8	
15-Feb-05	1	1	1	1	1	6	16	2	4	A	7	4	7	5	5	4	2	1	3	3	2	1	6	14	4.2	16.0	
16-Feb-05	7	6	5	8	18	16	2	11	A	C	C	3	2	3	1	N	N	C	C	C	A	92	61	21	N	91.7	
17-Feb-05	4	15	9	4	2	3	3	15	17	A	9	8	4	4	4	4	3	3	4	14	10	6	15	41	8.7	40.8	
18-Feb-05	67	66	16	12	4	11	18	16	28	A	1	2	1	1	1	1	4	1	0	0	0	0	0	0	10.9	67.2	
19-Feb-05	0	0	0	0	1	1	2	5	A	15	4	3	4	2	3	3	3	2	1	1	1	1	0	0	2.3	14.5	
20-Feb-05	1	1	1	1	2	0	1	A	5	4	3	3	2	1	3	3	2	2	10	3	40	23	35	25	7.4	40.1	
21-Feb-05	4	7	4	2	6	6	A	6	13	10	8	7	6	4	2	1	2	2	8	6	2	7	11	3	5.5	12.5	
22-Feb-05	3	12	28	13	18	A	33	32	10	3	2	2	5	2	3	2	2	2	2	2	1	3	21	26	14	10.4	33.0
23-Feb-05	39	5	1	4	A	5	4	8	11	7	4	2	3	3	2	4	2	4	13	10	4	6	1	1	6.3	39.1	
24-Feb-05	2	1	3	A	1	3	5	5	4	3	4	8	3	2	2	2	1	1	2	5	15	5	5	39	5.3	39.4	
25-Feb-05	8	29	A	33	56	60	54	27	21	10	8	8	10	7	5	6	3	3	8	80	65	37	68	31	27.7	79.8	
26-Feb-05	14	A	8	8	9	4	28	18	10	5	6	4	3	3	1	1	2	2	2	3	15	16	10	55	9.9	55.3	
27-Feb-05	A	4	3	19	11	13	18	34	26	18	13	13	3	1	1	0	0	0	0	0	0	0	2	A	8.2	33.7	
28-Feb-05	1	5	2	16	13	11	17	42	58	24	3	3	5	4	2	1	2	1	8	1	1	33	A	19	11.8	58.2	
																										N	0.0
																										N	0.0
																										N	0.0
Hourly Avg	7.6	6.7	4.7	9.7	7.9	7.9	10.4	11.4	11.0	7.6	4.8	3.7	3.0	2.7	2.4	2.4	2.0	1.8	5.1	7.5	9.9	13.1	14.6	11.2			
Hourly Max	67.2	66.1	27.5	79.2	55.7	59.9	54.2	41.7	58.2	27.4	17.7	13.5	10.0	7.4	6.7	6.4	4.2	4.3	45.8	79.8	65.0	91.7	67.9	55.3			



Station: Crescent Heights

HOURLY MAXIMUM TABLE

Nitric Oxide (NO)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Maximum 1-hr Value:	365.0	ppb	12-Feb	3:00 4:00
Maximum 24-hr Value:	79.9	ppb	25-Feb	

AIC Time:	30 hrs	Operational Time:	625 hrs					
Calibration Time:	5 hrs	AMD Operational Uptime:	98.2%					
Percentile	99	95	75	50	25	5	1	Average
	214	122	43	10	2	1	1	30.5 ppb

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	24-hour Average	Daily Maximum	
1-Feb-05	24	44	48	85	5	109	27	3	2	92	25	20	3	50	4	120	78	2	2	A	2	1	37	62	36.7	119.6	
2-Feb-05	54	1	1	1	1	1	2	9	2	15	1	2	2	2	10	3	1	3	A	109	55	59	5	2	14.9	109.4	
3-Feb-05	1	41	2	9	28	1	42	72	18	13	4	33	2	71	2	2	64	A	2	12	9	1	2	2	18.9	72.4	
4-Feb-05	1	1	1	1	1	1	1	2	2	1	2	2	1	1	1	3	A	7	5	2	3	3	2	2	1.9	7.2	
5-Feb-05	2	2	1	1	1	1	2	1	1	2	3	2	3	3	5	A	10	3	9	25	4	33	4	4	5.3	33.4	
6-Feb-05	3	3	2	1	1	1	1	1	1	1	1	1	1	1	1	A	1	1	1	1	1	1	4	2	1.4	3.7	
7-Feb-05	2	4	3	2	3	11	8	10	16	24	23	19	7	A	103	46	7	3	43	4	116	36	9	1	21.7	116.0	
8-Feb-05	2	2	49	91	68	60	95	111	123	32	47	47	A	13	19	43	2	3	19	36	33	22	140	3	46.0	140.2	
9-Feb-05	140	3	1	3	3	2	49	27	64	34	14	A	29	3	20	54	93	29	96	2	6	5	4	2	29.7	139.6	
10-Feb-05	108	1	22	2	3	16	101	116	94	5	A	11	44	3	3	52	19	14	33	74	2	57	44	2	35.8	115.6	
11-Feb-05	57	2	140	2	5	4	96	3	8	A	4	12	3	3	2	15	5	32	168	24	86	29	142	93	40.6	168.5	
12-Feb-05	214	25	225	365	179	76	42	101	A	123	5	3	2	22	8	8	2	4	N	N	N	N	N	N	N	N	365.0
13-Feb-05	N	N	N	15	24	22	7	A	20	2	17	5	3	3	2	1	1	2	1	2	4	17	16	3	8.4	24.0	
14-Feb-05	1	1	1	1	1	2	A	43	39	54	40	N	5	27	4	14	4	10	3	30	46	82	160	28	27.1	159.9	
15-Feb-05	5	1	2	1	2	68	109	7	6	A	27	10	21	7	8	6	3	4	17	26	16	3	78	38	20.2	109.0	
16-Feb-05	31	107	72	59	79	83	4	118	A	C	C	36	30	27	3	N	N	C	C	C	A	253	75	63	N	253.1	
17-Feb-05	78	34	16	14	9	11	14	42	37	A	23	13	5	6	6	5	4	5	7	44	43	45	49	61	24.9	78.1	
18-Feb-05	105	266	53	35	10	19	50	27	68	A	2	2	2	1	8	3	52	2	1	2	1	1	1	1	31.0	266.5	
19-Feb-05	1	1	1	1	1	3	3	12	A	21	9	4	33	4	5	5	7	2	2	2	2	2	1	1	1	5.3	33.4
20-Feb-05	2	4	1	2	15	1	4	A	23	5	11	31	18	2	48	72	13	26	135	14	91	43	70	59	29.9	135.1	
21-Feb-05	13	16	12	7	14	26	A	14	33	80	13	13	10	7	4	2	3	3	44	94	15	52	134	27	27.6	134.4	
22-Feb-05	38	73	67	33	57	A	192	173	50	47	3	6	12	3	6	2	3	11	4	2	12	85	167	98	49.8	191.9	
23-Feb-05	191	28	7	20	A	141	64	65	58	17	53	4	18	5	3	6	6	18	58	51	10	60	2	3	38.6	191.5	
24-Feb-05	59	3	68	A	3	37	102	66	9	4	47	178	4	3	32	3	2	2	24	11	71	26	40	98	38.8	178.1	
25-Feb-05	31	135	A	91	151	157	213	50	29	13	9	16	17	9	7	61	4	7	48	301	200	73	132	85	79.9	301.1	
26-Feb-05	27	A	13	18	16	7	194	33	53	11	9	8	5	11	2	2	3	3	10	7	60	44	65	123	31.4	194.2	
27-Feb-05	A	22	6	37	71	31	88	64	87	23	18	70	8	2	1	1	1	1	0	1	1	1	15	A	24.9	88.3	
28-Feb-05	22	8	5	59	30	18	29	106	82	57	9	4	15	33	3	2	23	2	40	5	2	232	A	42	35.9	231.6	
																										N	0.0
																										N	0.0
																										N	0.0
Hourly Avg	46.6	31.8	31.6	35.4	28.9	33.6	59.2	49.0	37.0	29.4	16.0	21.2	11.2	11.9	11.9	20.5	15.7	7.6	30.9	35.2	34.2	46.9	53.7	34.8			
Hourly Max	213.5	266.5	224.7	365.0	178.8	156.8	213.5	173.0	123.2	122.7	52.5	178.1	43.9	71.3	103.3	119.6	93.1	31.6	168.5	301.1	199.6	253.1	166.6	123.0			



Station: Crescent Heights

HOURLY AVERAGE TABLE

Oxides of Nitrogen (NO_x)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Number of 1-hr Exceedances:	0			
Number of 24-hr Exceedances:	0			
Maximum 1-hr Average:	135	ppb	16-Feb	21:00 22:00
Maximum 24-hr Average:	47	ppb	25-Feb	

Guideline Limit: Alberta Environment: 1-hr na ppm 24-hr na ppm

AIC Time:	30 hrs							Operational Time:	625 hrs	
Calibration Time:	5 hrs							AMD Operational Uptime:	98.2%	
Percentile	99	95	75	50	25	5	1	Average		
	97	59	24	10	5	2	0	18.1 ppb		

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	24-hour Average	Daily Maximum	
1-Feb-05	13	12	11	17	6	10	9	10	6	9	6	6	4	12	6	14	12	8	7	A	7	4	4	4	8.6	17.3	
2-Feb-05	7	2	2	2	2	1	3	3	3	8	3	3	3	4	7	8	5	10	A	59	59	55	16	7	11.8	59.5	
3-Feb-05	6	7	2	3	6	5	5	10	16	20	6	5	7	11	6	6	10	A	10	16	7	5	6	7	7.8	20.2	
4-Feb-05	4	3	4	5	4	3	4	3	4	3	2	2	2	2	2	4	A	7	4	2	2	5	4	4	3.5	6.6	
5-Feb-05	3	3	2	3	2	2	4	3	2	4	2	2	2	2	5	A	9	9	9	9	6	15	6	7	4.8	15.1	
6-Feb-05	9	11	10	6	9	5	3	5	3	0	0	0	0	0	A	3	1	0	1	1	1	2	14	9	4.1	14.1	
7-Feb-05	7	9	6	6	16	26	16	15	21	36	35	16	10	A	15	5	5	9	8	10	17	37	24	12	15.7	37.3	
8-Feb-05	13	8	28	77	56	76	61	48	18	6	8	7	A	18	20	15	5	11	15	21	44	29	41	11	27.6	77.1	
9-Feb-05	16	5	3	4	5	5	11	13	15	10	5	A	9	5	5	8	10	15	21	5	13	15	12	9	9.5	21.0	
10-Feb-05	16	8	10	4	10	23	32	51	36	11	A	8	7	5	4	8	13	17	18	10	9	11	7	4	14.0	51.1	
11-Feb-05	8	3	9	4	9	7	25	15	18	A	11	7	6	7	7	8	16	25	81	30	58	32	98	27	22.3	97.7	
12-Feb-05	43	32	50	109	56	14	9	11	A	12	6	6	7	10	11	15	8	19	N	N	N	N	N	N	N	N	109.4
13-Feb-05	N	N	N	6	7	7	6	A	12	7	10	7	8	5	3	3	3	4	3	6	14	19	14	6	7.6	19.1	
14-Feb-05	1	1	1	2	3	5	A	35	48	54	30	N	7	10	5	7	9	24	23	51	59	81	76	33	25.7	80.6	
15-Feb-05	12	5	7	9	13	18	33	11	15	A	18	10	15	11	12	11	8	11	22	20	13	18	29	46	15.9	45.6	
16-Feb-05	30	19	15	27	46	40	13	23	A	C	C	6	5	6	4	N	N	C	C	C	A	135	97	46	N	135.0	
17-Feb-05	20	42	34	22	19	24	26	41	38	A	18	17	11	11	10	10	11	20	26	47	36	27	43	71	27.1	70.6	
18-Feb-05	97	96	37	33	22	32	41	37	46	A	4	3	3	1	3	3	14	6	1	0	1	2	0	0	20.9	96.8	
19-Feb-05	0	0	0	1	3	10	15	20	A	31	10	5	6	4	8	10	11	8	9	10	12	3	2	5	8.0	31.1	
20-Feb-05	11	12	9	11	12	7	9	A	18	11	7	7	4	3	5	6	4	10	34	25	64	51	64	47	18.8	64.3	
21-Feb-05	19	28	22	16	26	24	A	25	28	22	17	18	15	11	8	4	7	12	34	28	21	30	31	20	20.2	34.1	
22-Feb-05	16	28	54	36	41	A	58	57	23	7	4	5	11	5	9	5	6	11	13	12	25	58	59	36	25.1	59.2	
23-Feb-05	65	18	9	20	A	14	14	23	26	17	7	5	8	7	6	14	12	31	49	40	26	24	9	6	19.6	64.9	
24-Feb-05	9	5	7	A	8	10	14	16	10	7	9	13	7	6	6	8	6	10	15	34	42	28	22	72	15.8	72.3	
25-Feb-05	29	56	A	64	85	87	76	41	31	16	14	15	19	17	14	18	13	20	35	120	100	65	95	54	47.1	119.5	
26-Feb-05	32	A	28	30	30	25	52	41	25	18	20	15	10	8	5	5	9	13	19	33	51	45	33	84	27.6	84.5	
27-Feb-05	A	20	20	39	27	31	36	52	41	30	25	27	8	3	3	2	2	2	1	1	2	2	13	A	17.6	51.5	
28-Feb-05	20	29	23	42	33	32	38	67	82	40	8	8	14	11	5	3	5	10	38	13	10	61	A	60	28.4	81.9	
																										N	0.0
																										N	0.0
																										N	0.0
Hourly Avg	19.5	17.7	15.5	22.1	20.5	20.1	23.5	25.9	23.5	16.5	11.0	8.7	7.8	7.3	7.1	7.7	8.2	12.3	19.8	24.1	27.0	31.9	31.5	26.4			
Hourly Max	96.8	95.9	53.6	109.4	84.6	86.8	75.5	67.2	81.9	54.4	35.1	27.1	19.0	18.5	20.4	18.0	15.7	30.7	81.5	119.5	99.6	135.0	97.7	84.5			



Station: Crescent Heights

HOURLY MAXIMUM TABLE

Oxides of Nitrogen (NO_x)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Maximum 1-hr Value:	410.0	ppb	12-Feb	3:00 4:00
Maximum 24-hr Value:	103.6	ppb	25-Feb	

AIC Time:	30 hrs							Operational Time:	625 hrs						
Calibration Time:	5 hrs							AMD Operational Uptime:	98.2%						
Percentile	99	95	75	50	25	5	1	Average							
	258	156	68	29	10	3	1	49.0 ppb							

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	24-hour Average	Daily Maximum	
Hour End	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	0:00			
1-Feb-05	46	66	67	120	15	137	43	13	9	131	45	35	8	72	17	155	94	11	13	A	10	6	63	96	55.2	155.4	
2-Feb-05	81	3	4	7	7	3	8	15	6	25	5	5	5	8	17	17	11	15	A	153	95	101	29	11	27.4	153.4	
3-Feb-05	9	58	9	14	51	15	65	104	48	44	17	52	9	105	12	8	114	A	12	47	35	7	9	11	37.1	114.2	
4-Feb-05	6	4	6	6	5	4	6	5	7	5	4	4	3	3	4	8	A	16	10	5	6	11	8	6	6.2	16.3	
5-Feb-05	4	10	3	4	4	3	7	5	3	5	5	3	4	6	11	A	23	11	17	44	9	56	12	10	11.2	55.8	
6-Feb-05	15	18	13	7	13	8	7	11	6	2	1	0	0	0	A	5	1	1	2	3	2	10	18	11	6.7	18.4	
7-Feb-05	9	11	8	11	22	33	26	31	33	44	41	27	18	A	159	80	19	15	64	16	161	62	35	15	40.9	160.9	
8-Feb-05	19	17	82	121	94	86	119	135	153	45	52	68	A	34	36	78	7	23	33	75	70	55	170	16	69.1	170.3	
9-Feb-05	181	11	5	10	10	6	69	50	89	51	24	A	51	8	37	80	130	65	131	15	29	34	20	13	48.7	181.4	
10-Feb-05	133	10	47	7	19	45	138	155	126	14	A	25	85	7	7	87	35	31	64	100	14	83	67	6	56.7	155.2	
11-Feb-05	84	7	188	7	28	13	146	20	29	A	15	27	10	13	10	33	25	68	216	57	128	61	203	129	66.0	215.7	
12-Feb-05	290	53	257	410	216	114	60	131	A	156	17	10	10	48	25	32	13	29	N	N	N	N	N	N	N	N	410.0
13-Feb-05	N	N	N	31	45	48	29	A	44	12	33	18	11	8	6	5	4	9	6	9	35	46	42	10	22.5	47.8	
14-Feb-05	2	2	3	4	5	7	A	82	78	86	68	N	10	54	10	37	19	43	35	67	78	133	213	60	49.8	212.6	
15-Feb-05	28	6	13	13	16	89	136	25	21	A	34	22	33	15	18	17	10	22	48	63	30	24	116	73	37.9	136.2	
16-Feb-05	65	152	102	92	108	111	20	149	A	C	C	46	47	39	9	N	N	C	C	C	A	345	114	93	N	345.2	
17-Feb-05	93	67	46	42	39	42	43	75	66	A	39	26	14	15	13	14	15	33	36	79	72	76	79	89	48.4	93.2	
18-Feb-05	142	305	78	62	30	41	84	52	92	A	7	5	3	2	17	10	86	13	3	1	3	3	1	1	45.3	305.0	
19-Feb-05	0	1	1	1	6	19	20	34	A	40	19	8	48	8	13	17	19	10	12	15	25	4	3	8	14.3	47.8	
20-Feb-05	19	25	12	14	33	12	21	A	45	14	21	66	34	4	53	115	27	54	175	45	121	74	106	95	51.5	175.0	
21-Feb-05	37	39	35	24	37	50	A	35	52	102	28	28	24	19	13	6	13	16	87	156	42	81	153	56	49.2	156.0	
22-Feb-05	63	99	99	59	97	A	258	204	75	72	5	12	24	8	16	7	8	27	17	17	47	138	213	132	73.9	258.0	
23-Feb-05	223	45	20	42	A	177	87	89	82	32	79	8	31	12	9	19	21	52	88	86	40	91	13	12	58.9	222.6	
24-Feb-05	88	11	85	A	11	54	142	94	19	9	60	200	9	8	54	11	10	16	60	43	106	57	72	140	59.1	200.3	
25-Feb-05	62	166	A	123	183	189	251	65	41	21	15	26	28	19	17	86	16	36	91	332	240	105	161	110	103.6	332.4	
26-Feb-05	45	A	34	40	38	30	220	58	77	29	26	22	16	26	8	9	14	15	34	47	107	83	101	164	54.0	219.8	
27-Feb-05	A	48	27	60	92	50	110	84	134	36	30	104	20	4	5	2	3	3	2	3	3	6	43	A	39.5	134.2	
28-Feb-05	40	34	30	81	59	40	56	135	106	77	20	11	33	53	10	6	28	17	85	42	15	266	A	88	57.9	265.6	
																										N	0.0
																										N	0.0
																										N	0.0
Hourly Avg	68.6	48.8	49.0	52.3	47.6	52.8	83.4	71.3	57.6	45.7	27.2	33.0	21.7	22.1	22.4	36.3	29.5	24.9	53.6	60.8	58.5	74.7	79.4	56.0			
Hourly Max	290.2	305.0	257.0	410.0	215.9	188.9	258.0	204.1	153.1	155.5	78.7	200.3	85.3	104.9	159.0	155.4	129.9	67.7	215.7	332.4	239.9	345.2	213.2	164.2			

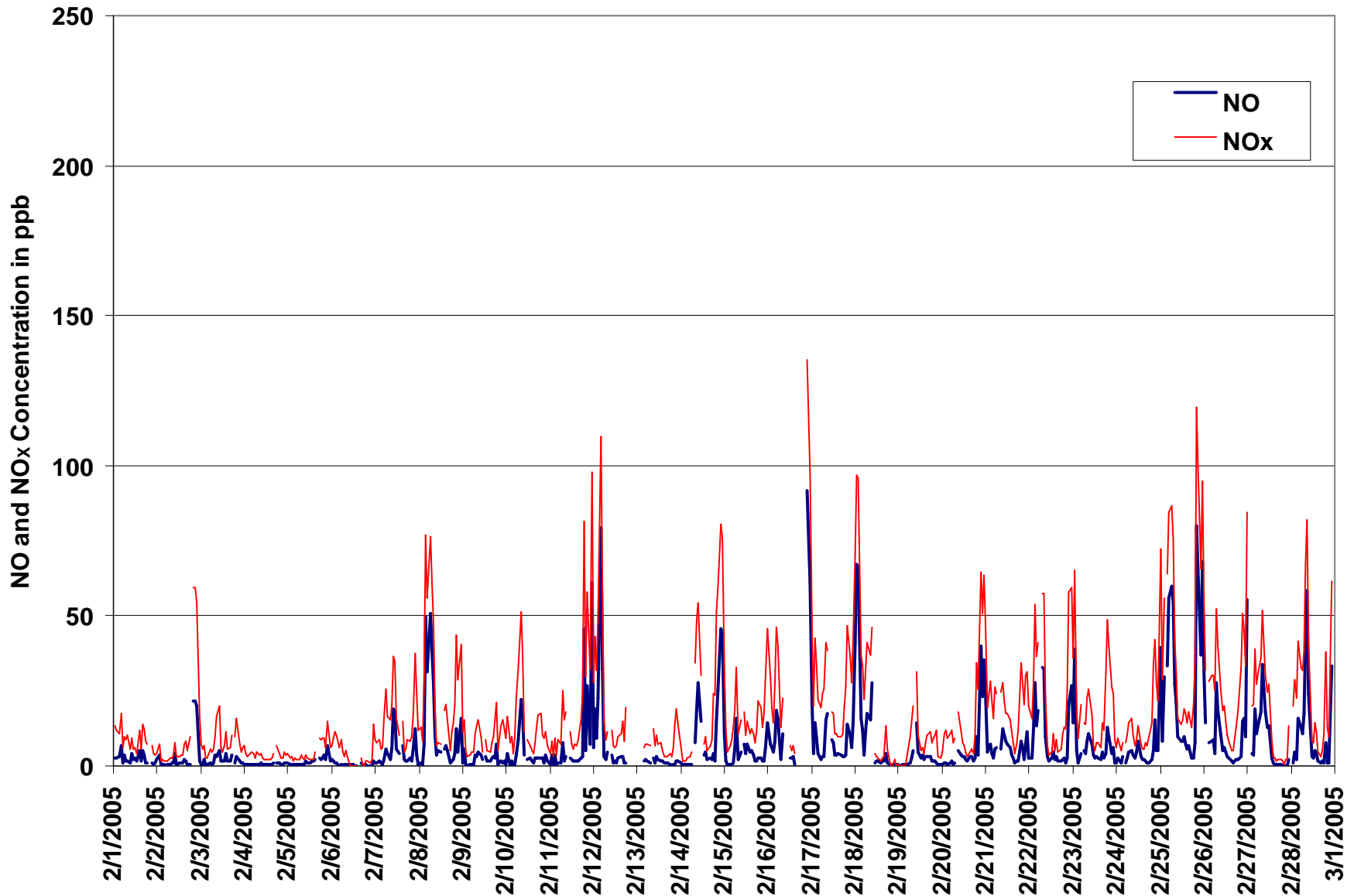


Figure 3. PAS - Crescent Heights Oxides of Nitrogen 1-hr Average Monthly Trends

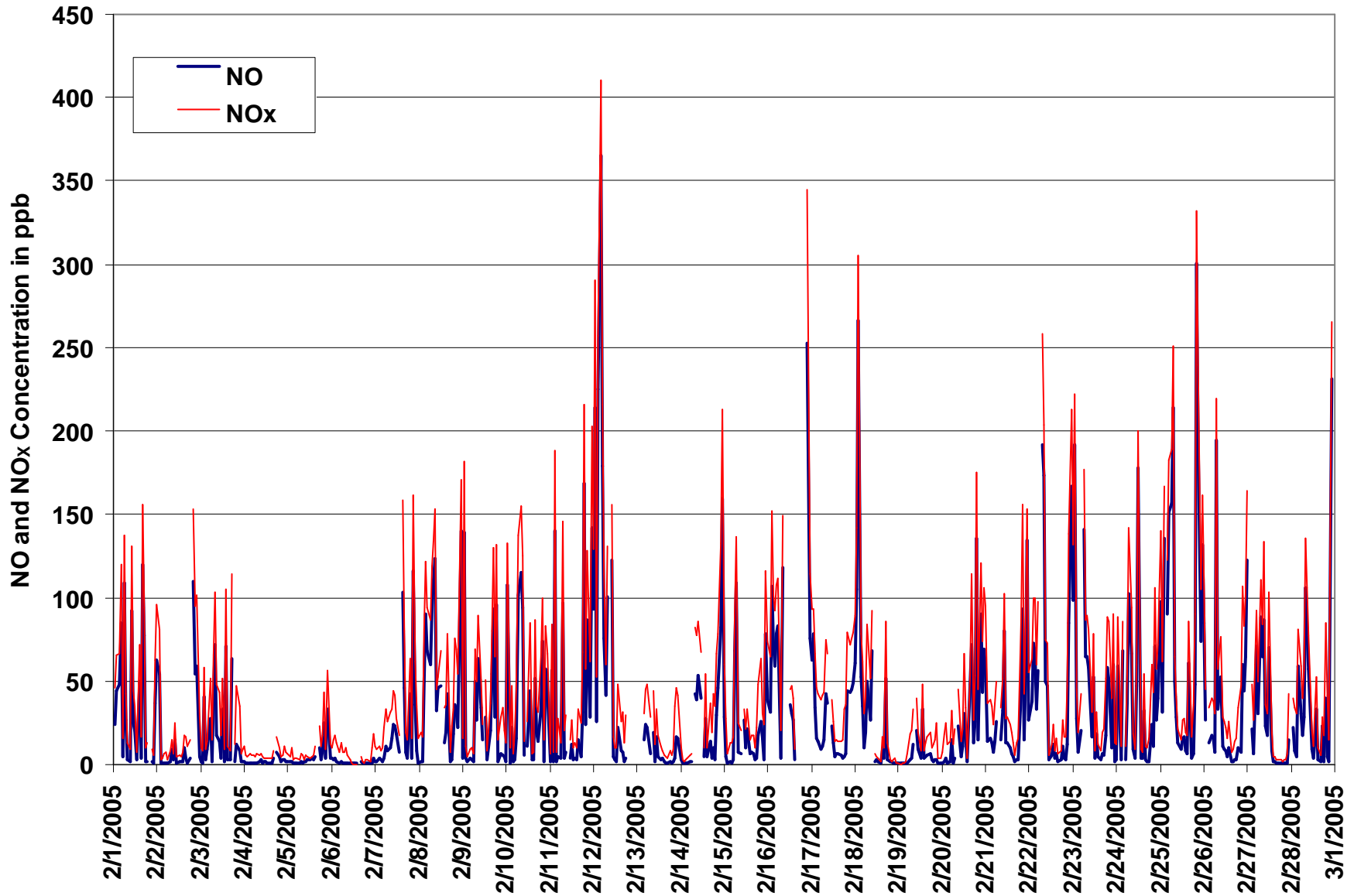


Figure 4. PAS - Crescent Heights Oxides of Nitrogen 1-hr Maximum Value Monthly Trends



PAS - Crescent Heights Ozone Monthly Summary

Station: Crescent Heights

HOURLY AVERAGE TABLE

Ozone (O₃)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Number of 1-hr Exceedances:	0			
Number of 24-hr Exceedances:	0			
Maximum 1-hr Average:	46	ppb	28-Feb	15:00 16:00
Maximum 24-hr Average:	31	ppb	13-Feb	

Guideline Limit: Alberta Environment: 1-hr 82 ppb 24-hr na ppb

AIC Time:	31 hrs							Operational Time:	627 hrs						
Calibration Time:	2 hrs							AMD Operational Uptime:	98.2%						
Percentile	99	95	75	50	25	5	1	Average							
	44	39	32	25	13	2	1	22.4 ppb							

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	24-hour Average	Daily Maximum	
Hour End	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	0:00			
1-Feb-05	2	17	18	15	24	25	23	22	27	26	28	31	35	35	37	31	29	30	30	A	31	32	34	34	26.7	37.1	
2-Feb-05	31	33	38	39	39	39	38	38	38	38	39	40	40	40	37	35	38	31	A	6	2	3	17	23	31.4	40.2	
3-Feb-05	24	28	32	31	29	33	31	28	24	28	37	38	34	33	37	34	32	A	29	24	33	34	29	26	30.8	37.9	
4-Feb-05	29	30	27	25	24	25	23	24	23	24	26	25	25	25	25	24	A	23	24	24	23	22	25	25	24.8	30.4	
5-Feb-05	26	26	27	27	28	29	27	29	30	29	30	31	31	32	30	A	28	26	26	28	27	24	24	24	27.8	31.5	
6-Feb-05	21	18	19	20	18	21	20	20	25	29	31	34	36	37	A	35	35	33	30	28	26	24	13	17	25.6	37.2	
7-Feb-05	18	16	18	16	8	2	8	7	6	5	9	23	27	A	32	34	33	28	27	21	18	6	8	14	16.7	34.4	
8-Feb-05	14	16	5	1	1	1	1	2	14	18	19	19	A	22	23	28	38	27	23	17	6	13	7	18	14.5	37.5	
9-Feb-05	15	19	22	23	23	23	20	20	19	26	31	A	33	38	40	38	35	27	23	35	26	24	26	28	26.8	40.0	
10-Feb-05	20	23	24	29	22	10	7	3	12	22	A	31	32	36	42	39	32	25	24	29	27	26	29	28	24.9	41.5	
11-Feb-05	27	30	30	34	30	29	21	22	24	A	35	42	44	42	45	42	31	21	7	10	4	9	2	5	25.6	44.7	
12-Feb-05	4	6	3	2	8	17	22	24	A	27	28	26	35	36	37	36	37	26	N	N	N	N	N	N	N	N	37.4
13-Feb-05	N	N	N	28	28	26	28	A	27	27	28	31	31	38	44	43	43	40	39	34	24	20	21	29	31.4	44.3	
14-Feb-05	37	37	37	35	35	33	A	14	12	16	25	N	36	36	39	38	35	20	16	2	1	1	2	10	23.4	39.2	
15-Feb-05	23	31	28	26	23	20	17	26	26	A	31	34	33	35	34	35	36	32	21	20	25	18	10	3	25.6	36.4	
16-Feb-05	12	17	18	9	2	4	14	15	A	20	C	27	29	32	33	N	N	27	15	6	C	A	A	6	N	33.0	
17-Feb-05	11	2	6	11	14	11	9	5	9	A	22	28	33	35	37	36	34	24	16	4	9	13	4	1	16.3	36.7	
18-Feb-05	1	2	1	1	5	2	3	2	9	A	32	32	32	35	35	39	34	34	33	33	31	29	32	33	21.4	38.9	
19-Feb-05	32	31	30	29	25	19	13	10	A	15	23	27	26	25	22	21	21	25	25	24	22	29	31	30	24.1	32.3	
20-Feb-05	25	25	28	25	24	26	24	A	18	25	29	32	34	35	35	36	36	29	14	11	7	1	1	6	22.9	35.8	
21-Feb-05	8	2	4	7	5	7	A	5	8	11	15	21	30	32	37	40	37	31	16	18	16	11	10	9	16.5	40.5	
22-Feb-05	12	10	1	1	4	A	4	4	21	29	30	30	28	36	34	41	40	35	32	29	17	5	4	9	19.9	40.8	
23-Feb-05	1	9	16	9	A	21	19	14	14	22	28	28	31	33	37	29	34	15	5	6	9	12	22	25	19.0	36.7	
24-Feb-05	25	24	21	A	20	19	17	17	21	24	24	25	28	35	45	45	44	33	27	7	10	13	16	2	23.5	44.5	
25-Feb-05	10	2	A	1	1	1	1	2	5	10	12	17	19	24	26	28	30	24	15	2	1	1	1	2	10.1	29.8	
26-Feb-05	1	A	3	2	3	5	2	3	11	17	18	26	32	37	41	42	37	31	27	14	6	6	6	2	16.2	42.1	
27-Feb-05	A	9	5	2	4	1	1	1	6	10	16	21	35	41	42	42	42	41	40	39	36	35	22	A	22.2	42.1	
28-Feb-05	14	5	7	1	4	3	2	2	5	11	31	35	34	38	44	46	44	37	16	25	26	11	A	2	19.2	45.9	
																										N	0.0
																										N	0.0
																										N	0.0
Hourly Avg	17.1	18.0	17.9	16.7	16.7	16.7	15.3	13.8	17.2	21.3	26.2	29.0	32.0	34.2	36.0	36.1	35.1	28.7	23.0	19.1	17.9	16.2	15.8	15.8			
Hourly Max	36.7	37.2	37.5	38.9	38.8	38.7	37.8	37.7	37.9	38.4	39.5	42.5	44.5	41.9	44.7	45.9	44.1	40.8	40.2	38.5	35.7	34.5	34.0	34.1			

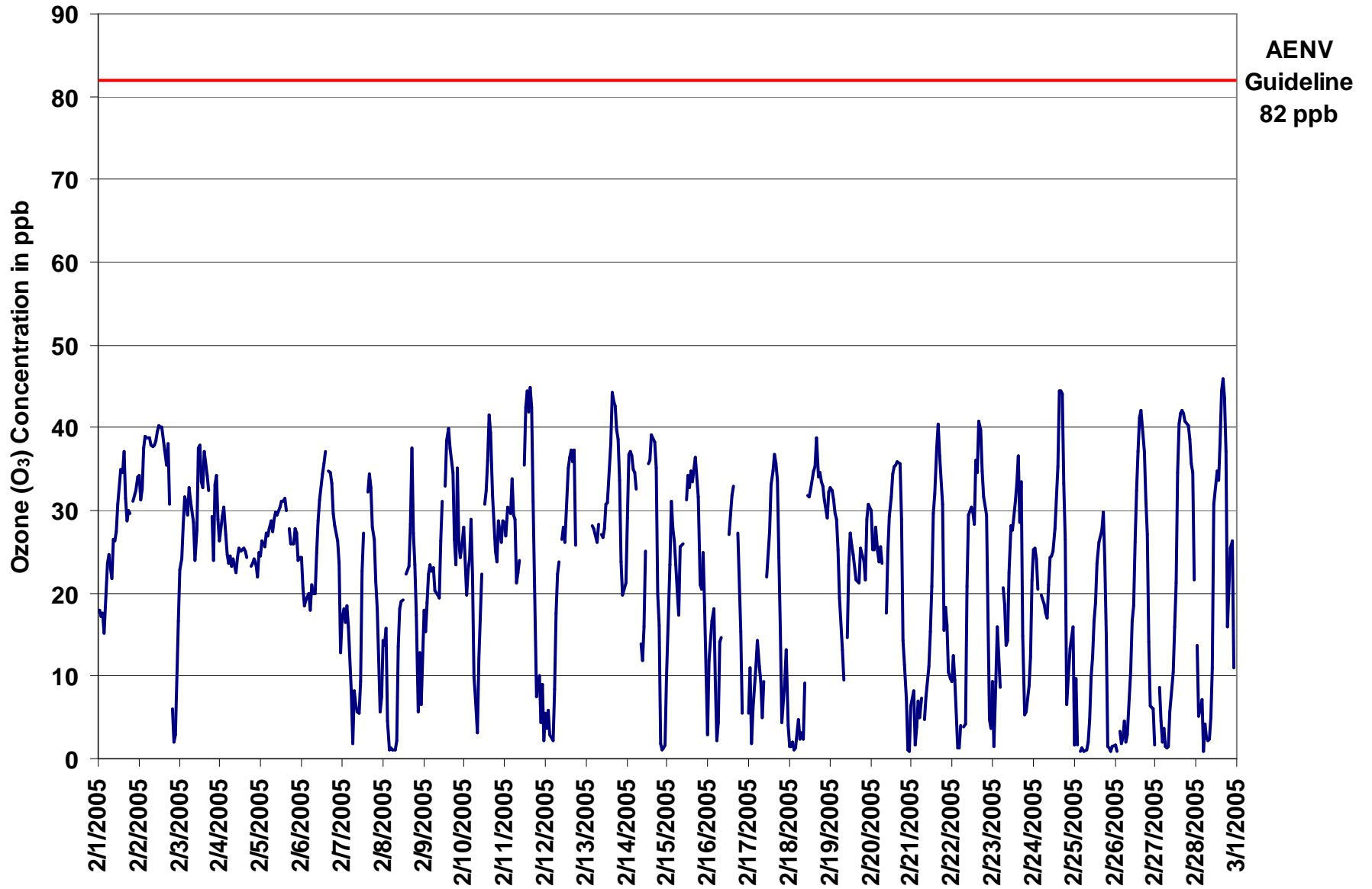


Figure 5. PAS - Crescent Heights Ozone 1-hr Average Monthly Trend



Station: Crescent Heights

HOURLY MAXIMUM TABLE

Ozone (O₃)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005
Summary

Maximum 1-hr Value:	50.0	ppb	11-Feb	14:00 15:00
Maximum 24-hr Value:	36.4	ppb	13-Feb	

AIC Time:	31 hrs	Operational Time:	627 hrs					
Calibration Time:	2 hrs	AMD Operational Uptime:	98.2%					
Percentile	99	95	75	50	25	5	1	Average
	47	43	36	29	20	4	2	26.8 ppb

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day	Mountain Standard Time																								24-hour Average	Daily Maximum		
	Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00			23:00	0:00
1-Feb-05	Hour End	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	0:00			
1-Feb-05		24	20	21	19	27	28	27	26	28	28	29	34	38	39	40	37	32	33	33	A	33	34	36	36	30.5	40.2	
2-Feb-05		34	36	41	41	40	40	39	39	40	41	42	41	42	42	39	41	38	A	28	6	9	24	26	35.1	41.8		
3-Feb-05		29	32	33	32	37	36	33	32	32	41	42	40	37	38	40	38	40	A	32	33	37	37	34	30	35.4	41.6	
4-Feb-05		31	32	31	26	26	26	25	27	25	27	27	26	27	27	26	26	A	25	25	26	25	24	27	28	26.7	32.4	
5-Feb-05		28	29	29	28	29	30	30	31	31	31	32	32	33	33	33	A	30	28	29	30	30	27	27	26	29.8	32.9	
6-Feb-05		25	24	22	22	21	22	22	24	28	32	35	36	37	38	A	37	36	36	31	29	28	26	15	19	28.0	38.4	
7-Feb-05		20	19	20	19	12	4	12	10	9	7	15	34	35	A	37	37	36	34	30	24	22	17	18	18	21.3	37.3	
8-Feb-05		20	20	11	2	2	2	5	18	20	20	21	A	27	30	40	40	36	28	24	13	20	18	21	19.2	40.3		
9-Feb-05		20	22	24	26	28	25	25	23	25	31	33	A	36	43	43	40	39	32	29	38	34	33	30	31	30.8	42.8	
10-Feb-05		30	26	30	31	29	21	13	5	21	28	A	33	35	44	44	44	39	30	29	32	31	33	34	32	30.1	43.8	
11-Feb-05		30	32	32	38	37	32	28	27	29	A	43	47	48	47	50	46	44	26	25	19	15	19	6	9	31.6	50.0	
12-Feb-05		10	12	11	8	18	22	25	27	A	29	30	29	40	40	45	45	42	36	N	N	N	N	N	N	N	N	44.9
13-Feb-05		N	N	N	31	31	31	36	A	31	29	33	35	34	45	46	45	45	43	42	38	33	29	33	36	36.4	46.3	
14-Feb-05		39	39	38	36	37	35	A	27	21	21	37	N	38	39	41	40	38	31	23	12	2	2	4	26	28.5	41.5	
15-Feb-05		31	33	32	28	28	26	30	31	31	A	35	37	37	37	37	39	40	36	32	28	30	26	20	12	31.1	40.0	
16-Feb-05		21	21	23	17	7	10	18	18	A	24	C	30	31	36	37	N	N	33	24	12	C	A	A	15	N	37.1	
17-Feb-05		16	6	15	17	17	18	14	10	17	A	27	34	36	37	39	38	38	32	24	18	17	20	13	3	22.0	39.1	
18-Feb-05		3	5	2	3	8	10	9	5	18	A	33	34	34	37	38	43	41	37	35	34	34	31	34	34	24.4	43.1	
19-Feb-05		34	33	31	30	28	27	16	13	A	21	27	31	31	27	25	24	25	28	28	28	28	30	32	31	27.3	33.5	
20-Feb-05		30	31	31	30	30	30	29	A	22	29	30	34	36	37	37	38	38	37	24	19	18	2	2	13	27.3	38.4	
21-Feb-05		14	4	7	9	8	10	A	7	10	14	18	25	34	37	43	42	40	36	32	30	21	22	17	15	21.5	43.5	
22-Feb-05		17	17	5	3	11	A	11	12	30	32	32	32	35	39	44	46	42	39	35	34	26	25	14	25	26.3	45.5	
23-Feb-05		3	16	18	14	A	23	22	20	18	30	30	29	36	39	41	32	40	29	14	17	13	18	24	29	24.2	40.8	
24-Feb-05		28	27	23	A	22	21	21	24	26	26	27	31	41	48	48	47	41	32	11	26	27	25	4	28.2	47.9		
25-Feb-05		19	7	A	3	4	2	3	4	8	12	14	20	25	26	28	34	34	34	25	3	2	2	3	5	13.8	33.9	
26-Feb-05		3	A	8	5	5	9	8	9	14	22	23	30	36	42	45	44	42	35	32	25	22	14	13	3	21.3	44.8	
27-Feb-05		A	12	8	6	7	3	3	3	9	15	22	26	39	43	44	43	44	42	41	41	37	37	31	A	25.2	43.6	
28-Feb-05		21	8	12	4	9	8	6	4	10	20	36	37	36	45	48	48	46	45	36	30	31	23	A	3	24.7	48.3	
																										N	0.0	
																										N	0.0	
																										N	0.0	
Hourly Avg		22.3	21.7	21.4	19.6	20.8	20.5	19.4	17.7	21.8	25.3	29.6	32.2	35.4	38.0	39.7	39.7	39.3	34.5	29.7	25.5	23.7	22.5	21.3	20.3			
Hourly Max		38.9	38.5	40.6	40.9	40.0	39.8	39.4	38.6	39.6	40.7	43.0	47.0	48.0	47.4	50.0	47.9	47.2	44.8	42.3	41.2	37.0	36.9	35.8	36.5			

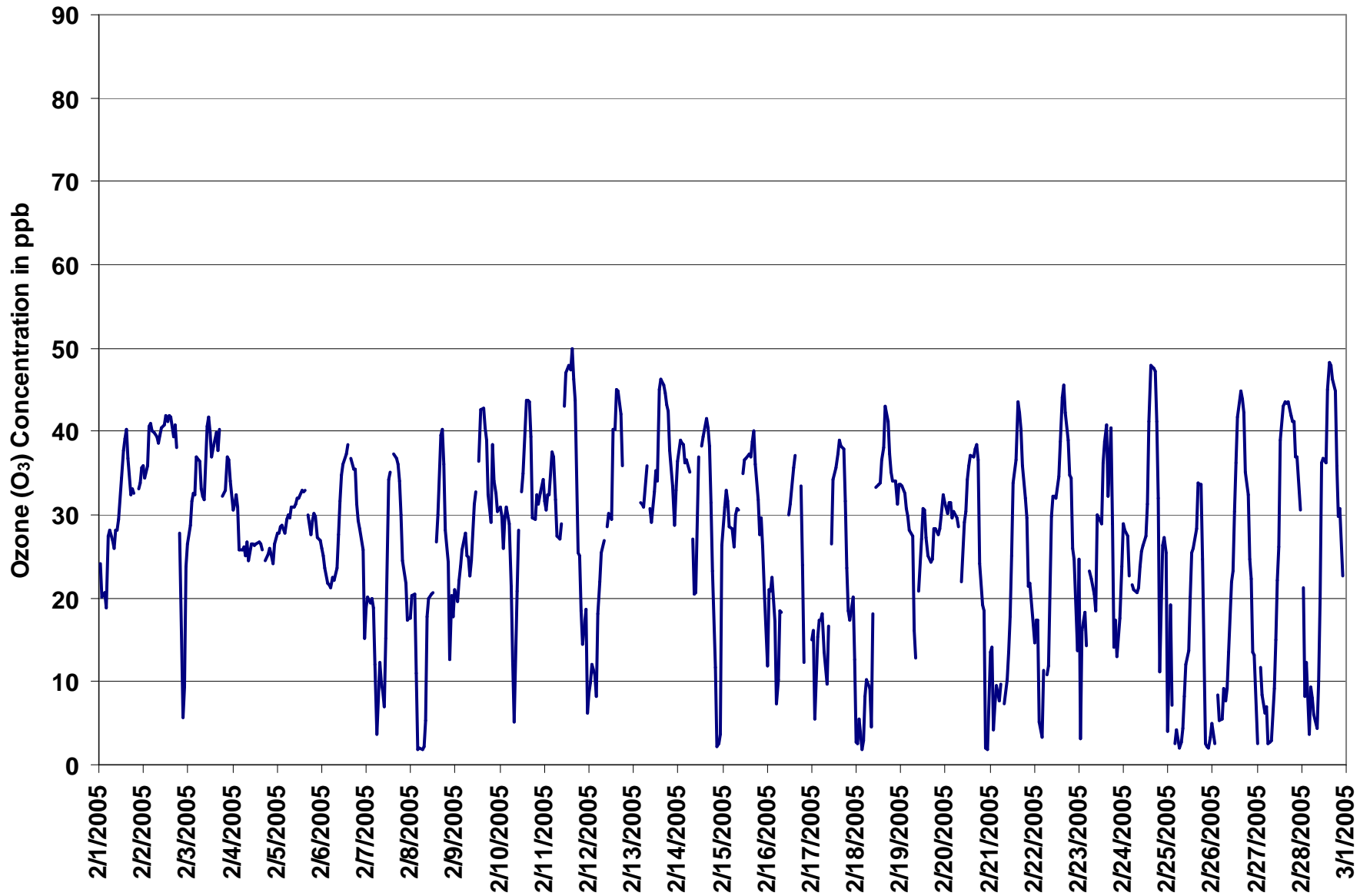


Figure 6. PAS - Crescent Heights Ozone 1-hr Maximum Value Monthly Trend



Station: Crescent Heights

EIGHT HOUR RUNNING AVERAGE TABLE

Ozone (O₃)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Number of 8-hr Exceedances:	0						
Maximum 8-hr Average:	40.4	ppb	11-Feb	16:00	17:00		

Guideline Limit: Canada Wide Standard

8-hr 65 ppb

Percentile	99	95	75	50	25	5	1
	38.9	35.5	30.1	24.1	15.4	4.6	2.3

Status Flag Characters

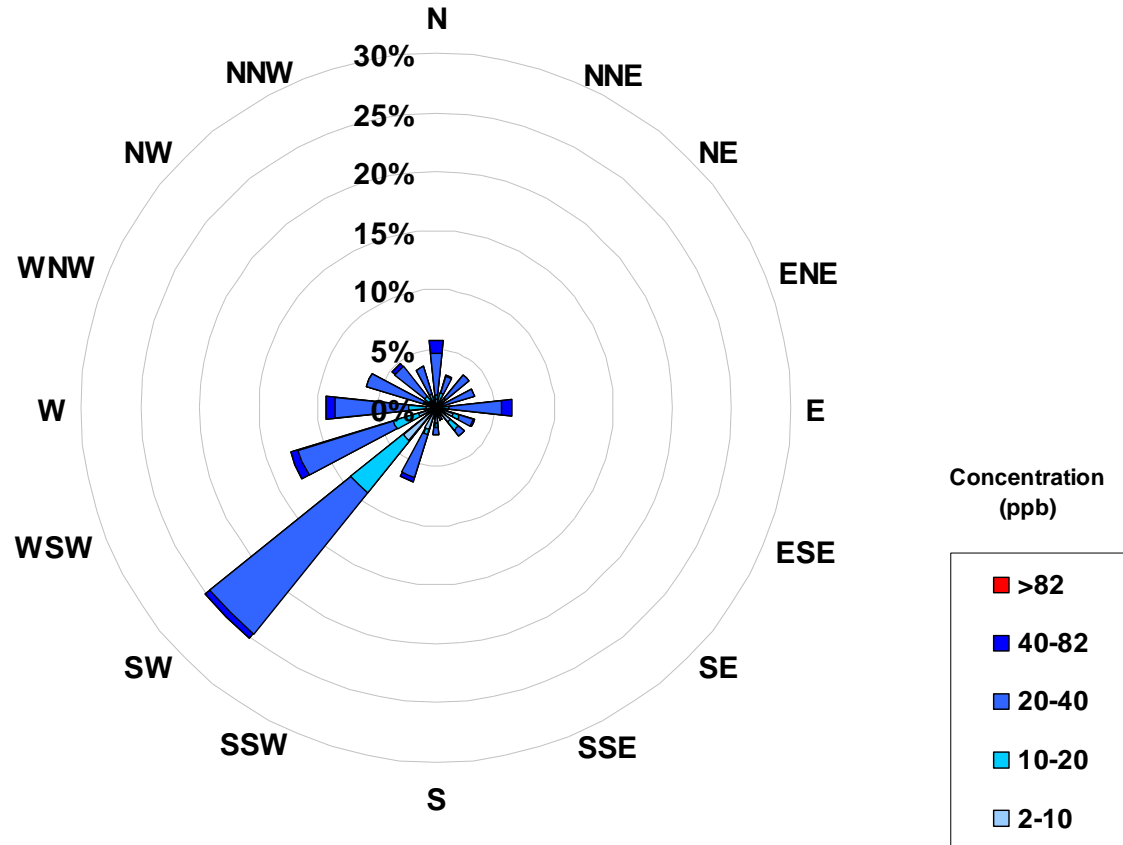
C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Hour Start Hour End	0:00 1:00	1:00 2:00	2:00 3:00	3:00 4:00	4:00 5:00	5:00 6:00	6:00 7:00	7:00 8:00	8:00 9:00	9:00 10:00	10:00 11:00	11:00 12:00	12:00 13:00	13:00 14:00	14:00 15:00	15:00 16:00	16:00 17:00	17:00 18:00	18:00 19:00	19:00 20:00	20:00 21:00	21:00 22:00	22:00 23:00	23:00 0:00	24-hour Average	Daily Maximum	
1-Feb-05	18	24	22	21	22	21	21	20	21	22	24	26	27	28	30	31	31	32	32	32	32	31	31	31	26.3	32.3	
2-Feb-05	32	32	33	34	35	36	36	37	37	38	38	39	39	39	39	39	39	38	37	33	27	22	19	17	33.9	38.9	
3-Feb-05	15	15	17	20	23	27	29	30	30	30	30	31	32	32	32	33	34	35	34	32	32	32	31	30	28.5	35.1	
4-Feb-05	29	29	29	29	28	27	26	26	25	24	24	24	24	24	25	25	25	25	25	24	24	24	24	24	25.6	29.4	
5-Feb-05	24	24	25	25	26	27	27	27	28	28	29	29	30	30	30	30	30	30	29	29	28	27	26	26	27.7	30.5	
6-Feb-05	25	24	23	22	21	21	20	20	20	21	23	25	27	29	30	32	34	34	34	33	32	30	28	26	26.5	34.4	
7-Feb-05	24	22	20	19	16	14	13	12	10	9	8	8	11	12	16	20	23	27	29	29	28	25	22	19	18.1	29.1	
8-Feb-05	17	15	13	10	8	7	7	5	5	5	7	9	11	14	17	21	24	25	26	26	23	22	20	19	14.8	25.9	
9-Feb-05	16	15	15	15	17	19	20	21	21	22	23	23	25	27	30	32	34	34	33	34	33	31	29	28	24.9	34.4	
10-Feb-05	26	26	26	25	25	23	20	17	16	16	15	15	17	21	25	31	33	34	33	32	32	30	29	28	24.8	33.9	
11-Feb-05	27	28	28	29	29	30	29	28	27	27	28	29	31	33	36	39	40	38	34	30	25	21	16	11	29.0	40.4	
12-Feb-05	8	6	5	4	5	6	9	11	12	15	18	22	26	28	30	32	33	33	33	N	N	N	N	N	17.7	33.4	
13-Feb-05	N	N	N	N	N	N	N	N	N	N	27	28	28	30	32	34	36	37	39	39	38	36	33	31	N	38.9	
14-Feb-05	30	30	30	30	31	33	35	32	29	26	24	N	N	N	25	29	32	33	31	28	23	19	14	11	27.4	34.5	
15-Feb-05	9	11	12	15	18	21	22	24	25	24	24	25	27	29	31	33	34	34	32	31	30	28	25	21	24.4	34.0	
16-Feb-05	18	16	15	14	11	9	10	11	11	12	N	N	N	N	N	N	N	N	N	N	N	N	N	N	N	17.7	17.7
17-Feb-05	N	N	N	N	N	9	9	9	8	9	12	14	17	20	24	28	32	31	30	27	24	22	17	13	18.7	31.9	
18-Feb-05	9	6	5	4	4	2	2	2	3	3	8	12	16	21	25	31	34	34	34	35	34	34	33	33	17.7	34.6	
19-Feb-05	32	32	31	31	30	29	27	24	22	20	19	19	19	20	21	23	22	24	24	24	23	24	25	26	24.6	32.3	
20-Feb-05	26	26	27	27	27	26	25	24	24	24	25	27	28	30	31	33	33	33	31	29	25	21	17	13	26.1	33.3	
21-Feb-05	10	6	5	5	4	5	6	5	5	7	8	10	14	17	20	24	28	30	30	30	28	26	22	18	15.2	30.4	
22-Feb-05	15	13	11	9	7	7	6	5	6	9	13	17	21	23	27	31	34	34	34	34	33	29	25	21	19.5	34.5	
23-Feb-05	16	13	11	9	8	10	12	13	14	16	18	21	22	24	26	28	30	29	26	24	21	18	16	16	18.4	30.2	
24-Feb-05	15	16	18	20	21	22	22	20	20	20	20	21	22	24	27	31	34	35	35	33	31	28	24	19	24.1	35.2	
25-Feb-05	15	11	8	8	6	5	2	3	2	3	4	6	8	11	14	17	21	22	23	21	19	16	13	9	11.1	22.7	
26-Feb-05	6	3	2	2	2	2	2	3	4	6	7	10	14	18	23	28	31	33	34	33	30	26	21	16	14.9	34.3	
27-Feb-05	13	10	7	5	5	4	3	3	4	4	5	8	12	16	21	27	31	35	38	40	40	39	37	36	18.5	40.2	
28-Feb-05	32	27	22	17	12	8	5	5	4	4	7	12	15	20	25	30	35	39	37	36	35	31	29	23	21.3	38.5	
																									N	0.0	
																									N	0.0	
																									N	0.0	
Hourly Avg	19.5	18.5	17.7	17.3	17.0	16.6	16.5	16.2	16.1	16.5	18.2	19.6	21.5	23.8	26.4	29.2	31.4	32.2	31.9	30.6	28.8	26.6	24.1	21.7			
Hourly Max	32.3	32.2	33.3	34.0	34.9	35.7	36.2	36.7	37.5	38.2	38.5	38.6	38.8	38.9	38.9	39.3	40.4	38.5	38.5	40.0	40.2	39.4	36.9	36.2			



Concentration Rose for the 1-hr O₃ Average Concentration Occurrences at the Crescent Heights Site for February 2005



Frequency Distribution of O ₃ in ppb			
Range			Frequency (hrs)
0	<	2	43
2	to	10	95
10	to	20	94
20	to	40	367
40	to	82	28
	>	82	0
Total Non-Zero Values			627

Calms	
Range	ppb
2-10	0.0%
10-20	0.0%
20-40	0.0%
40-82	0.0%
>82	0.0%



PAS - Crescent Heights Total Hydrocarbon Monthly Summary

Station: Crescent Heights

HOURLY AVERAGE TABLE

Total HydroCarbons (THC)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Number of 1-hr Exceedances:	0
Number of 24-hr Exceedances:	0
Maximum 1-hr Average:	2.9 ppm 28-Feb 7:00 8:00
Maximum 24-hr Average:	2.3 ppm 16-Feb

Guideline Limit: Alberta Environment: 1-hr na ppm 24-hr na ppm

AIC Time:	29 hrs	Operational Time:	626 hrs					
Calibration Time:	5 hrs	AMD Operational Uptime:	98.2%					
Percentile	99	95	75	50	25	5	1	Average
	2.7	2.4	2.1	1.9	1.8	1.7	1.6	1.97 ppb

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	24-hour Average	Daily Maximum	
1-Feb-05	1.9	1.8	1.9	1.9	1.8	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.8	1.8	1.8	1.7	A	1.7	1.7	1.7	1.6	1.75	1.89
2-Feb-05	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.7	1.7	1.7	1.7	1.8	A	2.0	2.0	2.0	1.9	2.0	1.70	2.02
3-Feb-05	1.8	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.6	1.6	1.7	1.7	1.6	1.7	1.6	A	1.7	1.7	1.6	1.6	1.7	1.8	1.68	1.82	
4-Feb-05	1.8	1.8	1.9	1.9	1.9	2.0	2.0	1.9	1.9	1.8	1.8	1.7	1.7	1.7	1.7	1.7	A	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.78	2.00	
5-Feb-05	1.7	1.7	1.8	1.8	1.8	1.8	1.8	1.8	1.8	1.9	1.9	1.9	1.9	1.9	1.9	A	1.9	2.0	2.0	2.0	2.0	2.0	2.1	2.1	1.89	2.08	
6-Feb-05	2.1	2.1	2.1	2.2	2.2	2.1	2.1	2.1	2.1	2.0	2.0	1.9	1.9	1.9	A	2.0	2.0	2.0	2.0	2.0	2.0	2.1	2.2	2.2	2.06	2.22	
7-Feb-05	2.1	2.1	2.1	2.1	2.1	2.2	2.3	2.2	2.4	2.4	2.2	2.0	1.9	A	1.8	1.8	1.8	1.9	1.9	1.9	1.9	1.9	2.0	1.9	2.05	2.45	
8-Feb-05	1.9	1.9	2.0	2.2	2.6	2.4	2.4	2.2	2.0	1.9	1.9	1.9	A	2.0	1.9	1.9	1.8	1.9	1.9	2.0	2.1	2.2	2.1	2.0	2.05	2.58	
9-Feb-05	1.9	1.9	1.9	1.9	1.8	1.8	1.8	1.8	1.8	1.8	1.8	A	1.8	1.8	1.7	1.7	1.8	1.8	1.8	1.8	1.8	1.9	1.9	1.9	1.83	1.94	
10-Feb-05	2.0	1.9	1.9	1.9	1.9	2.0	2.0	2.0	1.9	1.9	A	1.9	1.8	1.8	1.8	1.8	1.8	1.9	1.8	1.9	1.9	1.8	1.8	1.8	1.88	2.04	
11-Feb-05	1.8	1.8	1.8	1.8	1.8	1.8	1.8	1.8	1.8	A	1.8	1.7	1.7	1.8	1.7	1.7	1.8	1.9	2.1	1.9	2.1	1.8	2.2	2.0	1.85	2.22	
12-Feb-05	2.1	2.1	2.1	2.0	2.2	1.8	1.7	1.6	A	1.7	1.6	1.7	1.6	1.6	1.6	1.6	1.7	1.8	N	N	N	N	N	N	N	N	2.18
13-Feb-05	N	N	N	1.7	1.6	1.7	1.7	A	1.7	1.7	1.7	1.7	1.7	1.8	1.8	1.7	1.7	1.7	1.7	1.8	1.8	1.8	1.9	2.0	1.9	1.75	1.98
14-Feb-05	1.8	1.8	1.9	1.9	2.0	2.1	A	2.0	2.1	2.1	2.0	N	1.9	1.9	1.9	1.9	1.9	2.0	1.9	2.1	2.1	2.3	2.5	2.3	2.02	2.51	
15-Feb-05	2.1	2.0	2.0	2.1	2.0	2.0	2.1	2.0	2.1	A	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.0	2.1	2.1	2.1	2.2	2.2	2.3	2.5	2.10	2.47
16-Feb-05	2.5	2.3	2.4	2.4	2.4	2.6	2.3	2.2	A	2.1	C	C	C	2.0	2.0	2.0	N	N	2.1	2.4	2.4	2.4	2.7	2.6	2.3	2.32	2.70
17-Feb-05	2.3	2.4	2.4	2.3	2.4	2.4	2.3	2.3	C	C	C	A	2.2	2.1	2.1	2.1	2.1	2.1	2.2	2.2	2.3	2.3	2.2	2.2	2.4	2.26	2.44
18-Feb-05	2.7	2.5	2.3	2.2	2.4	2.4	2.2	2.2	2.1	A	1.9	1.9	1.9	1.8	1.8	1.8	1.7	1.7	1.7	1.8	1.8	1.8	1.9	1.8	2.01	2.68	
19-Feb-05	1.9	1.9	1.9	1.9	1.9	1.9	2.1	2.2	A	2.0	1.8	1.8	1.8	1.8	1.8	1.8	1.9	1.9	1.8	1.8	1.8	1.8	1.8	1.9	1.88	2.19	
20-Feb-05	2.0	2.0	1.9	2.0	2.0	2.0	2.0	A	2.2	2.1	2.0	1.9	1.8	1.8	1.8	1.8	1.8	1.8	1.8	1.9	2.1	2.1	2.2	2.3	1.97	2.33	
21-Feb-05	2.2	2.3	2.3	2.1	2.2	2.2	A	2.6	2.5	2.4	2.3	2.1	1.9	1.9	1.8	1.8	1.8	1.9	1.9	2.0	2.1	2.1	2.3	2.4	2.13	2.57	
22-Feb-05	2.3	2.3	2.2	2.1	2.0	A	2.1	2.1	1.9	1.8	1.7	1.7	1.8	1.8	1.8	1.8	1.8	1.9	1.8	1.9	2.0	2.1	2.3	2.2	1.97	2.35	
23-Feb-05	2.5	2.5	2.1	2.0	A	1.9	1.9	2.1	2.0	1.9	1.8	1.8	1.8	1.8	1.8	2.0	1.9	2.0	2.0	2.2	2.3	2.2	2.2	2.0	2.03	2.51	
24-Feb-05	1.9	2.0	1.8	A	1.8	1.8	1.9	2.0	2.0	1.9	1.9	1.9	1.8	1.8	1.7	1.8	1.8	1.9	1.9	2.0	2.1	2.0	2.2	2.5	1.93	2.48	
25-Feb-05	2.0	2.0	A	2.3	2.4	2.5	2.6	2.5	2.4	2.3	2.4	2.2	2.2	2.0	2.0	2.0	1.9	1.9	2.0	2.2	2.2	2.2	2.4	2.5	2.23	2.62	
26-Feb-05	2.8	A	2.7	2.6	2.5	2.5	2.5	2.6	2.4	2.3	2.2	2.1	1.9	1.8	1.7	1.7	1.7	1.8	1.9	1.9	2.0	2.1	2.1	2.3	2.18	2.79	
27-Feb-05	A	2.0	2.1	2.1	2.1	2.2	2.2	2.2	2.1	2.1	2.0	1.9	1.9	1.7	1.7	1.7	1.8	1.9	1.9	1.8	1.8	1.8	A	1.9	1.95	2.17	
28-Feb-05	2.3	2.4	2.3	2.6	2.7	2.6	2.7	2.9	2.8	2.3	1.9	1.8	1.7	1.7	1.6	1.6	1.6	1.7	1.9	1.7	1.6	1.8	A	1.9	2.08	2.87	
																										N	0.00
																										N	0.00
																										N	0.00
Hourly Avg	2.08	2.04	2.04	2.05	2.07	2.06	2.05	2.09	2.03	1.96	1.90	1.86	1.85	1.82	1.80	1.80	1.82	1.88	1.91	1.94	1.98	2.01	2.09	2.09			
Hourly Max	2.79	2.51	2.66	2.58	2.72	2.57	2.67	2.87	2.78	2.45	2.37	2.24	2.17	2.09	2.12	2.06	2.06	2.16	2.39	2.39	2.43	2.70	2.59	2.49			

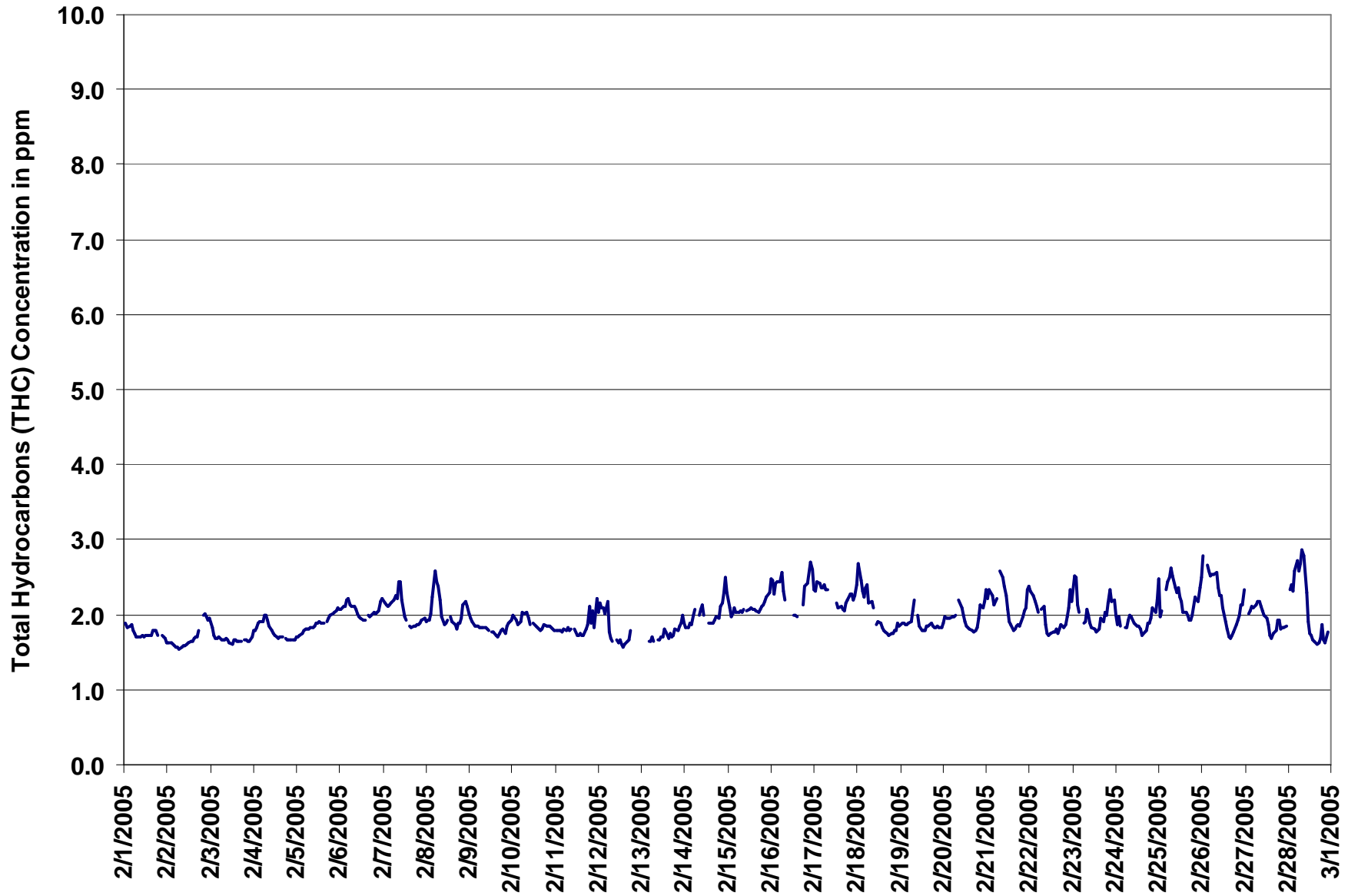


Figure 7. PAS - Crescent Heights Total Hydrocarbons 1-hr Average Monthly Trend



Station: Crescent Heights

HOURLY MAXIMUM TABLE

Total HydroCarbons (THC)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005
Summary

Maximum 1-hr Value:	3.8	ppm	28-Feb	6:00 7:00
Maximum 24-hr Value:	2.6	ppm	16-Feb	

AIC Time:	29 hrs	Operational Time:	626 hrs					
Calibration Time:	5 hrs	AMD Operational Uptime:	98.2%					
Percentile	99	95	75	50	25	5	1	Average
	3.0	2.7	2.2	2.0	1.8	1.7	1.6	2.1 ppm

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day	Mountain Standard Time																								24-hour Average	Daily Maximum		
	Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00			23:00	24:00
1-Feb-05	Hour End	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	0:00			
1-Feb-05		2.0	1.9	1.9	1.9	1.9	1.8	1.7	1.8	1.7	1.7	1.7	1.8	1.8	1.9	1.8	2.0	1.8	1.9	1.8	A	1.7	1.8	1.7	1.7	1.7	1.82	2.05
2-Feb-05		1.6	1.7	1.7	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.7	1.7	1.7	1.8	1.8	1.9	A	2.2	2.1	2.1	2.0	2.1	1.76	2.24	
3-Feb-05		1.9	1.8	1.7	1.7	1.8	1.7	1.7	1.8	1.7	1.7	1.6	1.7	1.7	1.7	1.7	1.7	1.7	A	1.7	1.7	1.7	1.7	1.8	1.9	1.73	1.92	
4-Feb-05		1.9	1.9	2.1	2.0	2.0	2.2	2.1	2.0	1.9	1.8	1.8	1.8	1.7	1.7	1.7	1.8	A	1.8	1.7	1.8	1.7	1.7	1.7	1.7	1.85	2.20	
5-Feb-05		1.8	1.8	1.8	1.8	1.8	1.8	1.8	1.9	1.9	1.9	1.9	2.0	2.1	1.9	1.9	A	2.1	2.0	2.0	2.1	2.2	2.1	2.2	2.2	1.96	2.19	
6-Feb-05		2.2	2.2	2.2	2.3	2.4	2.2	2.2	2.2	2.1	2.1	2.0	2.0	2.0	2.0	A	2.0	2.0	2.1	2.1	2.1	2.1	2.1	2.3	2.4	2.13	2.39	
7-Feb-05		2.3	2.2	2.2	2.2	2.2	2.2	2.4	2.3	3.0	2.8	2.3	2.1	2.0	A	1.9	1.9	1.9	1.9	1.9	1.9	1.9	2.0	2.0	2.0	2.16	2.96	
8-Feb-05		2.0	2.1	2.2	2.6	2.8	2.8	2.8	2.4	2.2	1.9	1.9	2.0	A	2.0	2.0	1.9	1.9	2.1	2.0	2.1	2.4	2.3	2.3	2.2	2.20	2.79	
9-Feb-05		2.0	2.0	1.9	1.9	1.9	1.9	1.9	1.9	1.9	1.8	1.8	A	1.8	1.8	1.8	1.8	1.8	1.9	1.8	1.9	1.9	1.9	2.1	1.9	1.87	2.10	
10-Feb-05		2.1	2.0	1.9	1.9	2.0	2.1	2.1	2.1	2.0	2.1	A	1.9	2.0	1.9	1.8	1.8	1.9	1.9	1.9	2.0	1.9	1.9	1.9	1.8	1.95	2.13	
11-Feb-05		1.8	1.8	1.8	1.8	1.9	1.8	1.9	1.8	1.9	A	1.9	1.8	1.8	1.8	1.8	1.8	1.9	2.2	2.8	2.0	2.4	1.9	2.7	2.1	1.98	2.75	
12-Feb-05		2.4	2.4	2.6	2.1	2.8	1.9	1.7	1.7	A	1.7	1.7	1.7	1.7	1.6	1.7	1.7	1.8	1.9	N	N	N	N	N	N	N	2.85	
13-Feb-05		N	N	N	1.7	1.7	1.8	1.8	A	1.7	1.7	1.8	1.8	1.9	1.9	1.7	1.8	1.8	1.8	1.9	1.8	2.0	2.0	2.2	2.0	1.83	2.17	
14-Feb-05		1.9	2.0	2.2	2.0	2.4	2.7	A	2.0	2.3	2.4	2.2	N	1.9	1.9	1.9	1.9	2.0	2.0	2.0	2.2	2.2	2.4	2.6	2.6	2.18	2.73	
15-Feb-05		2.2	2.1	2.1	2.1	2.1	2.1	2.1	2.1	2.1	A	2.1	2.1	2.1	2.1	2.1	2.1	2.2	2.2	2.2	2.2	2.3	2.3	2.4	2.8	2.19	2.84	
16-Feb-05		2.7	2.5	2.7	2.6	2.5	2.8	2.5	2.3	A	2.1	C	C	2.0	2.0	2.0	N	N	2.6	2.7	2.8	2.7	3.6	2.8	2.5	2.55	3.57	
17-Feb-05		2.5	2.6	2.5	2.4	2.4	2.4	2.4	2.6	C	C	C	A	2.2	2.1	2.2	2.1	2.1	2.4	2.3	2.3	2.6	2.4	2.4	2.9	2.39	2.92	
18-Feb-05		2.9	2.7	2.4	2.3	2.8	2.5	2.2	2.2	2.3	A	1.9	2.1	1.9	2.1	1.9	2.0	1.8	1.8	1.8	1.8	2.0	2.2	1.9	2.0	1.9	2.15	2.86
19-Feb-05		2.0	2.0	2.0	2.0	1.9	2.1	2.4	2.4	A	2.1	1.9	1.8	1.8	1.9	1.9	1.9	1.9	1.9	1.9	1.9	1.9	1.9	1.9	2.0	1.97	2.39	
20-Feb-05		2.0	2.0	2.0	2.0	2.0	2.0	2.1	A	2.3	2.2	2.0	2.0	1.9	1.9	1.8	1.8	1.8	1.8	2.0	2.1	2.4	2.1	2.4	2.6	2.06	2.61	
21-Feb-05		2.5	2.5	2.3	2.2	2.2	2.3	A	2.7	2.6	2.5	2.3	2.2	2.0	1.9	1.8	1.9	1.9	2.0	1.9	2.1	2.2	2.5	2.6	2.6	2.25	2.65	
22-Feb-05		2.4	2.4	2.2	2.3	2.2	A	2.2	2.4	2.1	1.8	1.7	1.8	1.8	1.8	1.9	1.8	1.9	1.9	1.9	2.0	2.1	2.4	2.5	2.5	2.09	2.51	
23-Feb-05		2.7	2.9	2.4	2.1	A	2.0	1.9	2.5	2.3	2.1	1.9	1.8	1.8	1.8	1.9	2.0	2.0	2.2	2.2	2.3	2.4	2.3	2.4	2.2	2.18	2.94	
24-Feb-05		1.9	2.1	1.9	A	1.9	1.8	2.1	2.1	2.0	2.1	2.0	1.9	1.9	1.9	1.8	1.8	1.9	2.0	2.2	2.1	2.4	2.3	2.3	2.7	2.05	2.71	
25-Feb-05		2.4	2.1	A	2.6	2.6	2.7	2.8	2.7	2.4	2.4	2.4	2.4	2.3	2.1	2.1	2.1	2.0	2.0	2.2	2.4	2.4	2.3	2.6	2.7	2.39	2.77	
26-Feb-05		2.9	A	3.0	3.0	2.6	2.9	2.7	2.6	2.6	2.4	2.3	2.2	2.0	1.9	1.8	1.8	1.8	1.9	2.0	2.1	2.2	2.3	2.3	2.6	2.34	2.99	
27-Feb-05		A	2.2	2.1	2.2	2.2	2.3	2.3	2.2	2.2	2.1	2.1	2.1	2.1	1.8	1.7	1.8	1.8	2.1	2.0	1.9	1.9	1.9	1.9	A	2.03	2.30	
28-Feb-05		2.8	2.5	2.7	3.2	3.1	2.9	3.8	3.7	3.1	2.6	2.1	1.8	1.8	1.7	1.7	1.6	1.7	2.1	2.5	1.8	1.7	2.0	A	2.0	2.39	3.84	
																											N	0.00
																											N	0.00
																											N	0.00
Hourly Avg		2.22	2.16	2.17	2.18	2.22	2.20	2.20	2.23	2.17	2.08	1.98	1.92	1.92	1.88	1.86	1.86	1.89	2.01	2.05	2.07	2.13	2.16	2.22	2.25			
Hourly Max		2.95	2.94	2.98	3.23	3.08	2.90	3.84	3.75	3.05	2.83	2.45	2.41	2.26	2.14	2.16	2.12	2.14	2.62	2.75	2.79	2.66	3.57	2.78	2.92			

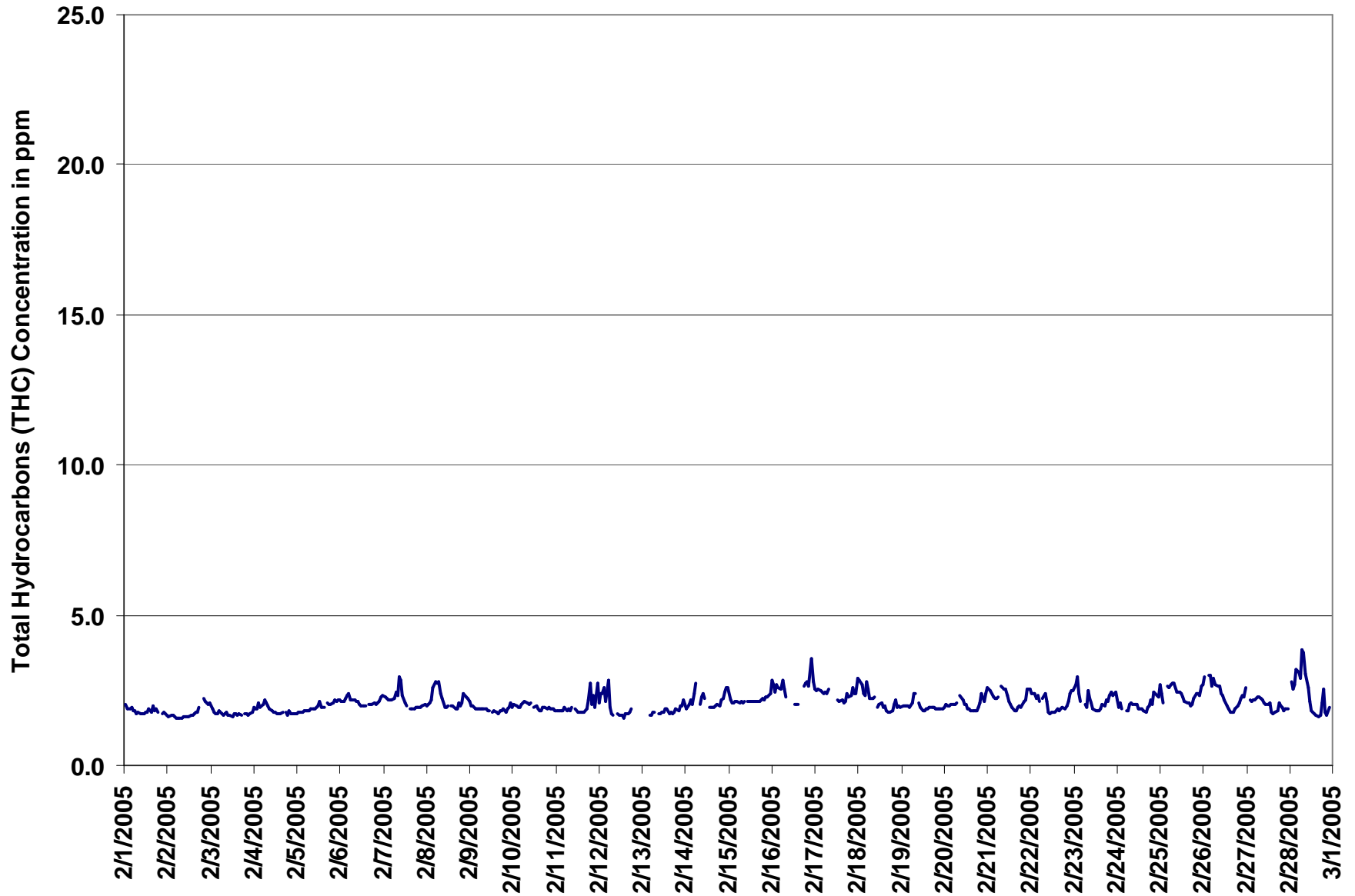


Figure 8. PAS - Crescent Heights Total Hydrocarbons 1-hr Maximum Value Monthly Trend



PAS - Crescent Heights Particulate Matter (less than 2.5 microns) Monthly Summary

Station: Crescent Heights

HOURLY AVERAGE TABLE

Particulate Matter (PM_{2.5})

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Number of 1-hr Exceedances:	0
Number of 24-hr Exceedances:	0
Maximum 1-hr Average:	17.4 µg/m ³ 25-Feb 19:00 20:00
Maximum 24-hr Average:	5.8 µg/m ³ 26-Feb

Guideline Limit	Canada Wide Standard	1-hr - µg/m ³	24-hr 30 µg/m ³
(considered as an absolute value)			

AIC Time:	0 hrs	Operational Time:	654 hrs						
Calibration Time:	2 hrs	AMD Operational Uptime:	97.6%						
Percentile	99	95	75	50	25	5	1	Average	Geomean
	12.2	8.1	3.9	2.1	0.8	0.0	0.0	2.8 µg/m ³	2.5 µg/m ³

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Hour Start Hour End	0:00 1:00	1:00 2:00	2:00 3:00	3:00 4:00	4:00 5:00	5:00 6:00	6:00 7:00	7:00 8:00	8:00 9:00	9:00 10:00	10:00 11:00	11:00 12:00	12:00 13:00	13:00 14:00	14:00 15:00	15:00 16:00	16:00 17:00	17:00 18:00	18:00 19:00	19:00 20:00	20:00 21:00	21:00 22:00	22:00 23:00	23:00 0:00	24-hour Average	Daily Maximum	
1-Feb-05	1	1	1	0	0	0	0	0	2	2	3	3	1	1	0	5	4	1	2	2	0	0	0	0	1.2	5.4	
2-Feb-05	1	1	1	1	3	3	3	4	3	3	4	4	3	4	4	4	6	6	13	12	10	4	1	4.3	12.5		
3-Feb-05	1	0	0	0	0	0	0	0	1	0	2	1	3	1	1	2	0	2	1	2	1	2	3	3	1.1	3.3	
4-Feb-05	1	0	1	0	0	1	0	0	3	0	1	1	0	0	1	1	1	1	2	3	2	1	2	1.1	3.0		
5-Feb-05	3	3	2	0	1	2	1	3	2	2	2	1	1	2	3	4	3	4	4	5	4	6	3	3	2.5	5.6	
6-Feb-05	2	3	3	4	3	3	3	3	2	1	2	1	0	0	0	1	1	1	0	0	0	1	0	0	1.4	3.5	
7-Feb-05	0	0	0	0	0	1	0	1	3	5	4	1	1	0	0	0	0	0	0	0	1	3	2	1	0.9	4.8	
8-Feb-05	1	0	3	3	2	6	4	7	4	2	4	5	8	9	4	3	1	3	4	3	7	4	3	1	3.8	9.2	
9-Feb-05	1	1	0	0	0	0	2	1	2	4	1	2	1	0	2	2	4	4	4	3	5	5	4	3	2.1	5.3	
10-Feb-05	4	3	0	1	2	2	3	4	4	3	1	1	1	0	0	2	2	3	2	2	2	1	9	4	2.3	8.8	
11-Feb-05	0	0	0	0	0	0	2	1	4	3	2	1	D	0	0	2	7	9	17	10	9	4	12	4	3.8	16.7	
12-Feb-05	6	3	4	5	4	1	0	0	0	2	3	4	1	2	0	3	4	6	N	N	N	N	N	N	2.6	6.0	
13-Feb-05	N	N	N	1	2	2	2	1	2	0	1	2	1	1	2	4	3	1	2	1	2	4	3	2	1.8	4.3	
14-Feb-05	0	0	1	0	0	0	1	1	4	8	2	N	0	0	2	2	1	0	3	4	4	6	8	8	2.4	8.4	
15-Feb-05	5	0	0	2	2	1	4	2	3	2	2	1	0	3	2	2	1	2	2	3	0	2	3	4	2.0	4.5	
16-Feb-05	2	1	1	2	3	3	1	3	2	4	3	1	2	1	0	N	N	0	1	4	7	8	6	4	2.8	8.1	
17-Feb-05	3	4	5	4	6	5	5	5	6	4	C	C	1	1	0	1	0	2	3	2	0	0	1	5	2.9	5.9	
18-Feb-05	5	14	0	1	2	0	2	2	8	0	0	0	0	0	0	D	0	2	0	0	0	0	0	0	1.6	14.3	
19-Feb-05	0	0	0	0	1	1	0	1	4	5	2	2	3	2	3	3	2	2	4	3	3	2	1	1	1.9	5.5	
20-Feb-05	3	2	4	3	3	3	2	8	7	6	5	3	2	2	2	3	2	3	4	4	9	4	4	7	3.9	8.8	
21-Feb-05	3	5	5	5	6	7	9	9	7	8	9	11	6	3	0	1	2	1	3	5	5	4	3	4	5.0	10.8	
22-Feb-05	2	2	4	1	4	2	5	5	4	2	3	2	1	1	1	1	2	2	2	3	4	5	6	4	2.9	6.4	
23-Feb-05	6	2	1	1	2	1	2	2	3	3	1	2	2	1	1	2	3	0	6	8	6	4	3	0	0	2.6	7.6
24-Feb-05	0	2	1	1	1	1	1	3	2	2	3	2	1	0	D	0	1	5	3	6	6	4	4	7	2.5	6.7	
25-Feb-05	0	5	3	3	4	5	7	5	7	6	5	3	1	1	1	0	2	3	5	17	14	10	13	10	5.5	17.4	
26-Feb-05	6	9	5	5	5	5	6	8	10	8	7	4	1	0	0	1	4	5	6	9	10	9	7	9	5.8	10.3	
27-Feb-05	8	3	3	4	3	3	4	8	7	8	7	6	0	D	0	0	0	0	3	2	1	2	2	2	3.3	8.4	
28-Feb-05	3	2	1	2	2	1	3	8	11	6	0	1	2	0	0	0	1	2	11	5	3	6	9	7	3.5	11.5	
																									N	0.0	
																									N	0.0	
																									N	0.0	
Hourly Avg	2.4	2.5	1.8	1.8	2.3	2.2	2.5	3.3	4.1	3.6	2.9	2.5	1.6	1.3	1.2	1.9	2.0	2.7	3.7	4.3	4.3	3.9	4.2	3.5			
Hourly Max	8.4	14.3	5.5	5.1	6.0	6.8	9.0	8.9	11.5	8.1	9.5	10.8	8.1	9.2	4.5	5.4	7.1	9.0	16.7	17.4	13.5	10.0	13.3	9.6			

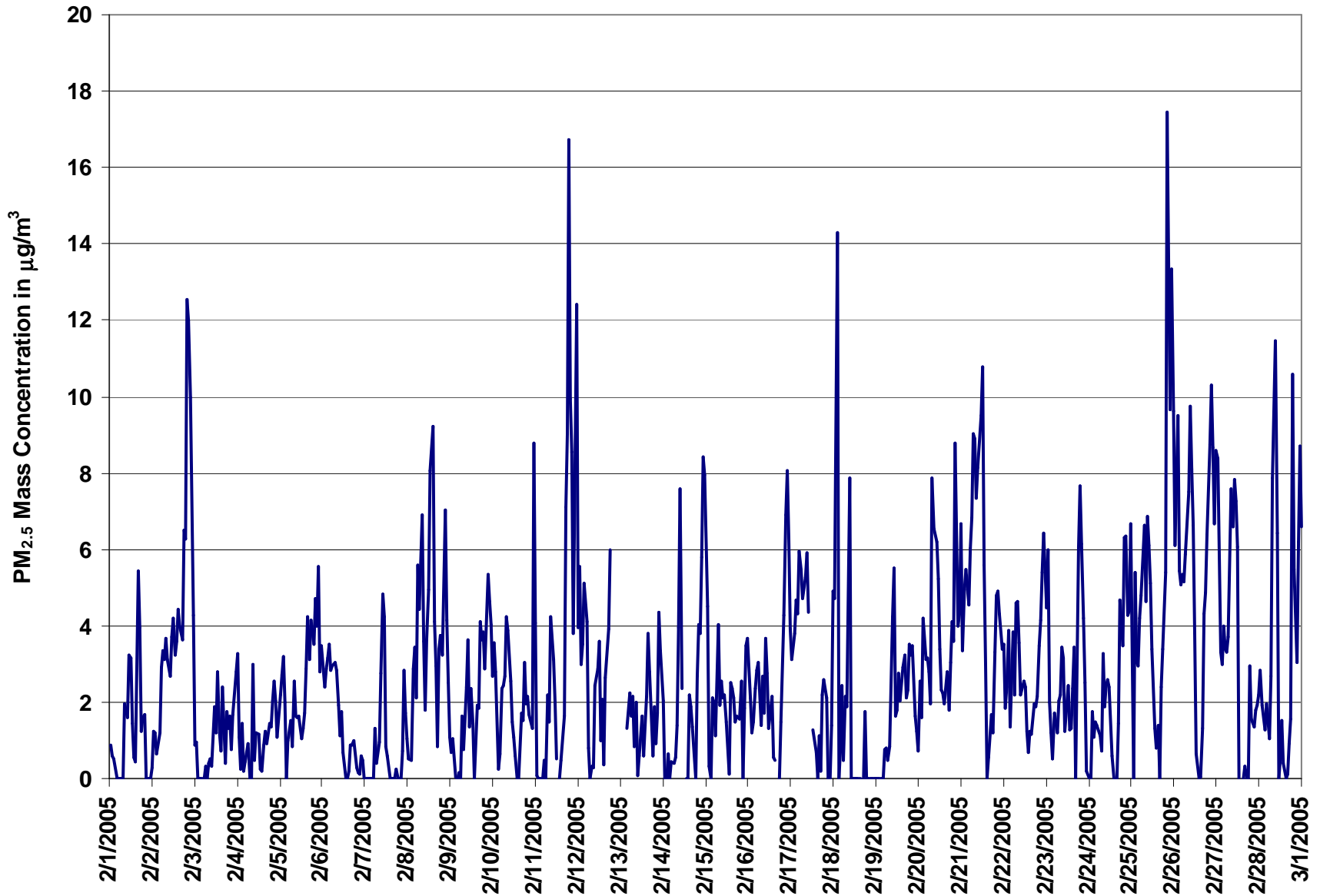


Figure 9. PAS - Crescent Heights Particulate Matter (less than 2.5 microns) 1-hr Average Monthly Trend



Station: Crescent Heights

HOURLY MAXIMUM TABLE

Particulate Matter (PM_{2.5})

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Maximum 1-hr Value:	52.4	µg/m ³	18-Feb	1:00 2:00
Maximum 24-hr Value:	10.3	µg/m ³	11-Feb	

AIC Time:	0 hrs	Operational Time:	654 hrs						
Calibration Time:	2 hrs	AMD Operational Uptime:	97.6%						
Percentile	99	95	75	50	25	5	1	Average	Geomean
	24.3	13.9	7.8	5.8	4.0	2.0	0.7	6.7 µg/m ³	6.5 µg/m ³

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	24-hour Average	Daily Maximum	
1-Feb-05	4	3	4	3	3	3	3	4	4	5	8	7	5	4	4	12	10	8	5	7	1	2	3	4	4.8	11.6	
2-Feb-05	10	5	5	4	6	7	6	7	7	7	7	8	8	7	9	9	8	13	11	23	17	15	10	5	8.9	22.6	
3-Feb-05	4	3	3	2	3	3	3	4	5	7	6	4	6	6	5	7	6	5	5	5	4	11	10	8	5.2	10.7	
4-Feb-05	5	3	8	4	4	6	3	2	6	3	5	4	4	3	4	4	6	5	7	8	7	6	6	6	4.9	7.5	
5-Feb-05	8	6	7	4	4	4	3	7	5	5	7	5	7	7	6	8	6	7	6	8	7	11	7	7	6.3	11.1	
6-Feb-05	6	7	9	7	6	7	6	6	7	6	6	4	3	4	4	4	4	4	6	5	4	4	3	3	5.2	9.0	
7-Feb-05	4	4	3	5	3	6	4	5	7	7	8	5	6	5	4	2	2	3	3	4	5	7	6	5	4.8	8.2	
8-Feb-05	6	3	7	7	8	9	9	16	8	6	10	8	12	16	9	7	5	8	7	6	12	8	6	5	8.2	16.3	
9-Feb-05	4	5	3	3	3	4	9	4	6	7	4	6	5	3	6	6	7	7	7	7	9	10	7	6	5.7	10.2	
10-Feb-05	8	7	4	4	7	9	6	8	8	5	5	5	4	2	4	5	6	6	6	6	6	5	26	17	7.2	26.3	
11-Feb-05	3	1	3	2	4	3	6	4	9	6	5	10	D	13	6	6	11	13	39	36	16	9	22	8	10.3	39.2	
12-Feb-05	13	9	7	11	11	4	4	3	4	6	6	6	6	5	5	8	7	12	N	N	N	N	N	N	7.0	12.6	
13-Feb-05	N	N	N	5	6	5	7	5	5	3	4	5	7	5	6	8	8	6	7	5	8	8	9	5	6.0	8.5	
14-Feb-05	3	2	5	4	3	4	4	6	11	15	12	N	5	2	7	7	5	5	8	10	9	11	16	15	7.4	16.0	
15-Feb-05	9	4	5	5	6	5	12	6	8	7	6	7	4	7	7	6	6	7	5	5	8	8	7	7	6.6	11.6	
16-Feb-05	6	6	5	6	7	7	4	10	5	6	6	5	6	3	3	N	N	6	5	9	14	11	10	8	6.8	13.7	
17-Feb-05	7	8	9	7	9	9	9	10	10	9	C	C	17	7	1	3	2	5	6	5	1	2	3	11	6.8	17.0	
18-Feb-05	8	52	4	4	5	3	8	8	12	6	1	3	0	1	0	D	0	5	3	0	1	1	1	1	5.6	52.4	
19-Feb-05	1	2	2	1	3	3	2	3	7	8	4	4	6	4	5	5	4	4	7	6	6	4	4	3	4.1	8.2	
20-Feb-05	6	4	8	5	5	4	5	30	9	8	8	7	4	4	4	5	4	5	9	6	11	9	8	11	7.5	29.6	
21-Feb-05	7	8	9	7	8	9	31	27	10	10	13	13	11	6	2	2	3	3	6	6	7	6	6	6	9.0	30.6	
22-Feb-05	4	4	8	6	7	5	19	8	8	6	5	5	6	3	6	9	4	5	3	6	7	8	10	8	6.6	19.1	
23-Feb-05	12	3	3	3	4	4	7	6	6	7	4	6	4	4	5	5	4	9	12	8	7	4	2	1	5.4	12.2	
24-Feb-05	2	3	2	3	3	3	3	16	4	5	5	4	3	0	D	1	5	12	9	9	12	10	6	10	5.7	16.3	
25-Feb-05	6	10	7	6	7	7	14	7	9	9	7	7	4	3	3	5	3	5	7	14	20	20	14	17	16	9.3	20.1
26-Feb-05	8	13	8	7	8	6	8	10	14	12	9	7	2	4	3	4	7	6	13	15	16	14	9	13	9.0	16.2	
27-Feb-05	14	8	5	6	6	5	6	10	11	11	10	9	4	D	2	4	3	2	5	3	3	3	3	3	5.9	13.8	
28-Feb-05	5	4	3	4	4	3	5	19	17	10	2	4	5	3	2	2	3	4	15	10	5	11	13	10	6.7	18.7	
																										N	0.0
																										N	0.0
																										N	0.0
Hourly Avg	6.3	7.0	5.4	4.9	5.6	5.3	7.4	9.0	8.0	7.2	6.4	6.1	5.7	4.9	4.5	5.4	5.1	6.5	8.4	8.8	8.2	7.9	8.5	7.4			
Hourly Max	13.8	52.4	9.4	10.7	11.0	9.3	30.6	29.6	16.7	14.9	12.6	12.9	17.0	16.3	9.2	11.6	11.2	13.1	39.2	35.9	19.9	15.2	26.3	17.5			

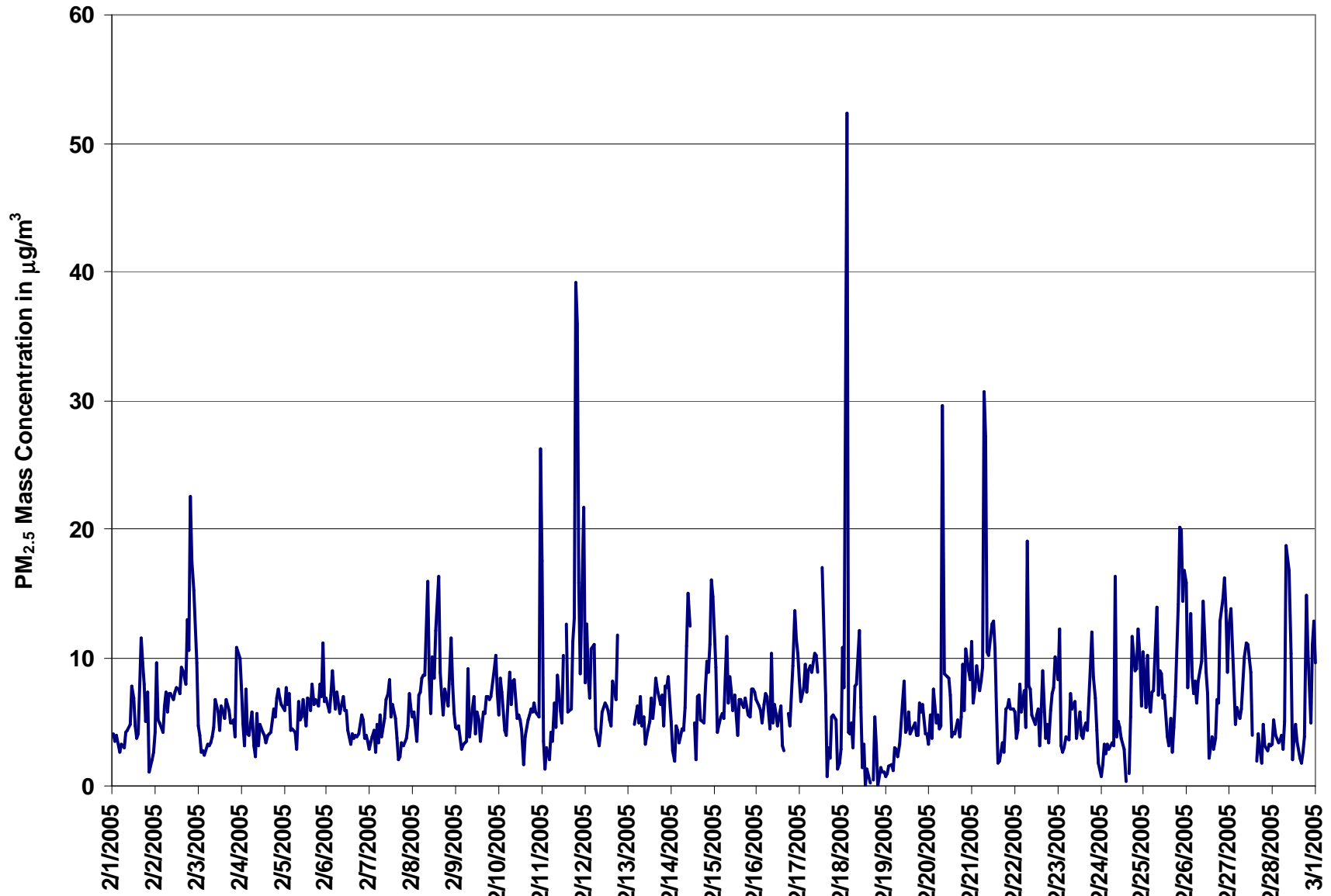
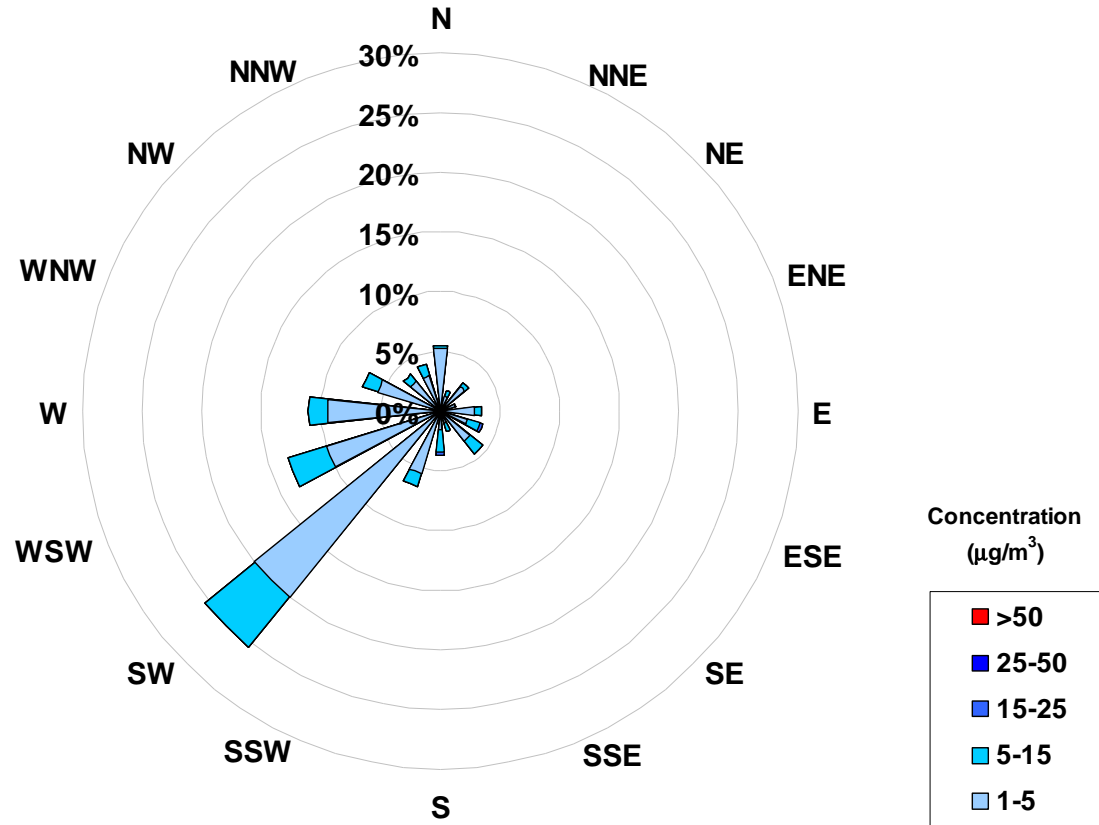


Figure 10. PAS - Crescent Heights Particulate Matter (less than 2.5 microns) 1-hr Maximum Value Monthly



Concentration Rose for the 1-hr PM_{2.5} Average Concentration Occurrences at the Crescent Heights Site for February 2005



Frequency Distribution of PM _{2.5} in $\mu\text{g}/\text{m}^3$			
Range	Frequency (hrs)		
0 < 1	185		
1 to 5	365		
5 to 15	102		
15 to 25	2		
25 to 50	0		
> 50	0		
Total Non-Zero Values			
			654

Calms	
Range	$\mu\text{g}/\text{m}^3$
1-5	0.0%
5-15	0.0%
15-25	0.0%
25-50	0.0%
>50	0.0%



PAS - Crescent Heights Meteorological Parameters Monthly Summary

Station: Crescent Heights

HOURLY AVERAGE TABLE

Relative Humidity (RH - %)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Number of 1-hr Exceedances:	0
Number of 24-hr Exceedances:	0
Maximum 1-hr Average:	85.9 % 13-Feb 23:00 0:00
Maximum 24-hr Average:	78.5 % 4-Feb

AIC Time:	0 hrs	Operational Time:	659 hrs					
Calibration Time:	0 hrs	AMD Operational Uptime:	98.1%					
Percentile	99	95	75	50	25	5	1	Average
	84.7	81.8	73.0	62.1	47.5	29.1	10.6	58.9 ppb

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	24-hour Average	Daily Maximum	
Hour End	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	0:00			
1-Feb-05	67	72	74	73	67	64	64	63	60	59	56	49	41	33	31	34	42	47	50	55	53	50	50	51	54	74	
2-Feb-05	54	57	47	41	40	41	41	41	39	37	35	32	30	29	29	30	29	35	38	43	51	55	57	57	41	57	
3-Feb-05	59	54	50	50	51	45	49	51	47	37	33	35	38	35	30	34	35	34	41	42	39	39	48	60	43	60	
4-Feb-05	65	68	72	76	79	80	81	82	85	84	83	82	80	78	77	76	76	78	80	82	83	82	77	77	78	85	
5-Feb-05	75	74	69	66	66	63	64	65	63	62	59	54	52	51	53	57	61	63	64	67	69	69	69	70	64	75	
6-Feb-05	69	70	70	71	71	72	72	70	65	61	57	54	52	49	48	50	52	58	63	67	71	73	74	73	64	74	
7-Feb-05	73	73	72	73	73	73	73	73	73	71	70	66	63	66	55	50	49	54	58	59	61	63	67	67	66	73	
8-Feb-05	69	70	71	74	75	78	79	76	70	67	65	58	53	50	46	45	42	51	55	60	64	66	71	72	64	79	
9-Feb-05	74	75	73	71	70	68	68	67	64	59	54	48	42	33	32	36	41	46	51	48	51	50	53	54	55	75	
10-Feb-05	61	63	63	62	66	72	71	70	67	62	51	46	41	33	27	27	31	36	42	44	44	49	49	52	51	72	
11-Feb-05	53	49	46	43	43	48	45	44	40	35	26	15	11	9	5	5	10	15	21	28	35	36	42	46	31	53	
12-Feb-05	50	48	49	46	47	42	38	35	31	32	33	36	29	27	20	18	20	23	N	N	N	N	N	N	35	50	
13-Feb-05	N	N	N	58	58	63	61	68	64	63	54	48	45	44	46	50	60	76	78	79	82	83	82	86	64	86	
14-Feb-05	85	84	84	85	85	85	85	85	84	80	75	N	60	53	47	42	46	57	67	73	78	80	81	80	73	85	
15-Feb-05	82	81	78	77	75	78	81	77	70	66	61	57	48	50	51	51	50	58	65	69	68	69	73	77	67	82	
16-Feb-05	73	74	74	76	79	77	75	72	68	62	59	56	52	47	45	N	N	51	53	58	65	69	69	70	65	79	
17-Feb-05	70	73	71	67	65	64	65	68	66	N	55	52	59	60	55	56	54	59	68	74	74	75	79	82	66	82	
18-Feb-05	85	83	82	81	82	82	80	80	76	72	69	66	64	61	59	41	35	47	60	63	64	68	68	68	68	68	85
19-Feb-05	69	69	70	70	72	73	77	77	73	67	63	57	59	62	64	64	66	66	73	80	80	80	80	78	70	80	
20-Feb-05	77	76	75	76	77	77	77	79	75	74	70	69	68	65	63	62	60	67	75	79	82	82	82	82	74	82	
21-Feb-05	81	81	80	80	78	76	78	78	75	73	70	64	56	55	53	49	50	52	57	62	68	72	75	77	68	81	
22-Feb-05	77	77	79	79	77	77	76	74	62	56	53	48	42	35	32	30	34	42	47	52	57	61	65	69	58	79	
23-Feb-05	75	73	71	70	68	67	65	66	60	50	44	41	35	30	31	33	29	35	43	49	53	55	53	50	52	75	
24-Feb-05	45	52	59	62	63	61	59	57	53	47	41	35	30	20	10	7	8	18	26	39	41	43	49	59	41	63	
25-Feb-05	54	60	60	61	66	71	75	76	72	69	62	50	41	31	29	26	25	29	35	44	53	60	66	68	54	76	
26-Feb-05	70	73	79	79	78	77	76	76	73	72	68	59	54	46	42	43	45	52	59	66	71	73	76	81	66	81	
27-Feb-05	81	80	82	82	82	83	82	81	72	66	57	51	44	34	31	34	34	38	47	54	55	58	66	70	61	83	
28-Feb-05	73	75	77	80	80	79	80	76	65	55	44	32	27	24	22	21	21	24	32	42	46	50	55	55	51	80	
																									N	0	
																									N	0	
																									N	0	
Hourly Avg	69	70	69	69	69	69	69	69	65	61	56	51	47	43	41	40	41	47	54	59	61	63	66	68			
Hourly Max	85	84	84	85	85	85	85	85	85	84	83	82	80	78	77	76	76	78	80	82	83	83	82	86			

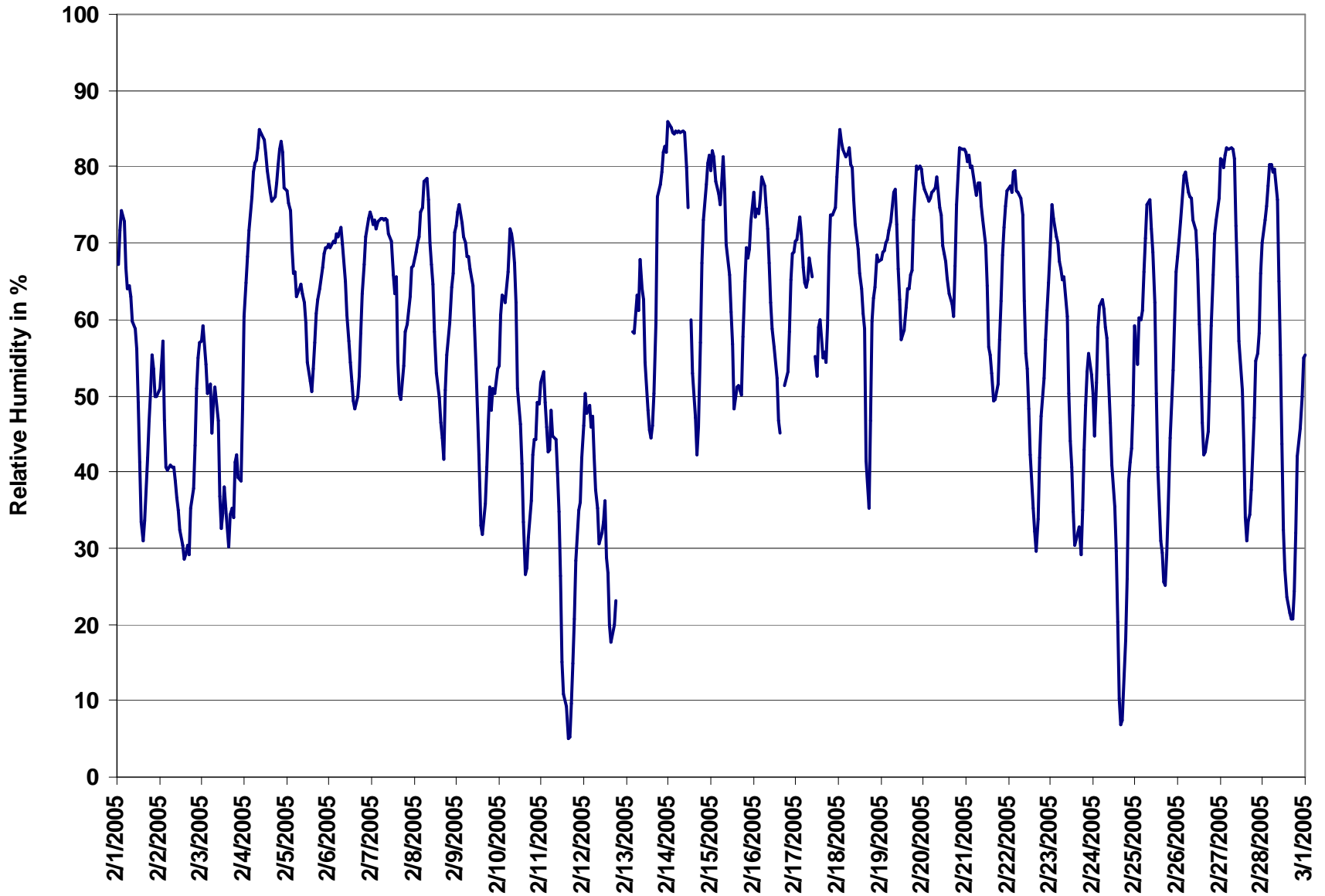


Figure 11. PAS - Crescent Heights Relative Humidity 1-hr Average Monthly Trend



Station: Crescent Heights

HOURLY AVERAGE TABLE

Ambient Temperature (AT - °C)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Number of 1-hr Exceedances:	0
Number of 24-hr Exceedances:	0
Maximum 1-hr Average:	18.4 °C 11-Feb 15:00 16:00
Maximum 24-hr Average:	9.8 °C 3-Feb

AIC Time:	0 hrs	Operational Time:	659 hrs					
Calibration Time:	0 hrs	AMD Operational Uptime:	98.1%					
Percentile	99	95	75	50	25	5	1	Average
	15.2	12.3	3.5	-2.6	-7.7	-13.9	-18.7	-2.0 ppb

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Day	Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	24-hour Average	Daily Maximum
Hour End	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	0:00			
1-Feb-05	3	2	1	0	1	2	1	2	3	5	7	10	12	13	12	13	11	8	6	5	5	5	5	5	5	5.3	12.6
2-Feb-05	5	5	7	9	10	10	10	10	10	11	11	12	13	13	14	13	13	11	10	8	6	5	4	4	4	9.4	13.7
3-Feb-05	4	5	7	7	7	9	8	7	8	11	12	13	13	14	16	14	13	13	11	10	10	10	7	5	9.8	15.8	
4-Feb-05	4	3	2	1	1	0	-1	-1	-2	-2	-3	-2	-2	-2	-3	-3	-4	-5	-6	-6	-6	-7	-10	-11	-2.7	4.0	
5-Feb-05	-12	-12	-13	-14	-15	-15	-16	-16	-16	-16	-15	-15	-14	-13	-13	-13	-14	-15	-16	-17	-17	-18	-18	-18	-18	-15.0	-12.3
6-Feb-05	-19	-19	-19	-19	-19	-19	-19	-19	-18	-18	-16	-14	-12	-10	-9	-9	-9	-9	-10	-12	-13	-13	-14	-15	-15	-14.5	-8.9
7-Feb-05	-14	-14	-14	-14	-14	-14	-13	-13	-13	-13	-11	-9	-8	-7	-7	-4	-4	-4	-6	-8	-9	-10	-11	-11	-12	-10.2	-3.8
8-Feb-05	-12	-12	-12	-13	-13	-13	-13	-12	-11	-9	-8	-5	-2	-1	1	2	3	0	0	-1	-2	-3	-5	-5	-5	-6.2	2.7
9-Feb-05	-6	-6	-6	-6	-6	-6	-6	-6	-5	-4	-2	1	3	6	9	9	8	7	5	4	4	3	3	2	2	0.5	9.4
10-Feb-05	1	0	-1	-2	-3	-4	-4	-4	-3	-1	2	4	6	8	10	10	9	6	4	3	4	3	3	2	2	2.1	9.9
11-Feb-05	1	2	2	3	3	1	2	2	3	5	9	14	15	17	18	18	17	13	10	6	3	1	1	0	6.9	18.4	
12-Feb-05	-1	-1	-1	0	1	2	3	3	3	4	5	5	6	10	11	13	13	12	10	N	N	N	N	N	N	5.3	13.1
13-Feb-05	N	N	N	3	3	2	3	2	3	3	5	7	6	6	6	5	3	0	-1	-2	-2	-3	-3	-3	1.9	6.5	
14-Feb-05	-5	-6	-7	-7	-8	-8	-8	-8	-8	-6	-5	N	-3	-2	-2	-1	-2	-6	-8	-9	-11	-12	-12	-10	-6.7	-1.2	
15-Feb-05	-8	-8	-9	-9	-9	-10	-10	-10	-8	-7	-6	-5	-4	-4	-3	-3	-3	-4	-7	-8	-9	-10	-11	-11	-7.4	-2.8	
16-Feb-05	-11	-12	-12	-13	-14	-14	-13	-12	-11	-8	-5	-3	-1	2	2	N	N	-1	-3	-4	-5	-6	-6	-7	-7.2	2.4	
17-Feb-05	-7	-8	-8	-6	-5	-5	-6	-7	-6	N	-2	1	1	2	3	3	2	1	-2	-3	-5	-6	-7	-8	-3.4	2.8	
18-Feb-05	-10	-11	-12	-12	-12	-13	-13	-14	-11	-7	-5	-3	-1	0	1	5	5	2	-1	-2	-3	-5	-5	-5	-5.3	4.8	
19-Feb-05	-6	-6	-7	-7	-8	-8	-9	-10	-9	-7	-5	-4	-3	-4	-4	-4	-5	-6	-7	-8	-8	-9	-10	-11	-6.8	-2.6	
20-Feb-05	-12	-13	-13	-13	-12	-12	-13	-15	-14	-11	-9	-7	-6	-5	-3	-3	-2	-4	-5	-7	-9	-9	-9	-9	-8.9	-1.9	
21-Feb-05	-10	-9	-10	-9	-9	-10	-11	-11	-10	-9	-6	-4	-1	0	1	1	1	0	-2	-3	-5	-6	-7	-8	-5.8	1.4	
22-Feb-05	-8	-9	-10	-11	-10	-11	-11	-10	-5	-2	0	3	5	6	7	7	6	3	1	-1	-3	-4	-5	-6	-2.8	7.3	
23-Feb-05	-7	-7	-7	-7	-5	-5	-5	-6	-4	0	2	5	8	10	10	10	10	8	6	4	2	1	1	0	0.9	10.3	
24-Feb-05	1	-1	-2	-3	-2	-3	-2	-2	-1	2	5	8	10	13	15	15	15	12	8	3	2	1	1	-1	4.0	15.4	
25-Feb-05	-2	-4	-4	-4	-5	-6	-7	-7	-6	-3	0	4	7	9	10	11	11	9	7	4	0	-2	-3	-3	0.6	11.4	
26-Feb-05	-3	-4	-5	-5	-5	-5	-5	-5	-3	-1	1	4	6	7	8	7	7	5	3	1	0	-1	-2	-4	0.0	7.9	
27-Feb-05	-5	-5	-6	-6	-7	-7	-8	-8	-5	-2	2	4	7	8	8	8	8	6	3	2	1	0	-2	-4	-0.4	8.2	
28-Feb-05	-4	-5	-5	-6	-6	-7	-7	-6	-2	2	5	9	12	13	14	14	14	12	8	5	3	2	0	0	2.7	14.1	
																										N	0.0
																										N	0.0
																										N	0.0
Hourly Avg	-5.3	-5.7	-6.0	-5.8	-5.8	-6.0	-6.3	-6.3	-5.0	-2.9	-0.9	1.4	2.8	4.1	4.9	5.1	4.6	2.4	0.0	-1.5	-2.6	-3.4	-4.3	-5.0			
Hourly Max	5.3	5.5	7.4	8.9	9.6	10.0	10.1	10.4	10.3	10.7	12.3	13.8	15.2	16.5	17.7	18.4	17.1	13.4	10.7	9.9	10.3	10.4	7.1	5.2			

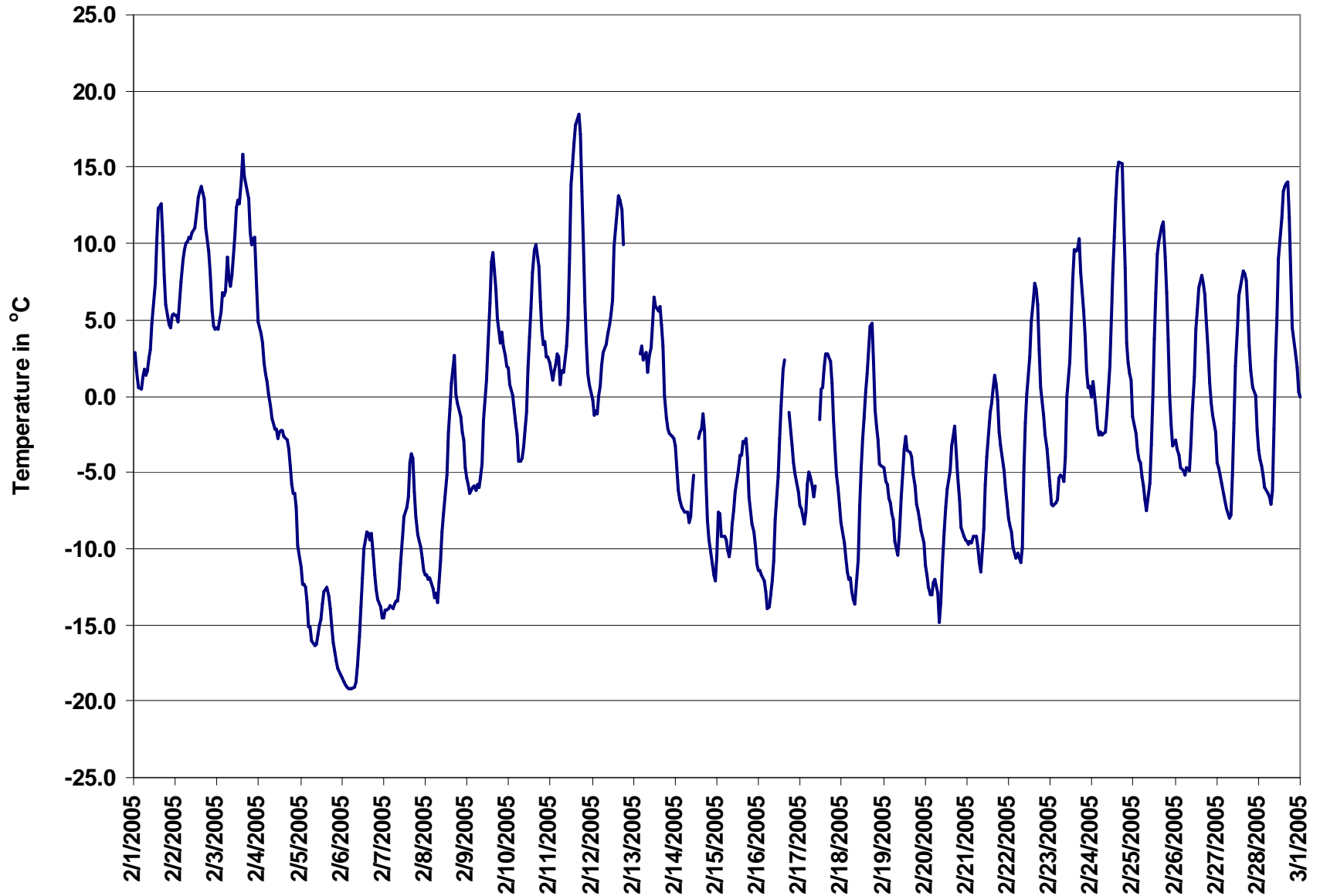


Figure 12. PAS - Crescent Heights Temperature 1-hr Average Monthly Trend



Station: Crescent Heights

HOURLY AVERAGE TABLE

Solar Radiation (SR - W/m²)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Number of 1-hr Exceedances:	0
Number of 24-hr Exceedances:	0
Maximum 1-hr Average:	554.3 W/m ² 28-Feb 12:00 13:00
Maximum 24-hr Average:	153.3 W/m ² 28-Feb

AIC Time:	0 hrs	Operational Time:	660 hrs					
Calibration Time:	0 hrs	AMD Operational Uptime:	98.2%					
Percentile	99	95	75	50	25	5	1	Average
	528.3	470.3	180.4	0.4	0.0	-0.1	-0.1	102.2 ppb

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	24-hour Average	Daily Maximum
Hour End	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	0:00		
1-Feb-05	0	0	0	0	0	0	0	0	2	56	132	196	328	384	382	222	204	89	2	0	0	0	0	0	83	384
2-Feb-05	0	0	0	0	0	0	0	0	1	18	63	119	194	240	218	180	120	56	6	0	0	0	0	0	51	240
3-Feb-05	0	0	0	0	0	0	0	0	1	29	64	90	111	129	176	184	99	25	2	0	0	0	0	0	38	184
4-Feb-05	0	0	0	0	0	0	0	0	0	9	30	49	74	87	97	68	45	18	2	0	0	0	0	0	20	97
5-Feb-05	0	0	0	0	0	0	0	0	2	54	127	219	341	405	319	260	101	35	3	0	0	0	0	0	78	405
6-Feb-05	0	0	0	0	0	0	0	0	3	88	221	319	418	438	427	286	116	117	9	0	0	0	0	0	102	438
7-Feb-05	0	0	0	0	0	0	0	0	1	28	98	140	188	194	237	288	208	121	9	0	0	0	0	0	63	288
8-Feb-05	0	0	0	0	0	0	0	0	3	38	159	201	360	255	195	166	128	83	8	0	0	0	0	0	66	360
9-Feb-05	0	0	0	0	0	0	0	0	4	90	223	342	417	446	431	258	115	61	8	0	0	0	0	0	100	446
10-Feb-05	0	0	0	0	0	0	0	0	5	93	234	350	430	445	408	286	236	71	8	0	0	0	0	0	107	445
11-Feb-05	0	0	0	0	0	0	0	0	4	101	247	368	503	414	456	308	251	146	15	0	0	0	0	0	117	503
12-Feb-05	0	0	0	0	0	0	0	0	2	26	50	66	127	235	231	282	173	142	23	N	N	N	N	N	75	282
13-Feb-05	N	N	N	0	0	0	0	0	3	51	95	203	187	183	325	271	220	133	12	0	0	0	0	0	80	325
14-Feb-05	0	0	0	0	0	0	0	0	6	51	206	276	N	484	470	301	268	155	15	0	0	0	0	0	97	484
15-Feb-05	0	0	0	0	0	0	0	0	8	100	171	391	473	506	475	402	288	179	26	0	0	0	0	0	126	506
16-Feb-05	0	0	0	0	0	0	0	0	12	128	273	394	478	496	470	246	N	N	26	0	0	0	0	0	115	496
17-Feb-05	0	0	0	0	0	0	0	0	7	113	209	370	390	270	300	298	275	162	22	0	0	0	0	0	101	390
18-Feb-05	0	0	0	0	0	0	0	0	13	135	266	383	473	497	488	305	345	194	32	0	0	0	0	0	130	497
19-Feb-05	0	0	0	0	0	0	0	0	9	117	267	353	431	445	247	172	102	51	19	0	0	0	0	0	92	445
20-Feb-05	0	0	0	0	0	0	0	0	12	122	208	413	485	510	499	353	318	180	31	0	0	0	0	0	131	510
21-Feb-05	0	0	0	0	0	0	0	0	17	104	142	260	272	522	338	294	339	184	33	0	0	0	0	0	104	522
22-Feb-05	0	0	0	0	0	0	0	0	19	149	312	365	460	456	513	398	334	192	38	0	0	0	0	0	135	513
23-Feb-05	0	0	0	0	0	0	0	0	24	153	290	414	503	472	512	349	334	158	26	1	0	0	0	0	135	512
24-Feb-05	0	0	0	0	0	0	0	0	25	155	314	434	520	505	552	387	344	206	49	1	0	0	0	0	146	552
25-Feb-05	0	0	0	0	0	0	0	0	30	173	313	435	522	547	536	422	353	207	51	1	0	0	0	0	150	547
26-Feb-05	0	0	0	0	0	0	0	0	23	115	138	250	355	476	544	404	250	126	43	1	0	0	0	0	114	544
27-Feb-05	0	0	0	0	0	0	0	1	34	169	304	426	513	526	521	410	342	198	54	2	0	0	0	0	146	526
28-Feb-05	0	0	0	0	0	0	0	1	37	181	326	448	532	554	543	410	363	220	58	1	0	0	0	0	153	554
																									N	0
																									N	0
																									N	0
Hourly Avg	0	0	0	0	0	0	0	11	95	196	295	374	397	390	293	232	130	23	0	0	0	0	0	0		
Hourly Max	0	0	0	0	0	0	1	37	181	326	448	532	554	552	422	363	220	58	2	0	0	0	0	0		

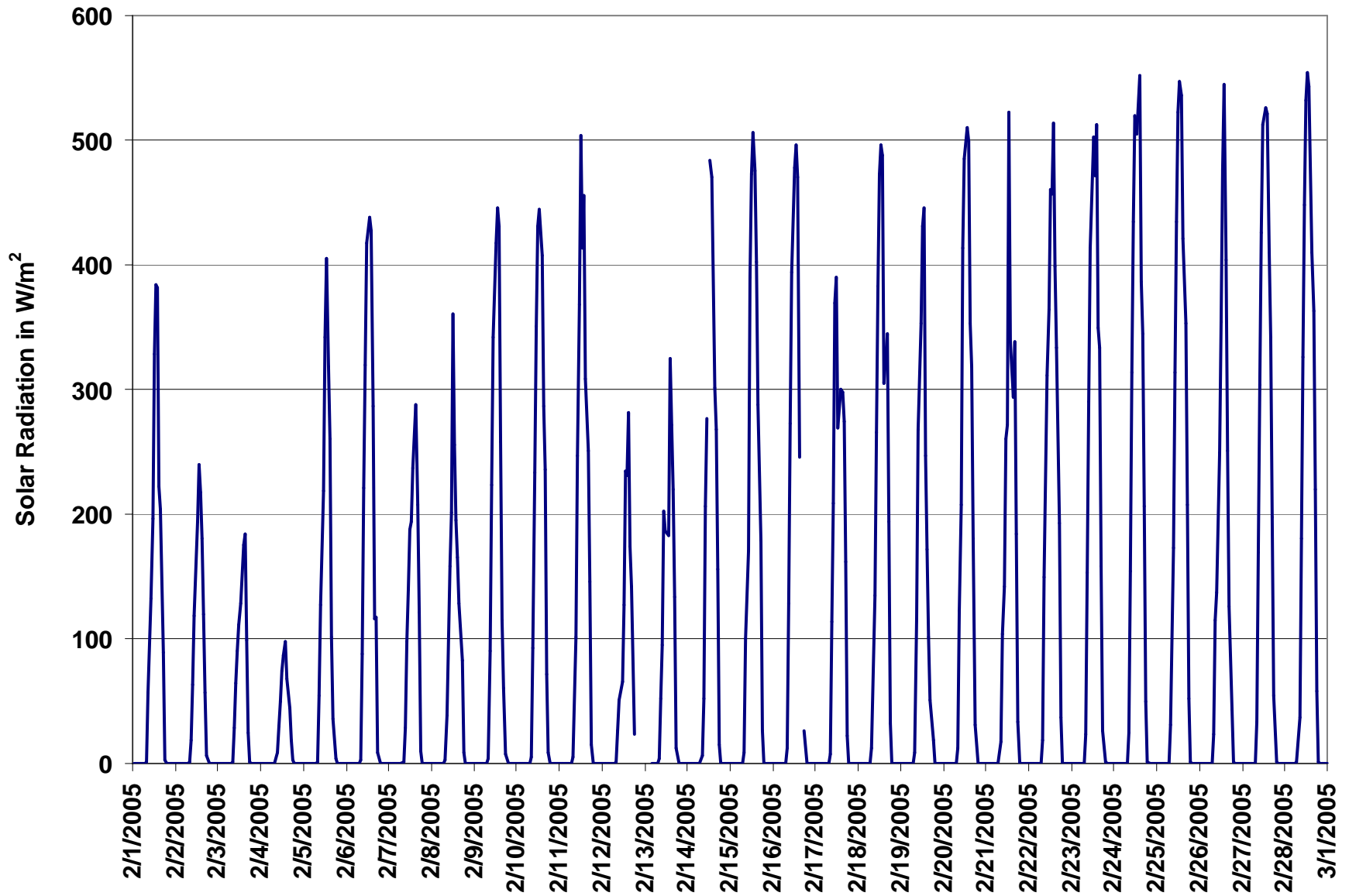


Figure 13. PAS - Crescent Heights Solar Radiation 1-hr Average Monthly Trend



Station: Crescent Heights

HOURLY AVERAGE TABLE

Wind Speed (WSv - km/hr)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005
Summary

Maximum 1-hr Average:	34.2	km/hr	2-Feb	11:00 12:00
Maximum 24-hr Average:	17.3	km/hr	2-Feb	

Calm Time:	8 hrs	1% calms	Operational Time:	651 hrs					
Calibration Time:	0 hrs		AMD Operational Uptime:	98.1%					
Percentile	99	95	75	50	25	5	1	AverageS	AverageV
	29.5	18.9	13.3	8.5	4.5	2.1	1.4	9.4 km/hr	4.0 km/hr

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day	Mountain Standard Time																							24-hr Vector Average	Daily Max	
Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00		
Hour End	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	0:00		
1-Feb-05	4	9	9	6	10	10	12	18	19	19	20	18	18	13	11	10	14	19	15	15	21	26	30	29	15.1	29.7
2-Feb-05	26	15	18	24	29	30	30	30	29	31	30	34	27	22	16	15	15	8	4	4	4	4	8	9	17.3	34.2
3-Feb-05	12	10	14	11	14	18	15	16	15	17	24	24	18	16	20	20	19	22	15	12	14	13	11	14	14.1	24.3
4-Feb-05	15	17	12	12	14	16	18	19	19	19	18	16	15	15	14	13	13	14	16	14	12	15	19	13	14.3	19.4
5-Feb-05	15	13	13	16	15	15	15	14	13	14	15	15	13	14	15	15	16	12	12	10	8	7	7	6	12.4	15.9
6-Feb-05	6	3	3	4	5	4	4	8	7	9	9	9	11	15	14	12	14	15	13	11	9	5	5	6	7.5	14.9
7-Feb-05	4	4	4	3	2	2	5	2	2	3	2	3	5	5	6	8	10	9	12	8	5	3	5	3	2.2	12.2
8-Feb-05	3	3	2	Calm	Calm	Calm	1	4	10	17	17	14	10	8	10	9	12	7	8	5	5	5	7	8	6.1	16.7
9-Feb-05	9	12	13	15	11	14	14	13	13	15	21	19	20	20	19	21	18	12	11	15	13	7	7	6	13.3	20.9
10-Feb-05	6	8	8	7	3	5	5	6	10	13	14	15	18	16	19	18	10	8	10	13	13	12	13	16	10.6	19.0
11-Feb-05	15	11	9	11	8	7	5	10	9	12	15	14	14	11	9	8	7	3	5	6	4	2	4	5	7.9	15.5
12-Feb-05	3	4	1	4	7	9	14	12	10	11	13	11	15	16	16	14	9	6	N	N	N	N	N	N	8.3	16.1
13-Feb-05	N	N	N	11	11	5	12	11	13	15	16	12	12	12	15	18	19	17	6	5	2	2	4	11	5.4	19.3
14-Feb-05	18	19	14	12	10	4	2	3	2	2	4	N	5	6	5	3	4	4	2	2	2	2	3	5	2.0	18.5
15-Feb-05	16	12	7	7	5	6	8	9	10	14	13	11	13	15	14	12	10	12	7	5	6	6	3	2	8.1	16.1
16-Feb-05	5	7	9	5	3	7	12	13	10	12	15	16	15	11	7	N	N	8	5	1	1	Calm	3	4	6.6	16.3
17-Feb-05	4	1	3	5	7	6	4	3	6	N	11	9	8	8	11	13	12	8	5	2	5	2	3	3	5.4	12.6
18-Feb-05	2	3	4	4	3	3	3	3	3	7	12	14	17	16	15	9	10	10	14	14	14	13	13	15	8.6	17.4
19-Feb-05	14	12	9	11	8	4	5	5	5	6	7	9	12	8	9	8	10	10	10	9	8	9	7	9	3.6	14.5
20-Feb-05	8	8	7	4	3	4	8	7	7	9	11	13	15	13	11	10	8	6	2	5	3	1	Calm	4	5.7	14.9
21-Feb-05	2	3	5	5	5	6	4	6	5	7	6	6	10	7	9	9	8	4	3	5	6	4	6	5	5.0	9.5
22-Feb-05	6	5	3	4	4	4	6	4	14	19	19	14	9	8	10	17	15	11	10	6	3	3	4	4	3.7	19.3
23-Feb-05	5	9	7	5	11	12	12	8	9	10	15	15	11	8	9	8	6	2	3	5	6	8	14	12	7.7	14.7
24-Feb-05	17	13	12	10	13	12	13	14	14	13	10	11	10	11	7	4	4	8	9	4	4	6	6	3	6.0	17.2
25-Feb-05	5	2	3	4	2	2	3	4	7	9	9	9	6	4	7	7	6	4	3	4	3	3	2	4	3.2	8.9
26-Feb-05	2	3	2	2	2	3	4	4	5	6	8	6	10	12	13	14	10	7	6	1	2	4	4	3	3.4	13.6
27-Feb-05	4	7	4	4	5	4	3	3	3	3	2	3	7	8	11	13	12	13	13	14	13	13	5	4	5.5	13.6
28-Feb-05	Calm	1	2	Calm	2	2	4	2	Calm	1	4	3	4	6	8	7	6	2	3	7	5	5	1	2	1.7	8.1
																									N	0.0
																									N	0.0
																									N	0.0
1-hr Vector	2.3	2.3	2.9	3.5	3.8	4.3	5.4	5.7	6.8	7.8	8.7	8.3	6.6	5.3	4.9	4.8	4.2	1.6	0.6	1.0	1.0	1.4	2.5	2.1		
Hourly Max	26.5	18.5	18.2	24.2	29.2	29.9	29.9	29.7	29.0	31.1	30.3	34.2	27.3	22.3	19.7	20.9	19.3	22.0	16.3	14.7	20.9	25.7	29.7	29.2		



Station: Crescent Heights

HOURLY AVERAGE TABLE

Wind Direction (WD - Degrees)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Calm Time:	8 hrs	1% calms	Operational Time:	651 hrs				
Calibration Time:	0 hrs		AMD Operational Uptime:	98.1%				
Percentile	99	95	75	50	25	5	1	Average
	355.5	331.5	259.2	228.3	143.5	33.2	5.1	249 deg

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

Day Mountain Standard Time

Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	24-hour Average
Hour End	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	0:00	
1-Feb-05	211	233	226	217	220	225	218	218	228	232	232	239	241	252	272	234	227	229	239	230	212	206	215	219	227
2-Feb-05	225	233	238	259	267	267	270	271	272	274	275	277	275	270	228	242	272	54	330	155	180	179	234	235	261
3-Feb-05	230	237	227	229	250	237	235	243	263	254	251	237	226	232	241	231	236	237	237	250	258	271	341	32	244
4-Feb-05	45	62	42	31	41	45	55	70	73	72	69	75	68	73	71	55	48	49	53	50	51	14	3	351	52
5-Feb-05	339	329	316	311	314	317	319	322	319	319	324	322	319	327	332	340	351	356	352	352	355	342	354	0	331
6-Feb-05	6	341	20	52	39	91	92	52	80	111	93	91	89	86	82	88	98	96	83	95	94	93	34	24	81
7-Feb-05	14	7	16	333	319	293	0	54	113	121	134	162	140	207	158	185	201	187	205	214	192	148	127	121	177
8-Feb-05	92	113	138	Calm	Calm	Calm	154	228	249	236	240	234	239	251	253	269	310	313	317	323	283	272	236	235	256
9-Feb-05	226	233	232	229	234	224	233	234	233	232	228	221	220	222	233	228	231	230	232	265	293	285	269	272	235
10-Feb-05	217	224	242	251	200	120	203	218	223	230	229	214	220	217	226	223	242	238	232	237	233	227	221	226	225
11-Feb-05	235	231	203	224	205	193	193	216	207	211	211	234	245	252	262	250	212	201	190	219	169	133	187	221	221
12-Feb-05	140	122	253	232	199	224	224	243	237	223	235	237	253	259	277	287	296	292	N	N	N	N	N	N	247
13-Feb-05	N	N	N	237	240	227	245	246	252	235	257	289	341	357	7	353	358	5	59	67	95	99	349	10	311
14-Feb-05	25	23	24	25	37	32	232	231	273	330	261	N	258	233	222	216	199	143	113	133	134	215	233	315	9
15-Feb-05	343	341	329	286	270	259	256	259	269	280	275	275	283	284	284	276	274	292	328	252	257	243	248	144	284
16-Feb-05	233	240	235	188	200	210	234	240	237	232	230	226	225	228	233	N	N	6	13	131	15	Calm	280	249	234
17-Feb-05	266	206	267	270	278	285	279	224	248	N	248	273	304	298	287	277	284	285	296	297	354	357	231	206	278
18-Feb-05	176	153	134	128	91	123	129	118	113	116	114	101	104	101	70	116	155	119	101	94	76	71	90	87	102
19-Feb-05	92	89	78	73	66	26	326	317	291	293	291	240	249	257	283	281	283	275	272	281	294	309	308	303	299
20-Feb-05	284	284	294	266	251	235	234	249	217	212	230	221	221	221	210	219	212	215	130	126	104	133	Calm	332	229
21-Feb-05	332	230	250	256	282	271	253	239	217	216	228	255	244	276	297	308	277	270	249	245	239	220	204	213	253
22-Feb-05	223	200	163	157	193	182	195	234	228	227	230	234	278	306	320	358	5	5	357	6	336	243	248	231	267
23-Feb-05	201	233	224	189	223	230	232	210	223	221	225	225	249	288	313	287	292	326	228	224	236	227	235	238	236
24-Feb-05	237	232	230	237	231	236	235	235	239	227	220	212	208	214	246	307	29	52	73	123	89	58	95	120	224
25-Feb-05	141	196	86	111	149	182	243	243	223	222	216	264	257	269	230	224	244	243	269	116	130	134	214	240	220
26-Feb-05	230	331	260	260	312	264	224	235	258	254	273	299	346	356	353	353	331	340	9	26	228	228	214	187	313
27-Feb-05	176	204	199	175	188	179	202	151	175	169	171	83	76	79	109	93	100	88	90	98	90	100	129	105	113
28-Feb-05	Calm	3	44	Calm	4	27	330	39	Calm	96	49	183	145	149	198	228	210	211	139	120	137	127	142	157	152
																									N
																									N
																									N
Hourly Avg	255	254	248	249	253	245	246	244	243	237	241	241	247	256	266	271	274	301	318	198	218	222	242	253	



Station: Crescent Heights

STANDARD DEVIATION TABLE

Wind Direction (WD - Degrees)

Station Owner: PAS

Monitoring Dates: February 1, 2005 to March 1, 2005

Summary

Determined by the Yamartino 15-min interval calculation

Calm Time:	8 hrs	1% calms	Operational Time:	651 hrs			
Calibration Time:	0 hrs		AMD Operational Uptime:	98.1%			
Percentile	99	95	75	50	25	5	1
	46.3	33.3	15.4	9.4	6.7	4.5	4.0

Status Flag Characters

C	Calibration	A	AIC - Zero / Span Check
S	Instrument out of Service	X	Filter Exchange
N	No Data	M	Equipment Maintenance
D	Excessive Instrument Drift	P	Power Failure

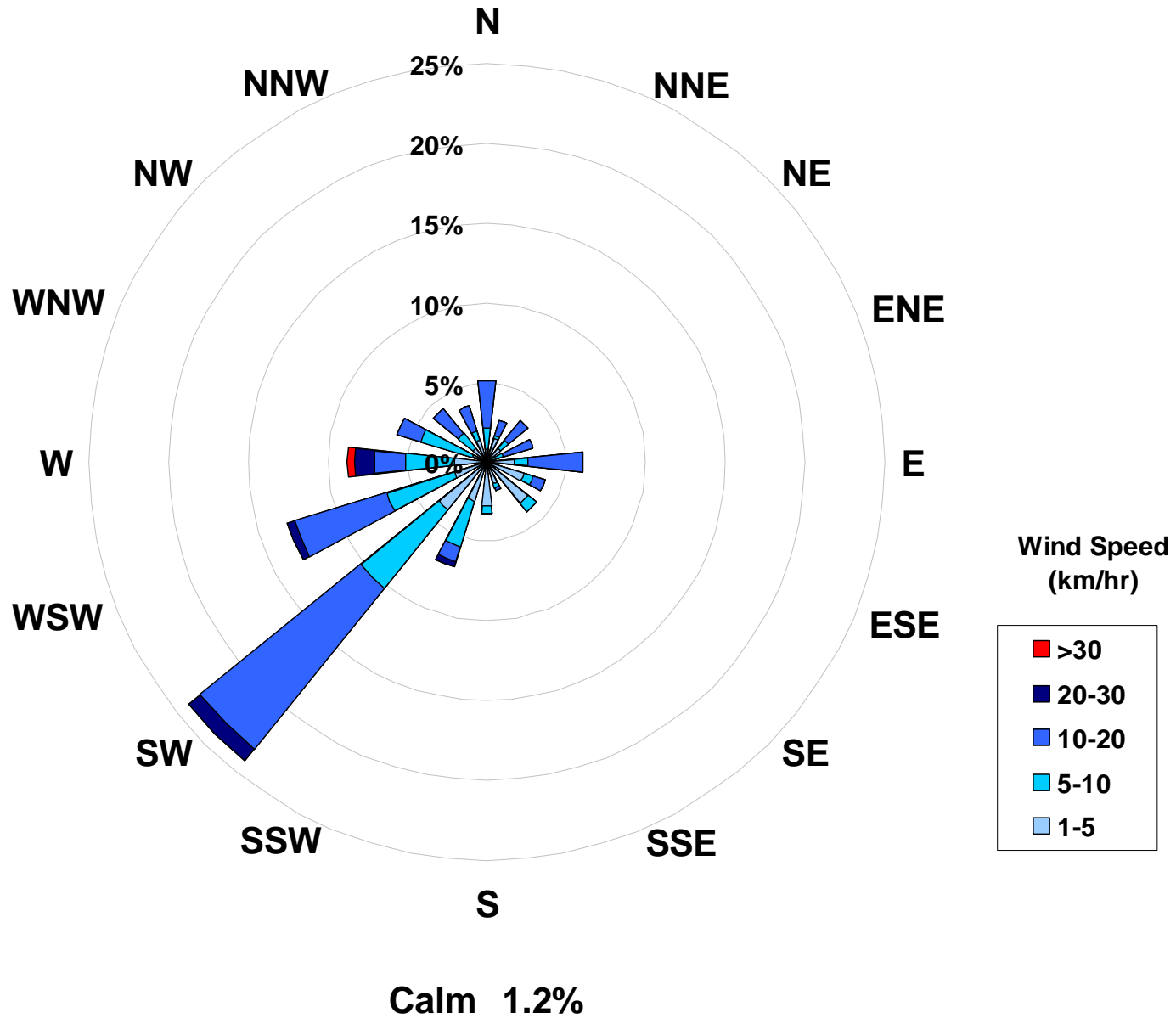
Day Mountain Standard Time

Hour Start	0:00	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	0:00	Daily Maximum
Hour End	1:00	2:00	3:00	4:00	5:00	6:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	14:00	15:00	16:00	17:00	18:00	19:00	20:00	21:00	22:00	23:00	0:00		
1-Feb-05	23	6	9	7	9	14	7	7	6	6	5	6	6	12	9	8	6	8	13	11	6	5	5	5	22.6	
2-Feb-05	4	7	8	5	5	4	4	5	4	4	5	4	5	5	12	8	8	49	22	36	21	25	15	14	49.0	
3-Feb-05	6	12	7	7	6	11	9	7	7	6	7	4	5	5	6	5	6	5	6	7	5	17	17	6	17.4	
4-Feb-05	5	7	6	6	13	4	4	7	8	8	6	7	9	9	10	8	7	7	7	7	9	9	6	7	12.8	
5-Feb-05	7	9	8	9	6	6	7	7	8	9	9	11	14	13	10	8	7	5	6	6	5	9	5	7	13.9	
6-Feb-05	8	21	14	7	7	9	9	7	5	10	11	18	20	20	13	10	12	10	6	8	9	9	11	9	8	21.0
7-Feb-05	9	8	17	33	16	21	7	26	14	10	25	26	26	38	39	16	14	9	5	6	9	13	6	9	38.6	
8-Feb-05	21	7	12	Calm	Calm	Calm	36	16	9	7	8	10	13	9	10	11	8	7	7	9	7	10	4	5	36.4	
9-Feb-05	5	5	4	6	6	5	7	7	6	6	6	7	7	7	7	6	5	6	6	7	8	11	9	10	10.9	
10-Feb-05	14	13	7	7	25	15	24	7	6	5	9	10	11	12	9	9	7	8	6	5	9	9	10	4	25.4	
11-Feb-05	5	7	10	16	14	11	18	11	12	8	8	15	10	19	16	19	10	20	26	11	13	24	21	10	25.6	
12-Feb-05	15	17	36	15	12	16	5	9	21	9	17	11	8	5	8	6	8	7	N	N	N	N	N	N	36.2	
13-Feb-05	N	N	N	7	7	31	34	8	8	7	7	14	10	8	7	6	4	4	13	7	20	35	10	6	34.7	
14-Feb-05	5	6	6	5	6	8	49	8	11	43	19	N	33	21	29	27	20	15	27	20	23	18	17	37	49.3	
15-Feb-05	5	7	15	8	7	5	7	6	6	9	8	9	9	9	9	8	10	8	8	12	5	4	17	34	33.8	
16-Feb-05	10	11	3	17	11	7	5	4	7	7	11	11	7	11	15	N	N	4	19	35	54	Calm	21	18	53.8	
17-Feb-05	19	40	30	15	8	14	29	18	10	N	35	18	15	16	12	9	8	6	13	19	13	47	18	26	46.9	
18-Feb-05	35	19	11	12	15	15	15	13	18	10	6	11	10	11	10	27	10	8	5	7	9	7	6	5	34.6	
19-Feb-05	5	9	7	5	6	16	9	14	14	15	21	33	15	19	15	13	9	8	7	8	9	8	7	8	33.3	
20-Feb-05	10	8	12	14	17	18	10	6	8	9	12	11	11	14	11	14	12	9	19	6	17	39	Calm	22	38.6	
21-Feb-05	32	9	9	10	11	8	7	4	7	8	16	14	18	25	16	14	12	10	7	7	9	19	15	6	32.3	
22-Feb-05	8	13	12	9	12	14	12	32	6	6	6	9	13	16	18	9	6	5	3	15	43	39	16	14	42.8	
23-Feb-05	13	5	4	10	6	4	5	13	12	12	7	9	14	17	14	16	17	22	8	13	7	5	4	6	21.8	
24-Feb-05	5	4	5	6	3	5	5	5	4	6	8	9	9	12	22	30	22	4	11	19	35	13	15	33	35.3	
25-Feb-05	12	48	20	12	14	26	29	14	7	12	13	20	23	37	19	20	17	12	12	40	17	18	29	13	48.3	
26-Feb-05	30	20	28	46	17	17	15	14	16	13	11	21	11	14	13	9	6	6	5	43	15	8	8	6	45.7	
27-Feb-05	14	8	7	7	6	7	9	16	19	23	33	41	20	19	18	13	10	4	5	6	5	5	11	8	40.8	
28-Feb-05	Calm	16	20	Calm	14	23	15	18	Calm	36	13	63	55	30	31	19	18	23	26	9	9	6	30	14	62.5	
																										0.0
																										0.0
																										0.0

Hourly Max 35 48 36 46 25 31 49 32 21 43 35 63 55 38 39 30 22 49 27 43 54 47 30 37



Wind Rose for the 1-hr Average Meterological Data at the Crescent Heights Site for February 2005





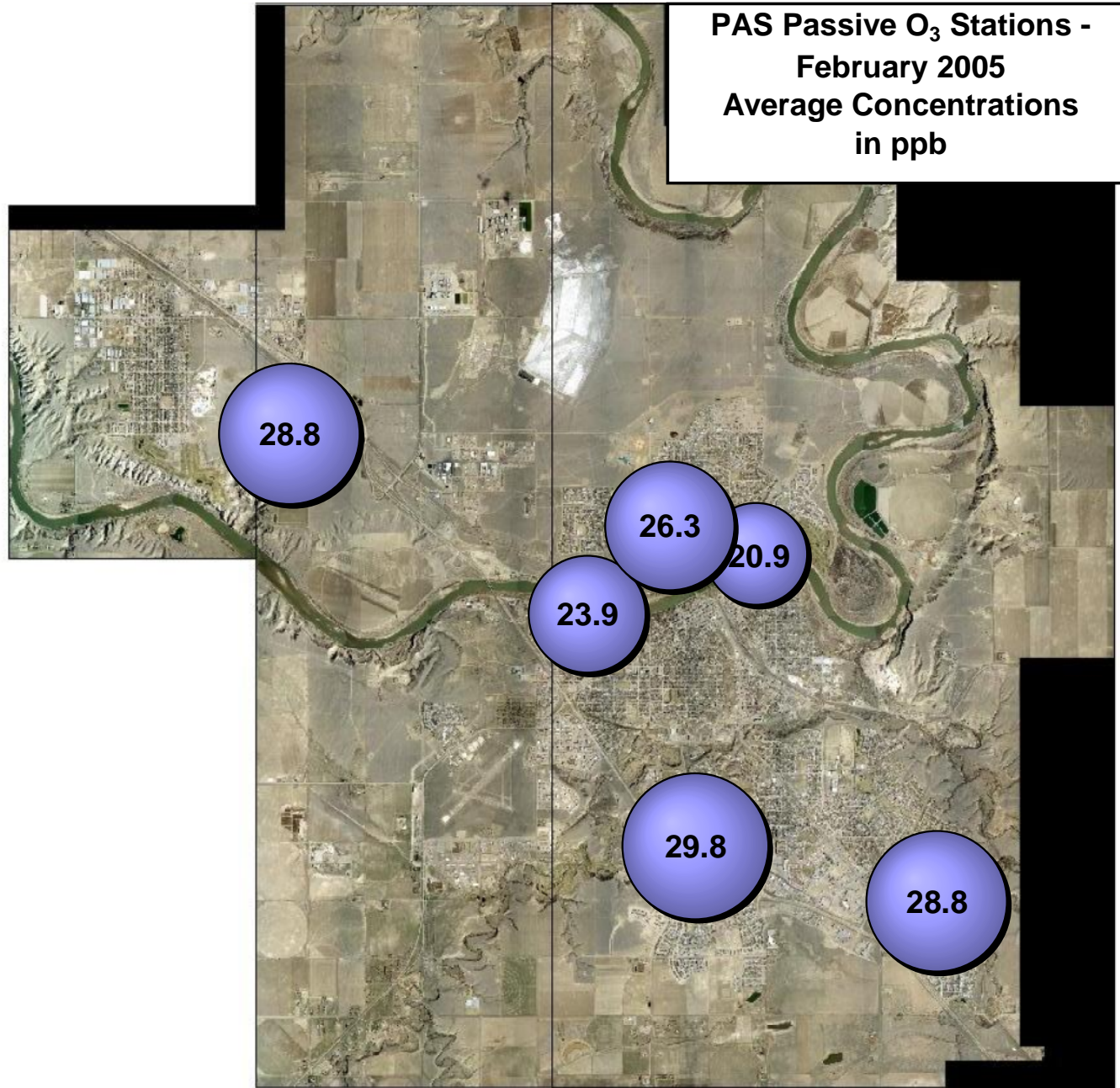
Passive Monitoring – February 2005

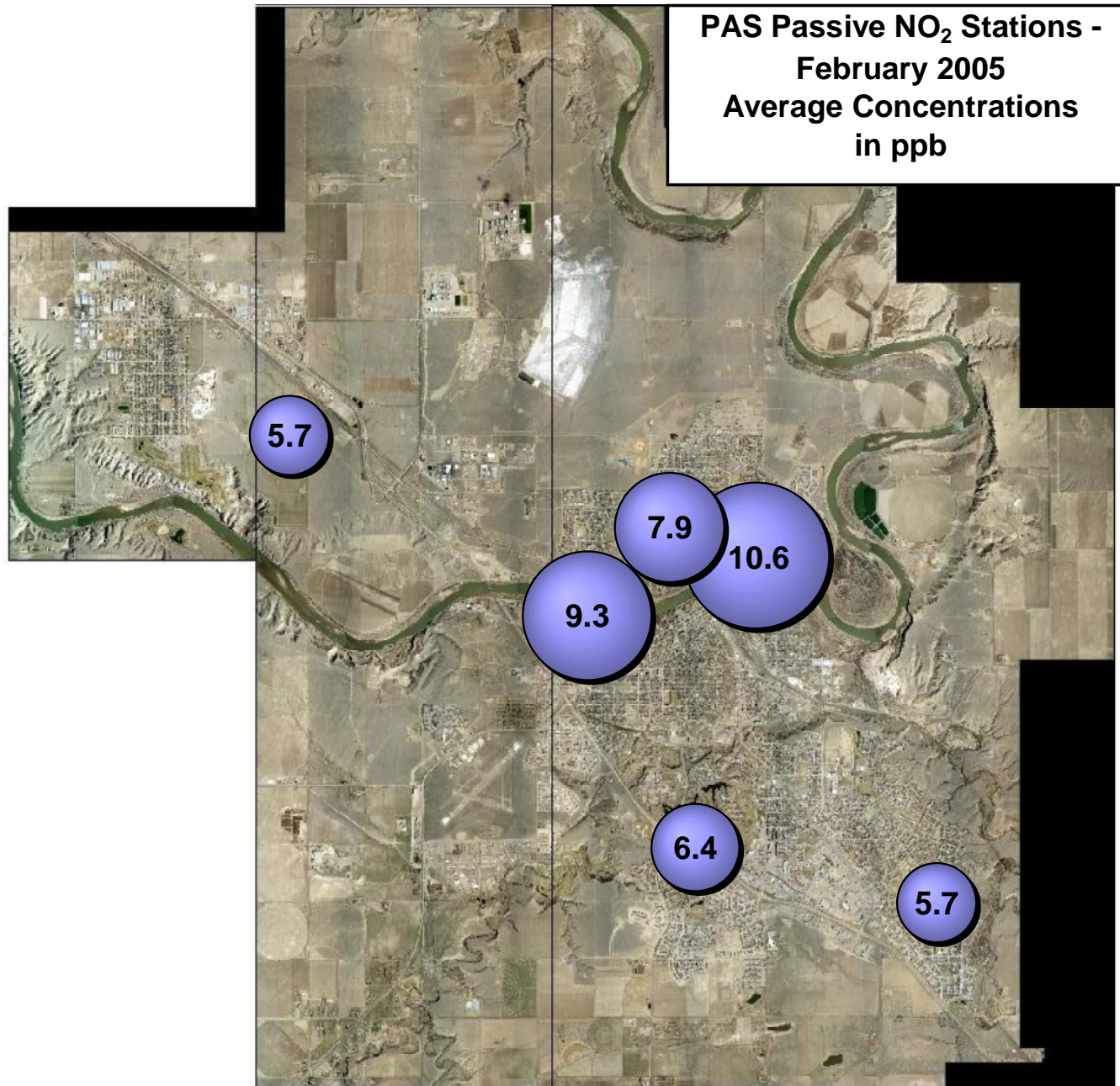
Ambient Air Compliance Network

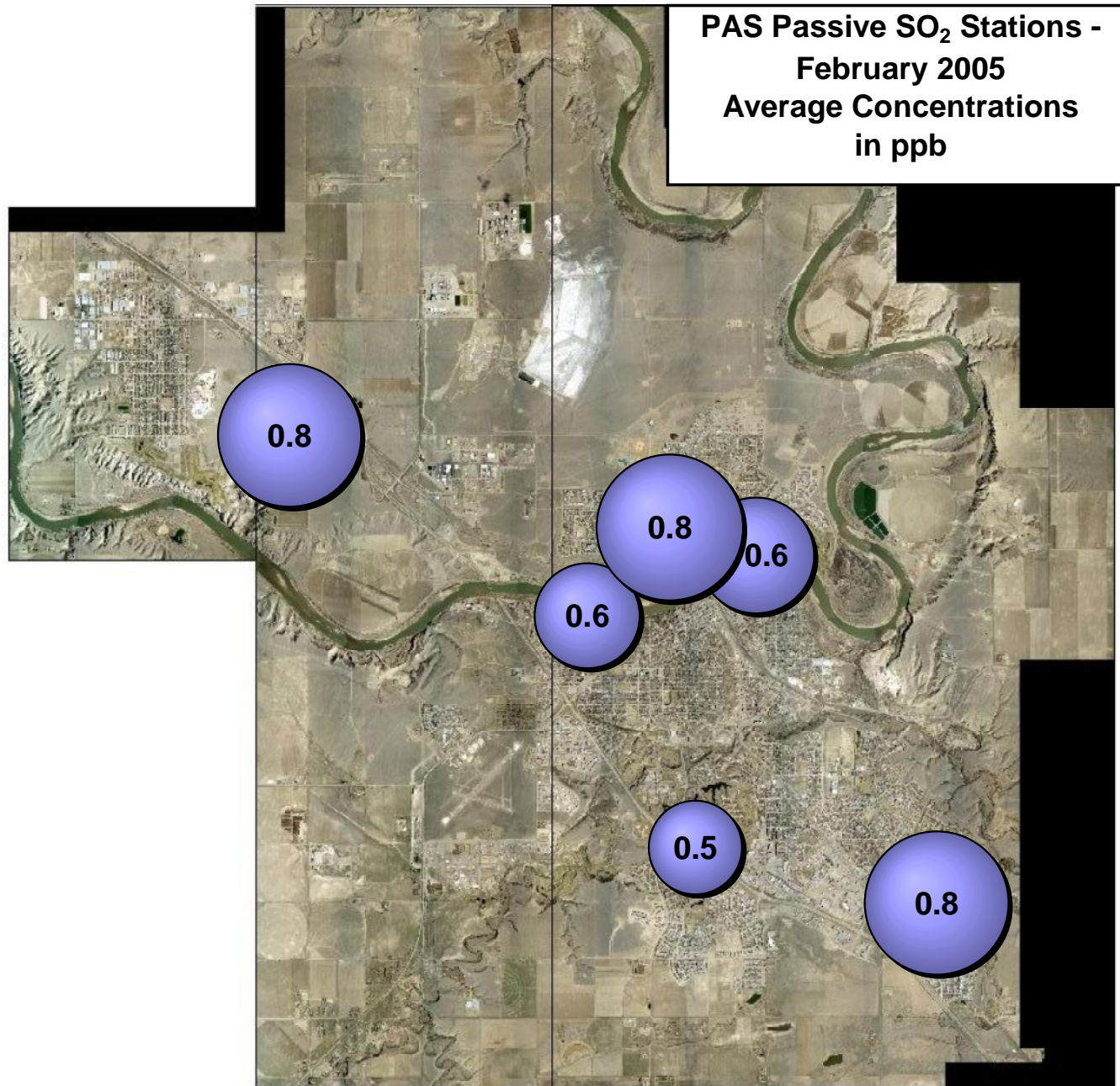
Palliser Airshed Society - PAS Passive Stations for February 2005

Station Number	Station	SO ₂ ppb	O ₃ ppb	NO ₂ ppb	Location		
	Name				Easting	Northing	Elevation
Duplicates							
4a	Redcliff	0.7	30.3	4.2			
4b		0.9	27.3	7.3			
1	Hospital	0.6	23.9	9.3	521648	5542721	698
2	Ball Park	0.6	20.9	10.6	524019	5543686	660
3	Monitoring Station	0.8	26.3	7.9	522812	5544133	714
4	Redcliff	0.8	28.8	5.7	517448	5545608	725
5	Southridge	0.5	29.8	6.4	523172	5539016	721
6	Christian School Park	0.8	28.8	5.7	526577	5538133	709

Stats:							
	Mean	0.6	25.9	8.0			
	Standard Deviation	0.1	3.6	2.0			
	Minimum	0.5			5	Southridge	
	Maximum	0.8			3	Monitoring Station	
	Minimum		20.9		2	Ball Park	
	Maximum		29.8		5	Southridge	
	Minimum			5.7	4	Redcliff	
	Maximum			10.6	2	Ball Park	







February 2005 - Calibration Reports

PAS - Crescent Heights Station

O₃, NO_x, NO, NO₂, THC, PM_{2.5}

Calibration Report

Parameter 03
 Air Monitoring Network Palliser Airshed



Station Information

Calibration Date	<u>February 16, 2005</u>	Previous Calibration	<u>January 18, 2005</u>
Station Number	<u>1</u>	Station Location	<u>Crescent Heights</u>
Reason:	<input checked="" type="checkbox"/> Routine	<input type="checkbox"/> Install	<input type="checkbox"/> Removal
			<input type="checkbox"/> Other:
Start Time (MST)	<u>10:00 - 11:00</u>	End Time (MST)	<u>20:00 - 22:30</u>
Barometric Pressure	<u>0.917</u> ATM	Station Temperature	<u>22.0</u> Deg C
Calibrator	<u>Enviroics 6100</u>	Serial Number	<u>3016</u>
Cal Gas Concentrator	<u>NA</u>	Cal Gas Expiry Date	<u>NA</u>
DACS make	<u>Focus AP1000</u>	DACS serial No.	<u>NA</u>
DACS voltage range	<u>0 - 1 volt</u>	DACS channel #	<u>5</u>
	<u>Before</u>		<u>After</u>
DACS slope	<u>0.050000</u>	DACS slope	<u>0.050000</u>
DACS intercept	<u>0.000000</u>	DACS intercept	<u>0.000000</u>
Calculated slope	<u>0.998950</u>	Calculated slope	<u>0.995335</u>
Calculated intercept	<u>1.684468</u>	Calculated intercept	<u>2.094589</u>
Analyzer make	<u>API Model 400E</u>	Analyzer serial #	<u>331</u>

	before		after	
Concentration range	0 - 500	ppb	0 - 500	ppb
Background	-1.4	ppb	-2.3	ppb
coefficient	1.147		1.137	
Lamp measure	3085	mV	2962	mV
Lamp Reference	3087	mV	2963	mV
Pressure	25.6	inches Hg	26.0	inches Hg
Sample Flow	715	ccm	726	ccm
Lamp temp	52	Deg C	52	Deg C

Calibration Data

Dilution air flow rate (cc/min)	Source gas flow rate (cc/min)	Calculated concentration (ppm) (Cc)	Indicated concentration (ppm) (Ic)	Correction factor (Cc/Ic)
4995	0.00	0.0	-1.4	N/A
4995	0.00	313.6	313.5	1.0005
4995	0.00	178.6	176.8	1.0101
4995	0.00	89.0	86.6	1.0276
4995	0.00	0.0	-0.3	0.0000
4995	0.00	304.3	302.9	1.0045
Average Correction Factor				1.0127

Calculated value of As Found Response: 304.7 ppm Percent Change of As Found: 0.1%

	before calibration		after calibration	
Auto zero	-0.5	ppb	0.6	ppb
Auto span	342.3	ppb	349.1	ppb

Notes: Analyzer was zero and span adjusted.

Calibration Performed By: Kelly Baragar

Calibration Summary

Parameter O3
 Air Monitoring Network Palliser Airshed

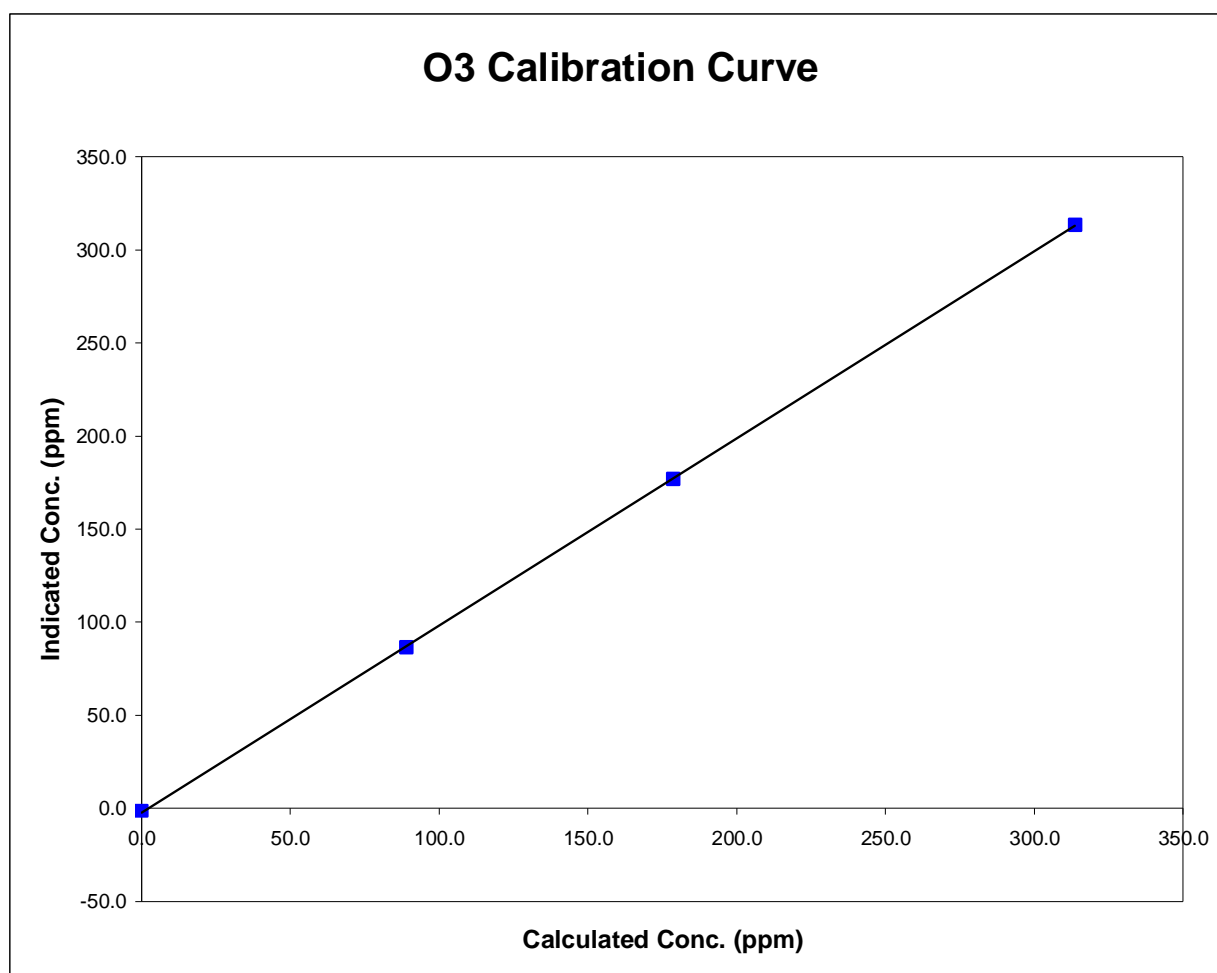


Station Information

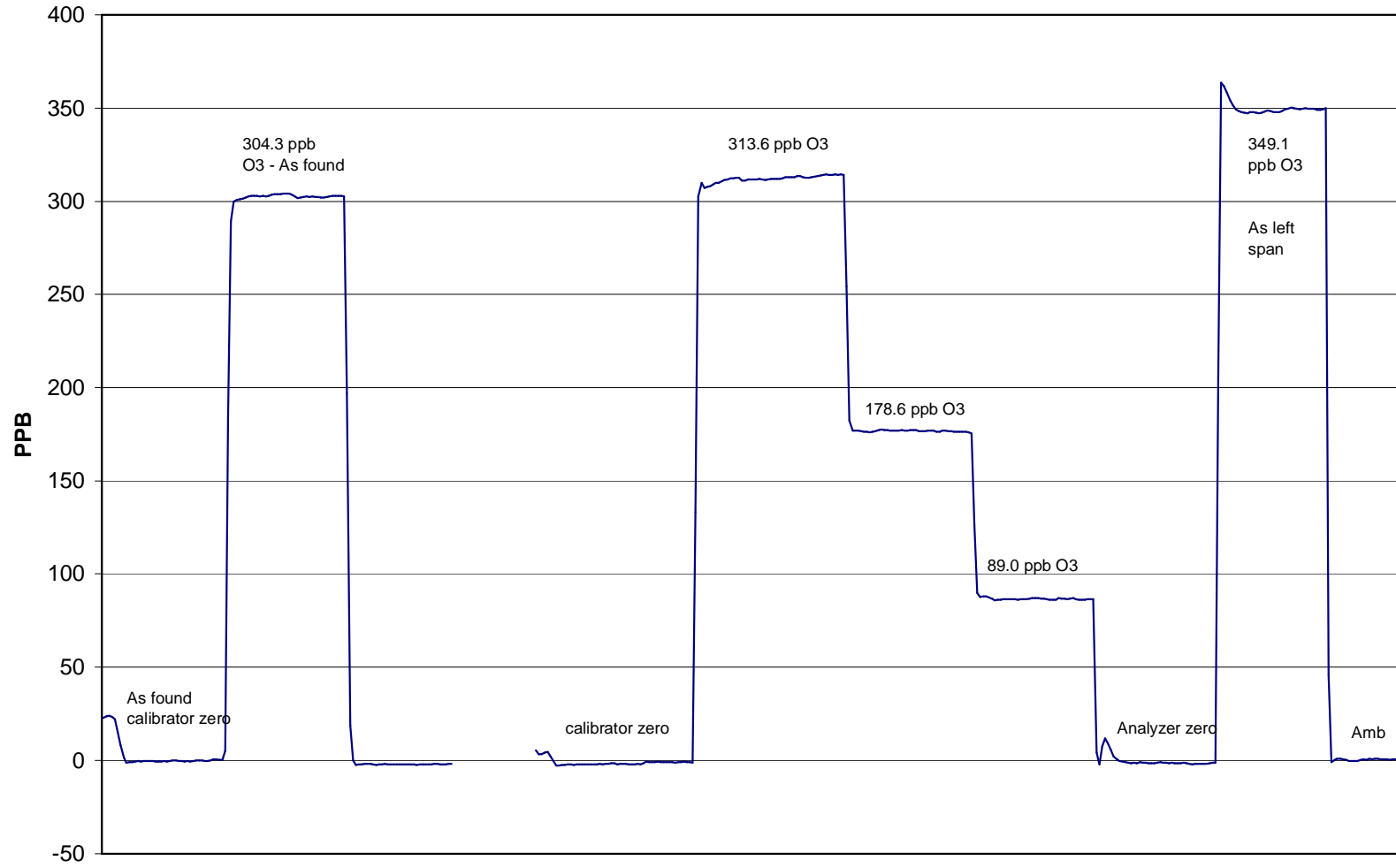
Calibration Date	February 16, 2005	Previous Calibration	January 18, 2005
Station Number	1	Station Location	Crescent Heights
Start Time (MST)	10:00 - 11:00	End Time (MST)	20:00 - 22:30
Analyzer make/model	API Model 400E	Analyzer serial #	331

Calibration Data

Calculated concentration (ppm) (Cc)	Indicated concentration (ppm) (Ic)	Correction factor (Cc/Ic)	Statistical Evaluation	
313.6	313.5	1.0005		
178.6	176.8	1.0101	Correlation Coefficient	0.999972
89.0	86.6	1.0276		
0.0	-1.4	N/A	Slope	0.995335
			Intercept	2.094589



O3 Calibration



February 16, 2005

Calibration Report

Parameter **NOx-NO-NO₂**
 Air Monitoring Network **Palliser Airshed**



Station Information

Calibration Date February 16, 2005 Previous Calibration January 18, 2005
 Station Number 1 Station Location Crescent Heights

Reason: Routine Installation Removal Other: _____

Start Time (MST) 9:00 - 10:30 End Time (MST) 17:00 - 20:45
 Barometric Pressure 0.924 ATM Station Temperature 20.0 Deg C
 Calibrator Envionics 6100 Serial Number 3016
 NO Cal Gas Conc 49.8 ppm Cal Gas Expiry Date 12-Dec-05
 NOx Cal Gas Conc 49.9 ppm Cal Gas Serial # ALM011558

DACS Information

DACS make FOCUS AP1000 DACS serial No. 45270

Parameter		NO2	NOx	NO
Before	DACS slope	0.050000	0.050000	0.050000
	DACS offset	0.000000	0.000000	0.000000
After	DACS slope	0.050000	0.050000	0.050000
	DACS offset	0.000000	0.000000	0.000000
Before	Data Slope	0.998739	1.005356	1.009629
	Data Offset	-0.203274	0.275329	0.247564
After	Data Slope	0.998427	0.996635	1.003811
	Data Offset	-1.761479	-0.930582	-0.771769
Channel #		8	6	7
Voltage Range		0 - 1 VDC	0 - 1 VDC	0 - 1 VDC

Analyzer Information

Analyzer make/model API Model 200E Analyzer serial # 219

Test Point	before		after	
Concentration range	0 - 500	ppb	0 - 500	ppb
NO background	0.1	mV	-1.1	mV
NOx background	2.3	mV	0.9	mV
NO coefficient	1.647		1.704	
NOx coefficient	1.651		1.703	
Chamber Temp	50.0	Deg C	50.0	Deg C
Cooler Temp	7.2	Deg C	7.1	Deg C
Azero	32.5		32.9	
Perm Temp	40.1	Deg C	40.2	Deg C
Pressure	3.6	inches Hg	3.6	inches Hg
Sample Flow	450.0	ccm	460.0	ccm

Notes: Analyzer was zero and span adjusted.

Calibration Report

Parameter **NOx-NO-NO₂**
 Air Monitoring Network **Palliser Airshed**



Station Information

Calibration Date: February 16, 2005 Station Location: Crescent Heights

Calibration Data

	Dilution flow rate (ccm)	Source gas flow rate (ccm)	Calculated NOx conc (ppb)	Calculated NO conc (ppb)	Calculated NO2 conc (ppb)	Indicated NOx conc (ppb)	Indicated NO conc (ppb)	Indicated NO2 conc (ppb)	NOx Correction factor	NO Correction factor
zero	4993	0.00	0.0	0.0	0.0	0.3	0.1	0.2	N/A	N/A
1	4993	39.97	396.3	395.5	0.8	398.1	394.1	4.6	0.9955	1.0035
2	4993	19.97	198.8	198.4	0.4	201.1	199.6	1.7	0.9883	0.9938
3	4993	9.97	99.4	99.2	0.2	101.1	99.7	1.3	0.9840	0.9953
AFZ	4993	0.00	0.0	0.0	0.0	7.6	0.3	7.4	0.0000	0.0000
AFS	4993	39.97	396.3	395.5	0.8	385.9	382.7	3.8	1.0269	1.0333
Average Correction Factor									0.9892	0.9975

As Found Concentrations NO_x= 378.5 NO= 382.6 As Found Percent Change NO_x= -4.5% NO= -3.3%

GPT Calibration Data

Dilution Flow 4993 ccm Source Gas Flow 39.97 ccm

O3 Setpoint (ppb)	Calculated NOx conc (ppb)	Calculated NO conc (ppb)	Calculated NO2 conc (ppb)	Indicated NOx conc (ppb)	Indicated NO conc (ppb)	Indicated NO2 conc (ppb)	NOx Correction factor	NO Correction factor	NO2 Correction factor	Converter Efficiency
0	398.2	393.1	5.1	399.2	392.4	0.2	N/A	N/A	N/A	N/A
350	398.2	84.6	313.6	399.7	85.0	314.7	0.9962	0.9947	0.9967	100.3%
200	398.2	219.6	178.6	401.2	219.6	182.1	0.9924	1.0003	0.9807	102.0%
100	398.2	309.2	89.0	400.5	308.8	92.2	0.9944	1.0013	0.9653	103.6%
Average Correction Factor							0.9943	0.9988	0.9809	102.0%

AIC Data

Parameter	Previous calibration				Current calibration			
	NOx	NO2	NO		NOx	NO2	NO	
Auto zero	0.4	0.0	0.0	ppb	1.5	-0.6	0.6	ppb
Auto span	474.5	463.0	8.3	ppb	474.9	466.2	8.4	ppb

Calibration Performed By: Kelly Baragar

Calibration Summary

Parameter NO₂
 Air Monitoring Network Palliser Airshed

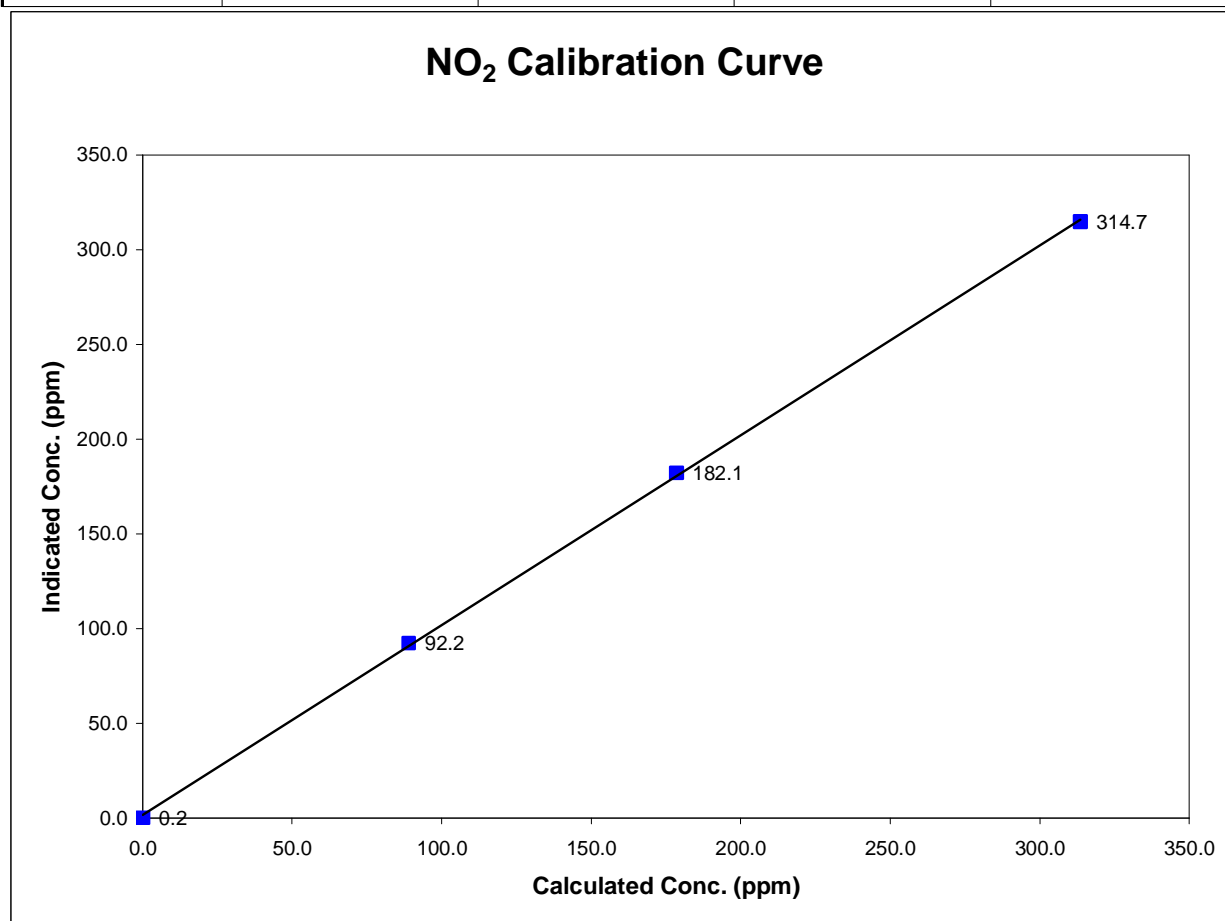


Station Information

Calibration Date	February 16, 2005	Previous Calibration	January 18, 2005
Station Number	1	Station Location	Crescent Heights
Start Time (MST)	9:00 - 10:30	End Time (MST)	17:00 - 20:45
Analyzer make	API Model 200E	Analyzer serial #	219

Calibration Data

Calculated conc (ppb) (Cc)	Indicated concentration (ppb) (Ic)	Correction factor (Cc/Ic)	Statistical Evaluation	
0.0	0.2	0.0000	Correlation Coefficient	0.999858
89.0	92.2	0.9653		
178.6	182.1	0.9807		
313.6	314.7	0.9967		
			Slope	0.998427
			Intercept	-1.761479



Calibration Summary

Parameter NO_x
 Air Monitoring Network Palliser Airshed

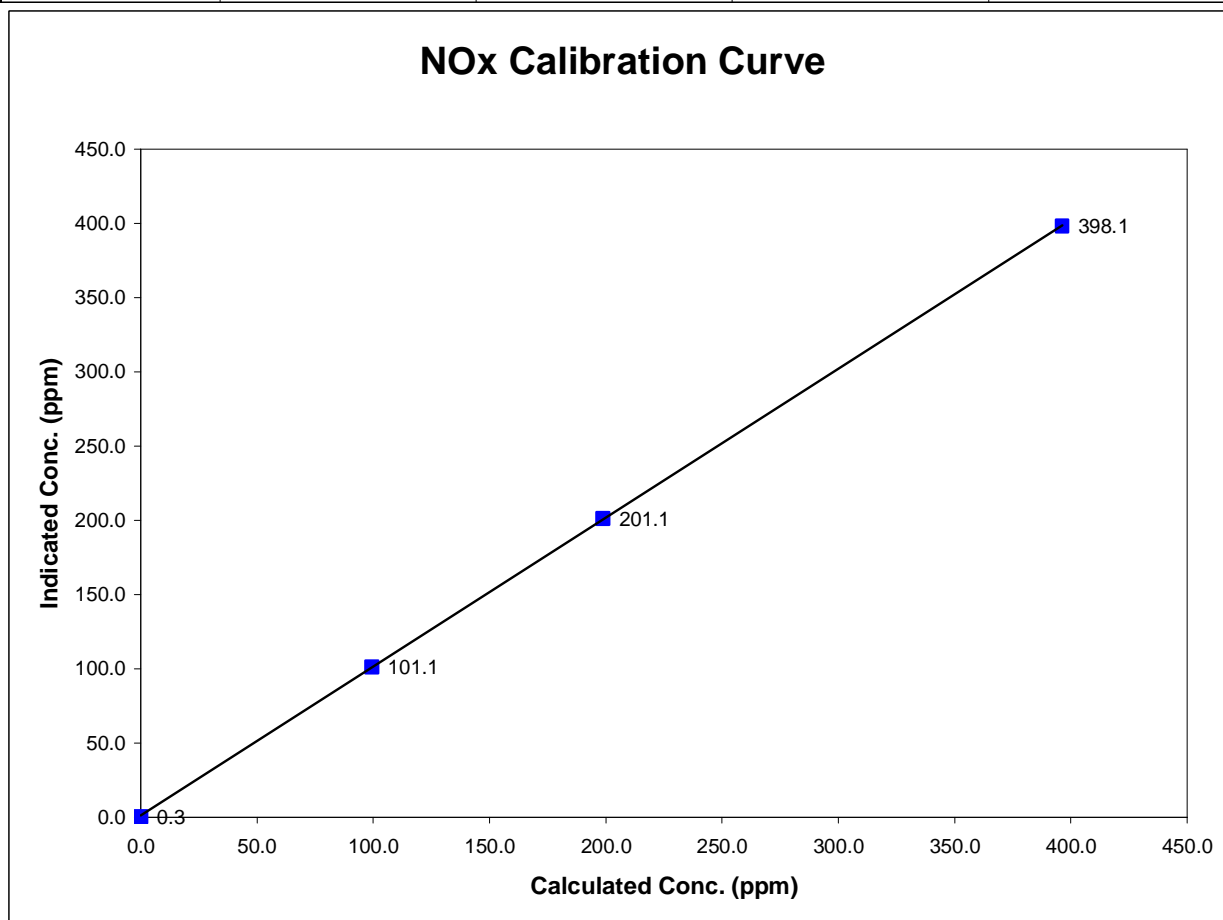


Station Information

Calibration Date	February 16, 2005	Previous Calibration	January 18, 2005
Station Number	1	Station Location	Crescent Heights
Start Time (MST)	9:00 - 10:30	End Time (MST)	17:00 - 20:45
Analyzer make	API Model 200E	Analyzer serial #	219

Calibration Data

Calculated conc (ppb) (Cc)	Indicated concentration (ppb) (Ic)	Correction factor (Cc/Ic)	Statistical Evaluation	
0.0	0.3	0.0000	Correlation Coefficient	0.999985
396.3	398.1	0.9955		
198.8	201.1	0.9883		
99.4	101.1	0.9840		
			Slope	0.996635
			Intercept	-0.930582



Calibration Summary

Parameter NO
 Air Monitoring Network Palliser Airshed

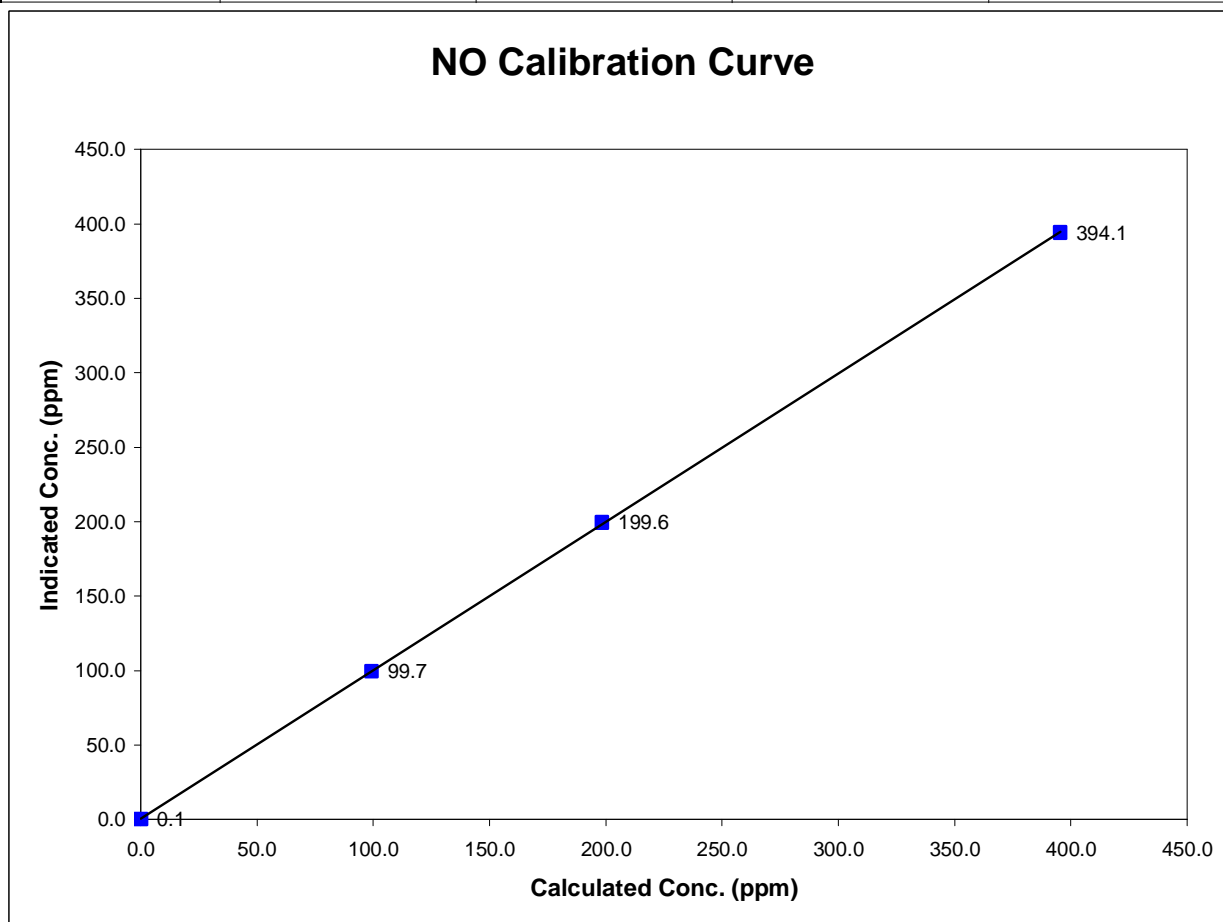


Station Information

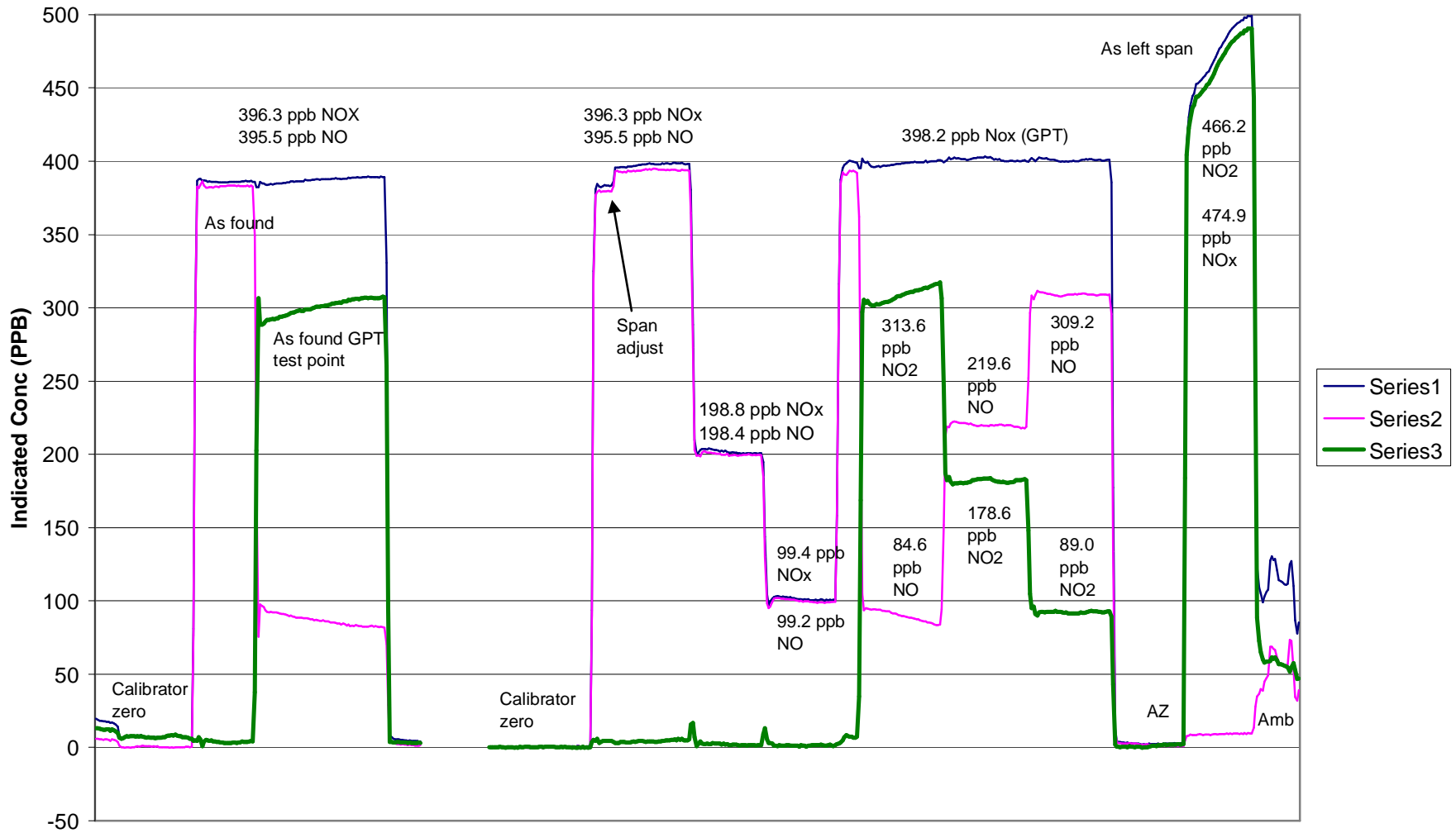
Calibration Date	February 16, 2005	Previous Calibration	January 18, 2005
Station Number	1	Station Location	Crescent Heights
Start Time (MST)	9:00 - 10:30	End Time (MST)	17:00 - 20:45
Analyzer make	API Model 200E	Analyzer serial #	219

Calibration Data

Calculated conc (ppb) (Cc)	Indicated concentration (ppb) (Ic)	Correction factor (Cc/Ic)	Statistical Evaluation	
0.0	0.1	N/A		
395.5	394.1	1.0035	Correlation Coefficient	0.999973
198.4	199.6	0.9938		
99.2	99.7	0.9953		
			Slope	1.003811
			Intercept	-0.771769



NOx Calibration



February 16, 2005

Calibration Report

Parameter THC
 Air Monitoring Network Palliser Airshed



Station Information

Calibration Date	Feb 16 & 17, 2005	Previous Calibration	January 18, 2005
Station Number	1	Station Location	Crescent Heights
Reason:	<input checked="" type="checkbox"/> Routine	<input type="checkbox"/> Install	<input type="checkbox"/> Removal
			<input type="checkbox"/> Other:
Start Time (MST)	10:30 - 11:30 Feb 16th	End Time (MST)	8:38 - 11:05 Feb 17th
Barometric Pressure	0.927 ATM	Station Temperature	21.0 Deg C
Calibrator	EnviroNics 6100	Serial Number	3016
Cal Gas Concentration	700 ppm CH ₄ / 301 ppm C ₃ H ₈	Cal Gas Expiry Date	8/28/2005
Cal Gas CH ₄ equiv	1527.75 ppm	Cal Gas Cylinder #	ALM030358
DACS make	Focus AP1000	DACS serial No.	45270
DACS voltage range	0 - 10 volt	DACS channel #	9
	<u>Before</u>		<u>After</u>
DACS slope	0.005000	DACS slope	0.005000
DACS intercept	0.000000	DACS intercept	0.000000
Calculated slope	1.005134	Calculated slope	1.008397
Calculated intercept	-0.059267	Calculated intercept	-0.058267
Analyzer make	TEI model 51C-LT	Analyzer serial #	407505596

	before		after	
Concentration range	0 - 50	ppm	0 - 50	ppm
THC sample pressure	5.74	PSI	5.74	PSI
THC span counts	10818	raw	10690	raw
THC zero counts	1711	raw	1711	raw

Calibration Data

Dilution air flow rate (cc/min)	Source gas flow rate (cc/min)	Calculated concentration (ppm) (Cc)	Indicated concentration (ppm) (Ic)	Correction factor (Cc/Ic)
2994	0.00	0.00	0.04	N/A
2994	39.98	20.13	20.02	1.0055
2994	19.98	10.13	10.08	1.0047
2994	9.97	5.07	5.13	0.9883
zero	0.00	0.00	0.01	As Found Zero
2994	39.98	20.13	20.03	As Found Span
Average Correction Factor				0.9995

Calculated value of As Found Response: 20.061 ppm Percent Change of As Found: 0.4%

	before calibration		after calibration	
Auto zero	-0.07	ppm	-0.03	ppm
Auto span	22.82	ppm	22.08	ppm

Notes: Analyzer was zero and span adjusted. Replaced internal span cylinder.

Calibration Performed By: Kelly Baragar

Calibration Summary

Parameter THC
 Air Monitoring Network Palliser Airshed

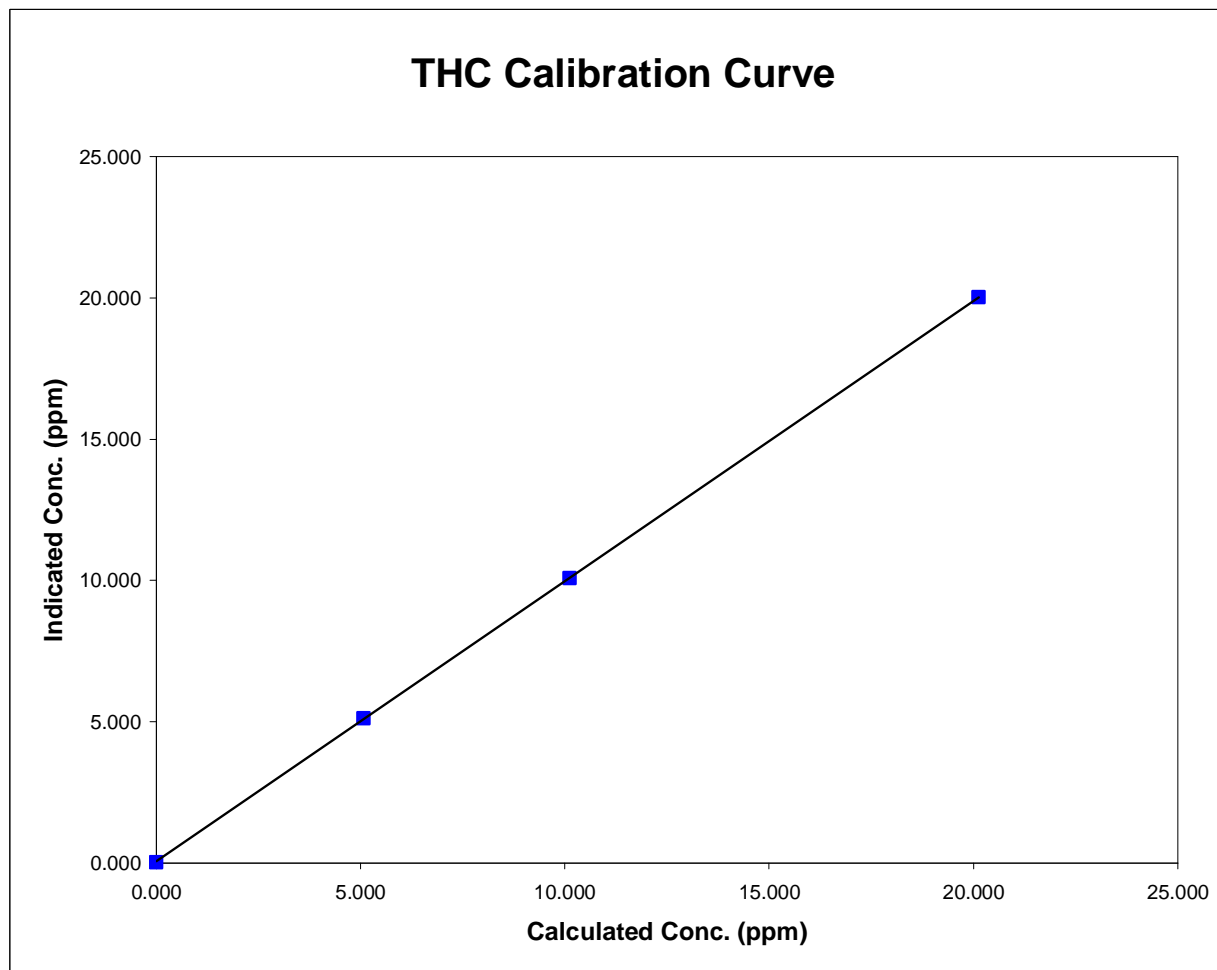


Station Information

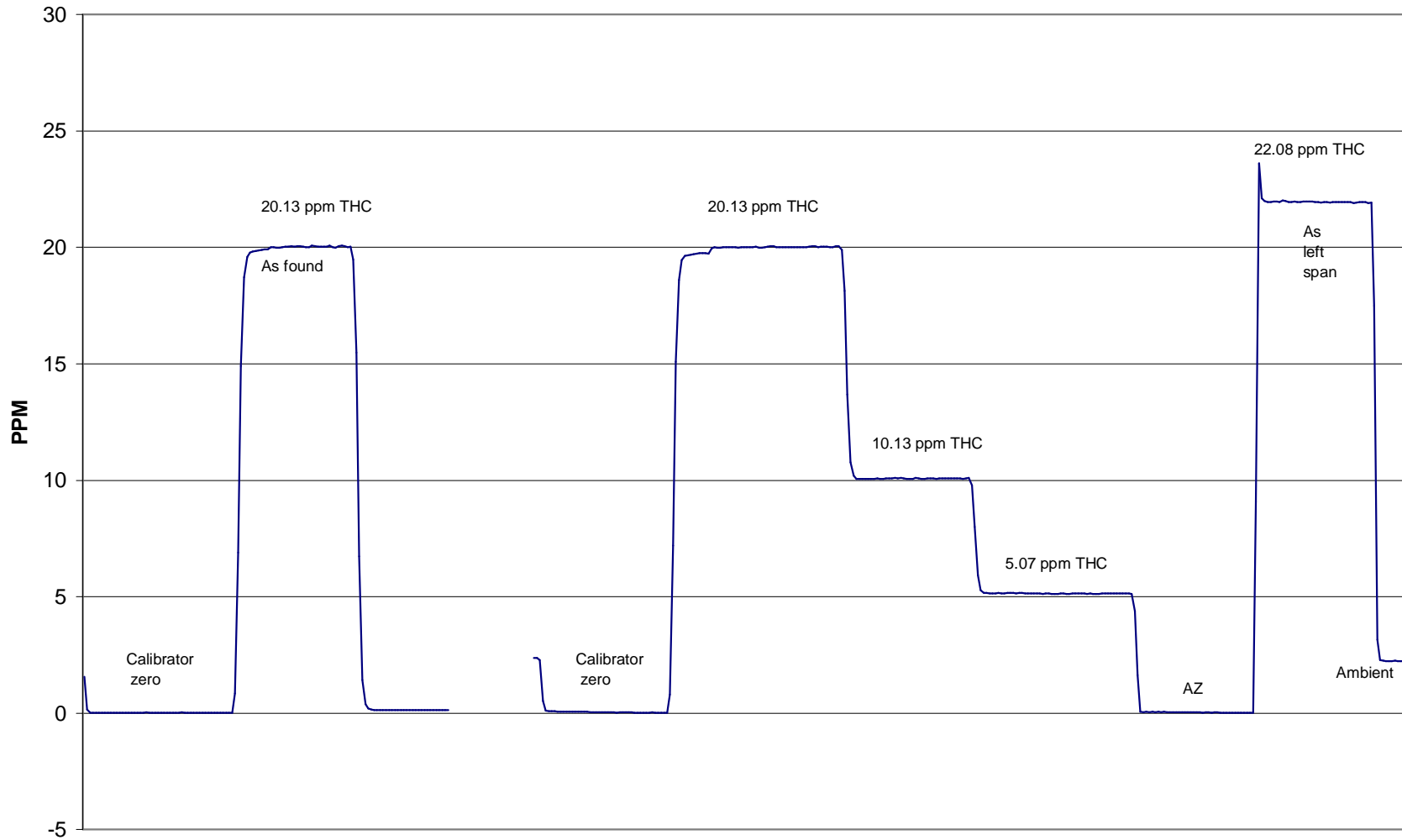
Calibration Date	Feb 16 & 17, 2005	Previous Calibration	January 18, 2005
Station Number	1	Station Location	Crescent Heights
Start Time (MST)	10:30 - 11:30 Feb 16th	End Time (MST)	8:38 - 11:05 Feb 17th
Analyzer make/model	TEI model 51C-LT	Analyzer serial #	407505596

Calibration Data

Calculated concentration (ppm) (Cc)	Indicated concentration (ppm) (Ic)	Correction factor (Cc/Ic)	Statistical Evaluation	
0.000	0.035	N/A		
20.132	20.021	1.0055	Correlation Coefficient	0.999987
10.128	10.080	1.0047		
5.071	5.130	0.9883	Slope	1.008397
			Intercept	-0.058267



THC Calibration



Feb 16 & 17, 2005

Calibration Report



Parameter PM2.5
 Air Monitoring Network Palliser Airshed

Station Information

Calibration Date	February 17, 2005	Previous Calibration	January 18, 2005
Station Number	1	Station Location	Crescent Heights
Reason:	<input checked="" type="checkbox"/> Routine	<input type="checkbox"/> Install	<input type="checkbox"/> Removal
			<input type="checkbox"/> Other:
Start Time (MST)	10:10	End Time (MST)	11:45
Barometric Pressure	0.927 ATM	Station Temperature	20.5 Deg C
Flow Calibrator	BIOS Drycal DCL-MH	Serial Number	101780
DACS make	AP 1000	DACS serial No.	45269
DACS voltage range	0 - 1 V	DACS channel #	15
	<u>Before</u>		<u>After</u>
DACS slope	0.050000	DACS slope	0.050000
DACS intercept	-50.000000	DACS intercept	-50.000000

Analyzer Information

Analyzer make	R&P	Control Unit serial #	140AB237960110
Analyzer model	TEOM 1400AB	Sensor Unit serial #	140AB237960110

	before		after	
Main Flow Set Point	3.000	SLPM	3.000	SLPM
Aux Flow Set Point	16.67	SLPM	16.67	SLPM
Filter Load	45	%	45	%
Ko Factor	12758		12758	
Temperature	-0.2	Deg C	-0.2	Deg C
Pressure	0.933	ATM	0.933	ATM

Calibration Data

Parameter	Set Point	Indicated Reading (measured externally)	Tolerance	TEOM Reading
zero flow - main	0.0	0.00		0.08
zero flow - auxillary	0.0	0.00		0.09
flow recovery - main	45 - 60 Seconds	NA	45 - 60 Seconds	45
flow recovery - aux	46 - 60 Seconds	NA	46 - 60 Seconds	45
Temperature	measured	0.7	+/- 1.0 Deg C	-0.2
Pressure	measured	0.927	+/- 1.5% ΔATM	0.933
Total Flow	16.67 SLPM	16.70		16.70
Main Flow	13.67 SLPM	13.70	+/- 1.0 SLPM	13.70
Auxillary Flow	3.0 SLPM	3.020	+/- 0.2 SLPM	3.020
Leak Check - main	0.0	0.00	<0.15 SLPM	0.06
Leak Check - aux	0.0	0.00	<0.15 SLPM	0.09
Ko Factor (w/o filter)	measured	328.757	filter weight (g)	0.11352
Ko Factor (w/ filter)	measured	234.727	% Ko difference	0.0%

Notes: Complete audit performed. All parameters appear to be within specifications.
Also measured with Streamline pressure differential measurement. Flows appear fine.
Cleaned inlet head.

Calibration Performed By: Kelly Baragar