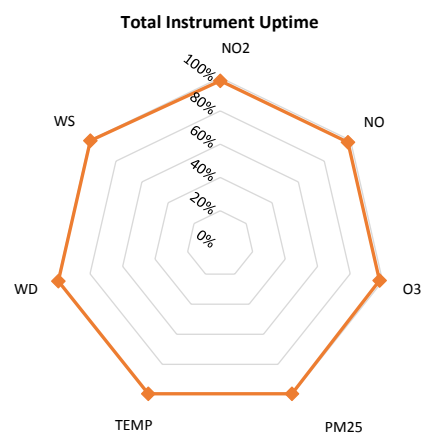
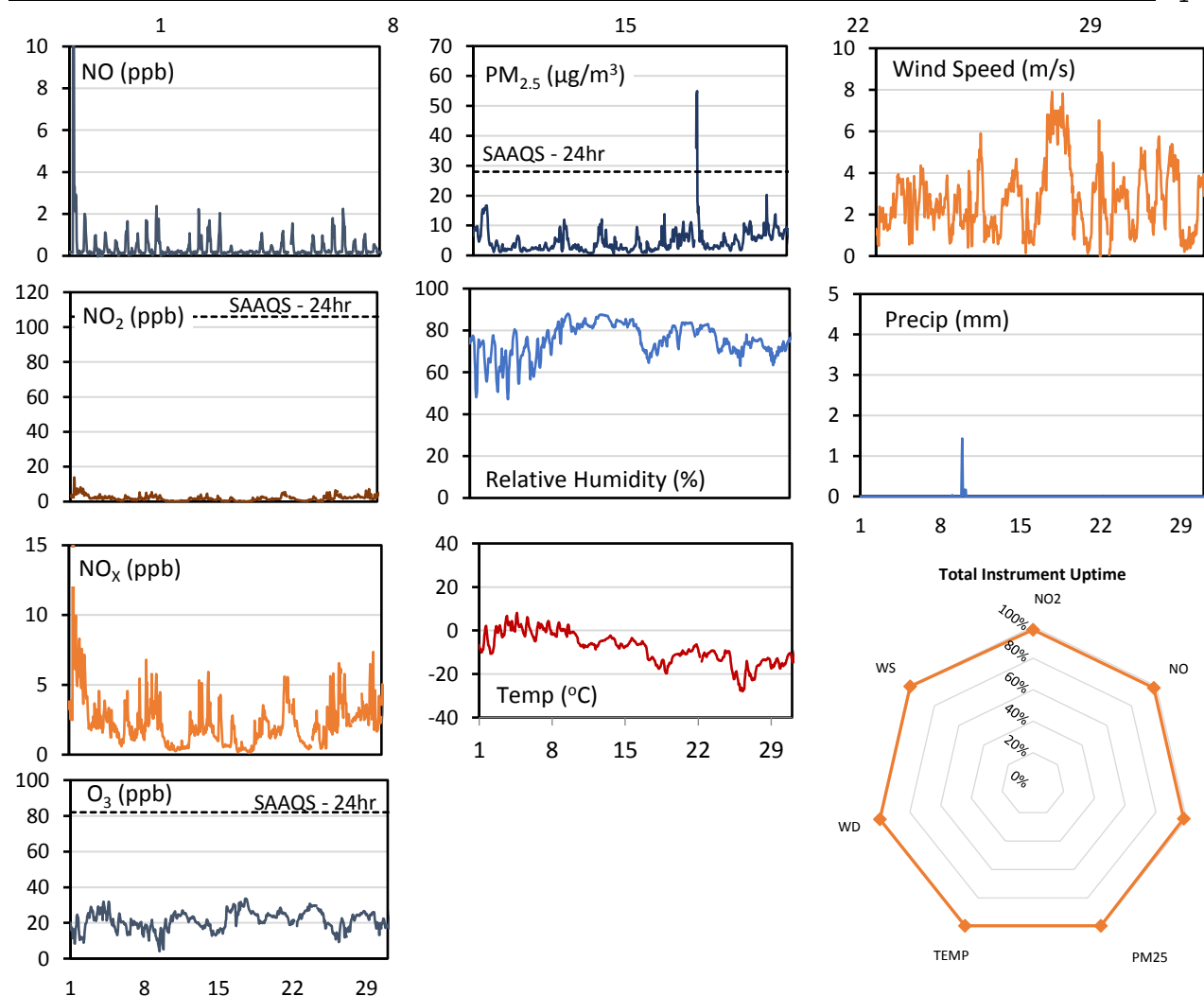
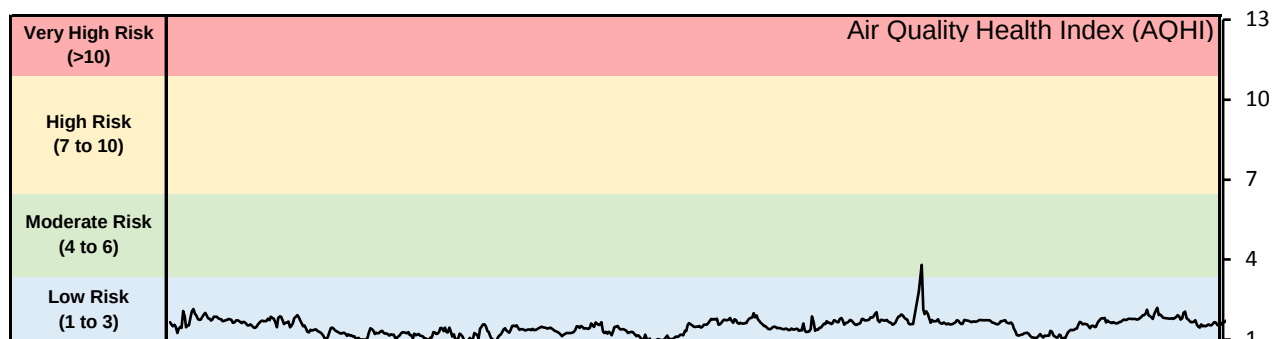


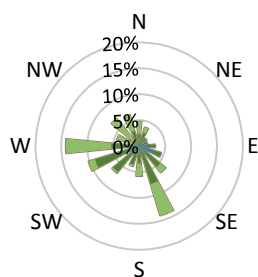
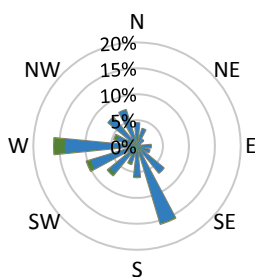
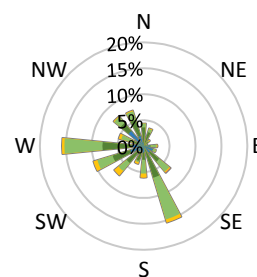
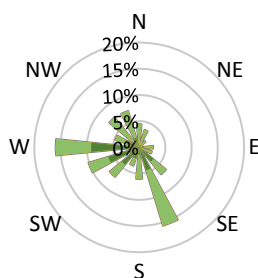
SESAA Esterhazy Station - December 2015 Summary Report

Pollutants		Month Records		24-Hour Records				1-Hour Records			
Name	Conc. Unit	Avg. Conc.	Total Uptime	Maximum		SAAQS Standard	Exceed Days	Maximum		SAAQS Standard	Exceed Hours
				Conc.	Time			Conc.	Time		
NO	ppb	0.4	98%	2.3	Dec-01	-	-	21.8	Dec-01 09:00	-	-
NO ₂	ppb	2.0	98%	5.2	Dec-01	106	0	13.9	Dec-01 09:00	159	0
NO _x	ppb	2.4	98%	7.6	Dec-01	-	-	35.7	Dec-01 09:00	-	-
O ₃	ppb	21.5	98%	30.3	Dec-17	-	-	33.7	Dec-17 13:00	82	0
PM _{2.5}	µg/m ³	4.7	100%	13.6	Dec-22	28	0	55.0	Dec-22 10:00	-	-

SAAQS: Saskatchewan Ambient Air Quality Standards



Wind Rose


NO₂ Pollutant Rose

PM_{2.5} Pollutant Rose

O₃ Pollutant Rose


Parameters	Unit	Color Code for Wind Speed and Pollution Concentration Class					
Wind Speed	m/s	$0.3 \leq WS < 1.4$	$1.4 \leq WS < 3.1$	$3.1 \leq WS < 7.8$	$7.8 \leq WS < 10.8$	$10.8 \leq WS < 13.6$	$WS \geq 13.6$
O ₃	ppb	$0 \leq C < 10$	$10 \leq C < 20$	$20 \leq C < 40$	$40 \leq C < 60$	$60 \leq C < 82$	$C \geq 82$
NO ₂	ppb	$0 \leq C < 5$	$5 \leq C < 15$	$15 \leq C < 30$	$30 \leq C < 100$	$100 \leq C < 212$	$C \geq 212$
PM _{2.5}	ug/m ³	$0 \leq C < 2$	$2 \leq C < 4$	$4 \leq C < 10$	$10 \leq C < 20$	$20 \leq C < 30$	$C \geq 30$

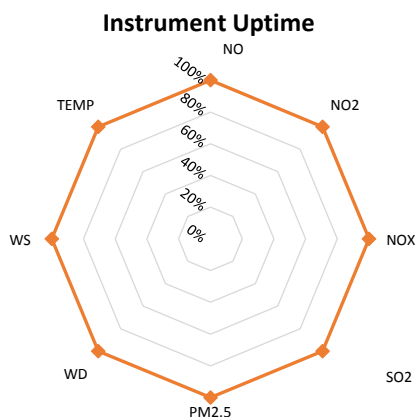
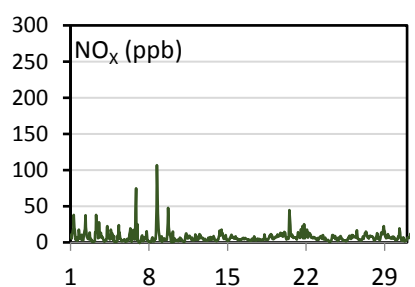
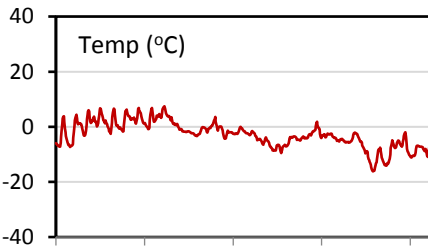
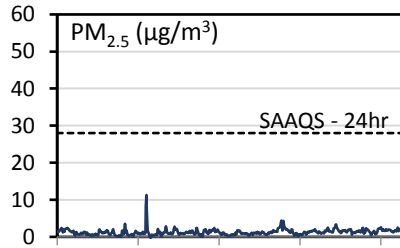
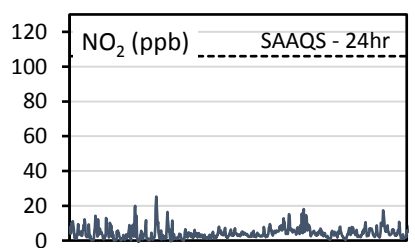
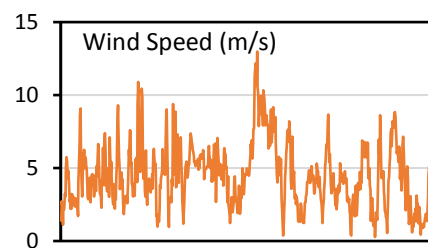
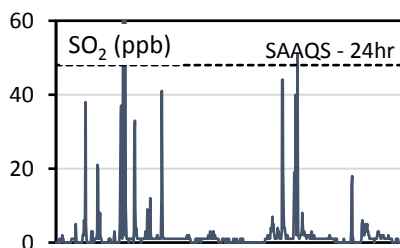
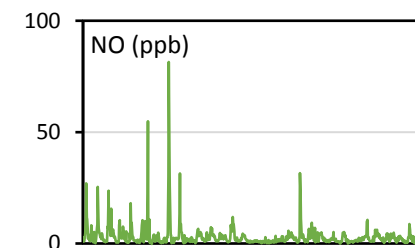
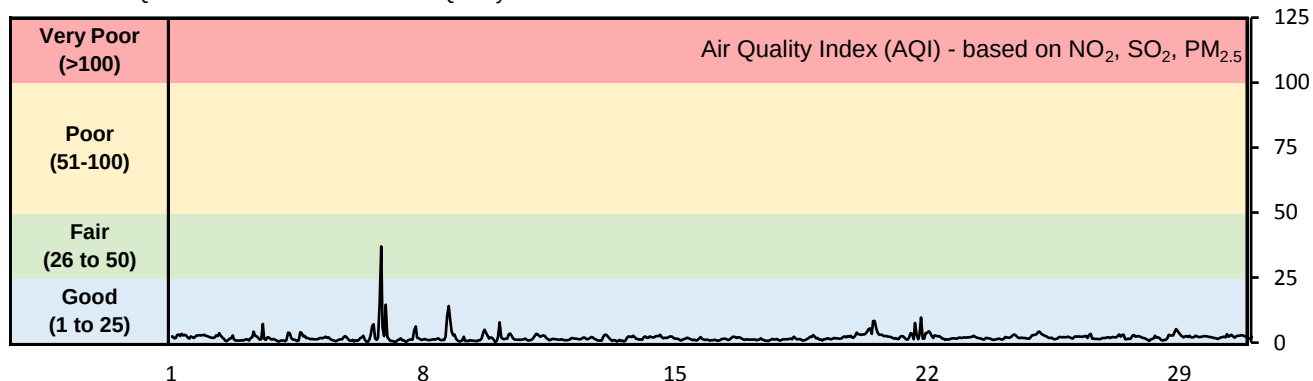
Monthly Update

- Achieved >99% of scheduled uptime for all parameters
- Downtime of 4% results from routine daily Internal Zeroes and Spans
- All compliance parameters are above 90% data validity; no operational issues

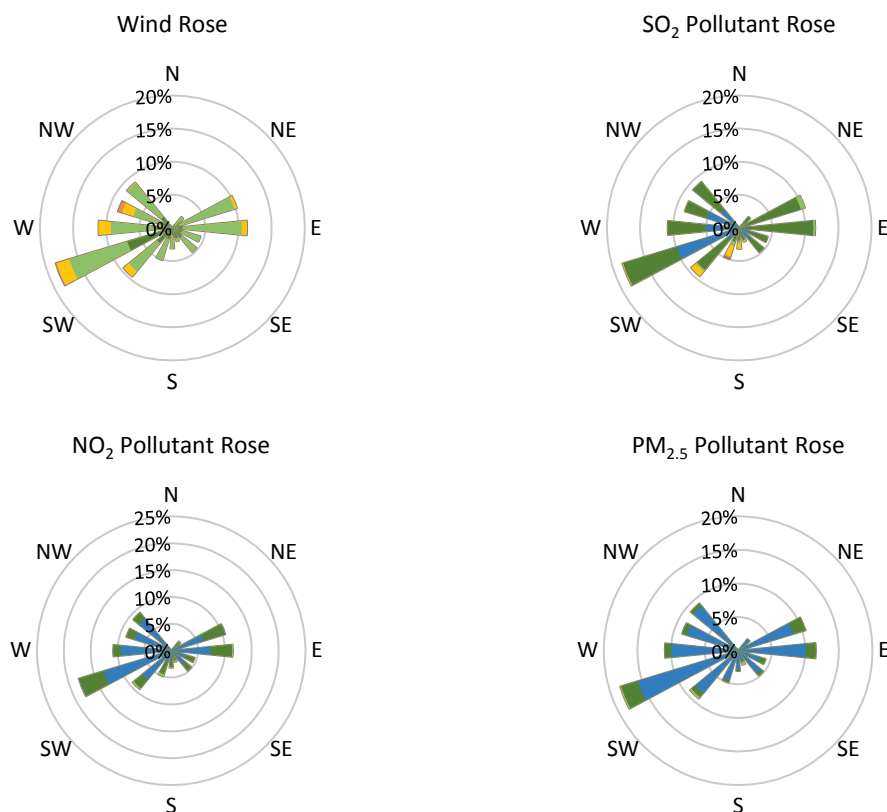
SESAA Estevan Station - December 2015 Summary Report

Pollutants		Month Records		24-Hour Records				1-Hour Records			
Name	Conc. Unit	Avg. Conc.	Uptime	Maximum		SAAQS Standard	Exceed Days	Maximum		SAAQS Standard	Exceed Hours
				Conc.	Time			Conc.	Time		
NO	ppb	3.0	100%	9.2	Dec-08	-	-	81.5	Dec-08 17:00	-	-
NO ₂	ppb	4.3	100%	7.4	Dec-20	106	0	25.3	Dec-08 17:00	159	0
NO _x	ppb	7.3	100%	14.7	Dec-08	-	-	106.7	Dec-08 17:00	-	-
SO ₂	ppb	2.4	100%	20.6	Dec-06	48	0	196.0	Dec-06 20:00	172	1
PM _{2.5}	µg/m ³	1.3	100%	2.6	Dec-20	28	0	11.3	Dec-08 17:00	-	-

SAAQS: Saskatchewan Ambient Air Quality Standards



SESAA Estevan Station - December 2015 Summary Report



Parameters	Unit	Color Code for Wind Speed and Pollution Concentration Class						
Wind Speed	m/s	$0.3 \leq WS < 1.4$	$1.4 \leq WS < 3.1$	$3.1 \leq WS < 7.8$	$7.8 \leq WS < 10.8$	$10.8 \leq WS < 13.6$	$WS \geq 13.6$	
NO ₂	ppb	$0 \leq C < 5$	$5 \leq C < 15$	$15 \leq C < 30$	$30 \leq C < 100$	$100 \leq C < 212$	$C \geq 212$	
SO ₂	ppb	$1 \leq C < 5$	$6 \leq C < 15$	$16 \leq C < 30$	$31 \leq C < 100$	$101 \leq C < 212$	$C \geq 213$	
PM _{2.5}	$\mu\text{g}/\text{m}^3$	$0 \leq C < 2$	$2 \leq C < 4$	$4 \leq C < 10$	$10 \leq C < 20$	$20 \leq C < 30$	$C \geq 30$	

Monthly Update

- Achieved 100% of scheduled uptime for all parameters
- All compliance parameters are above 90% data validity; no operational issues

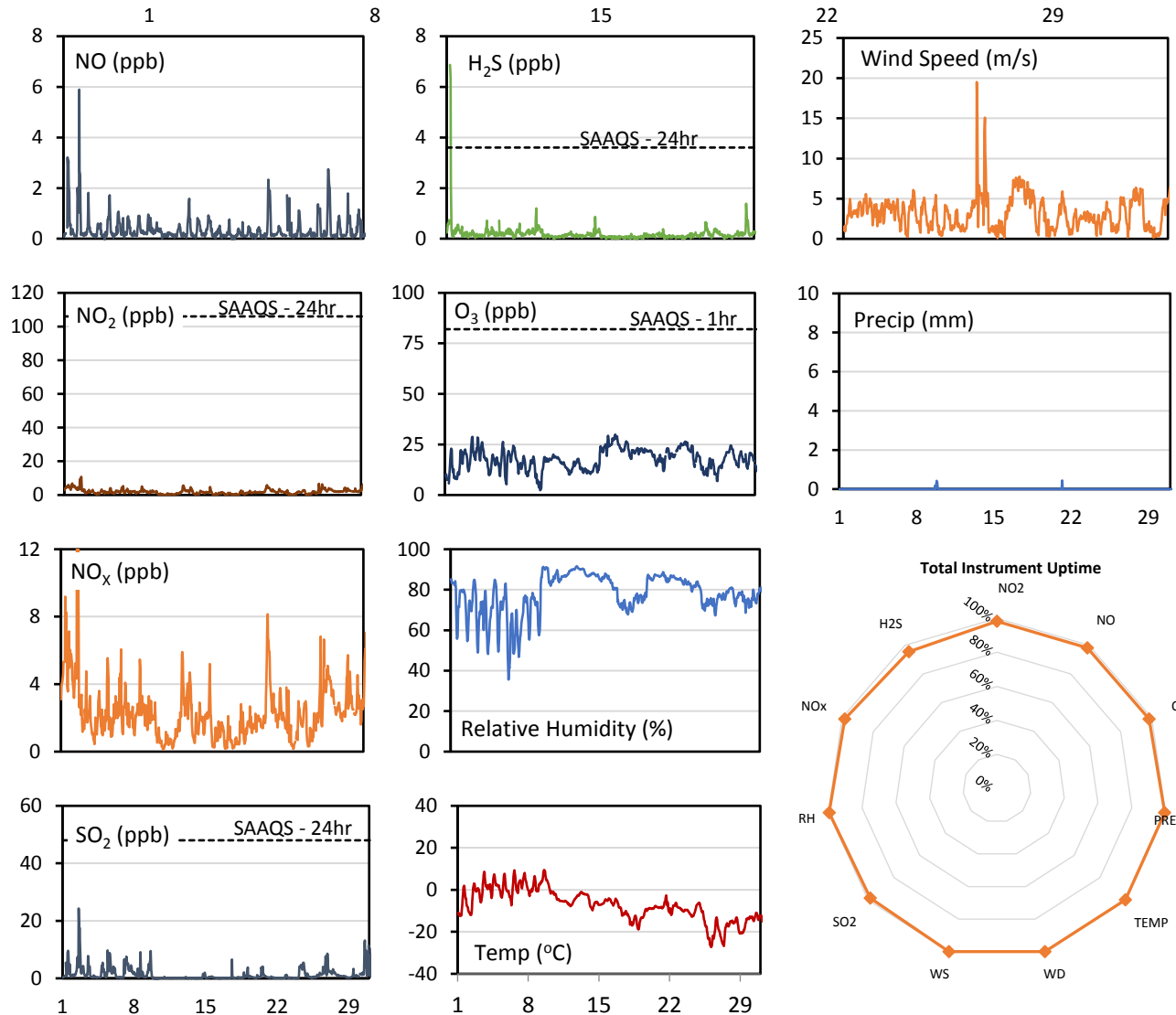
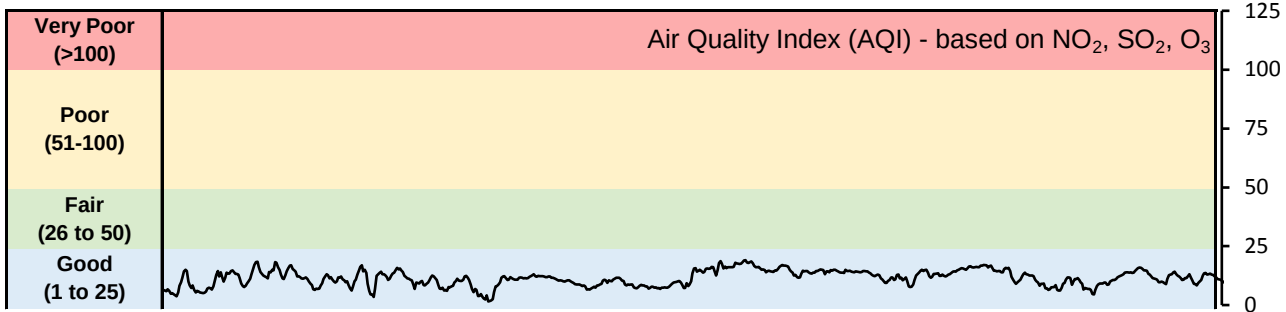
Exceedance Summary (1- Hour Average - Exceedances Highlighted)

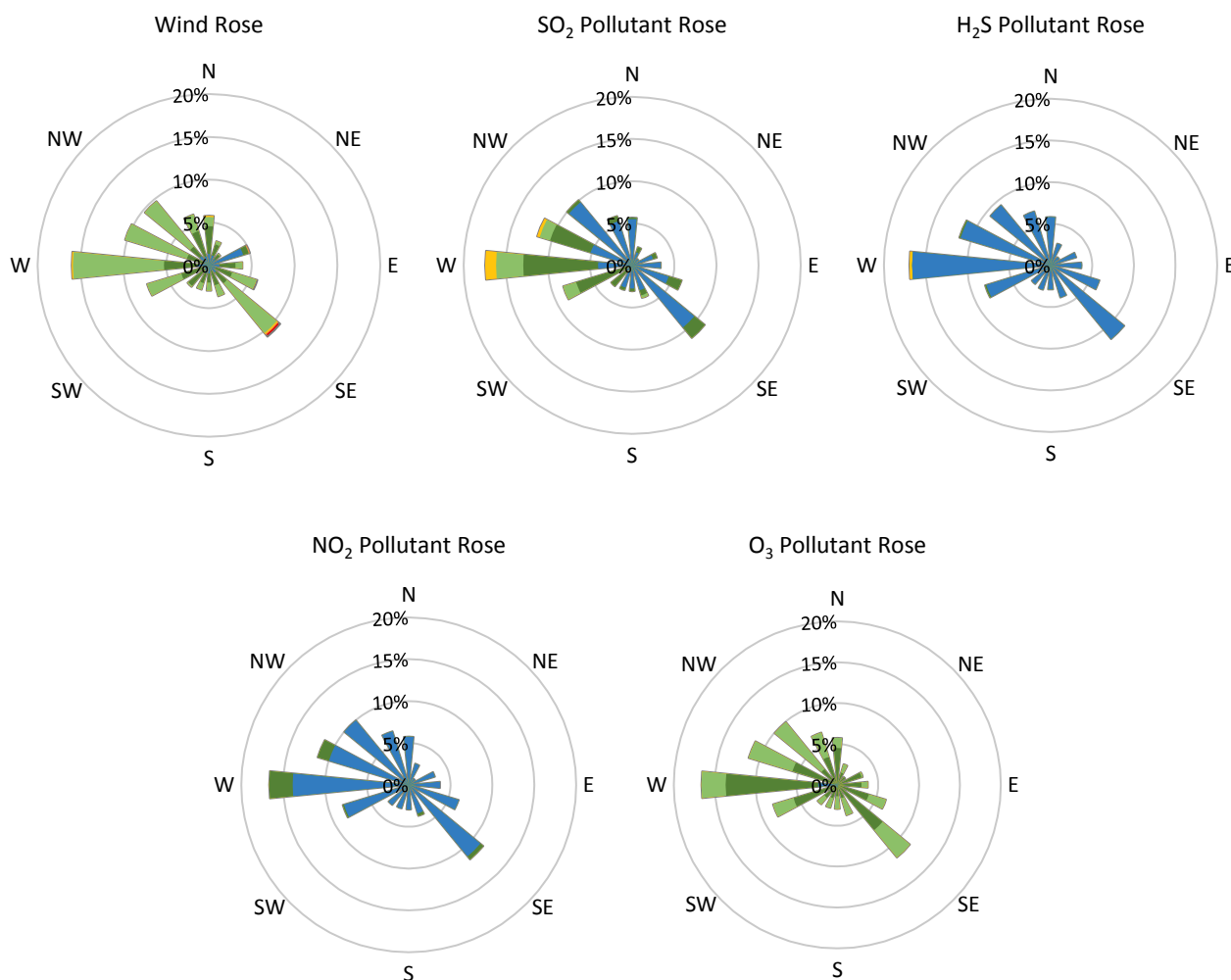
Exceedance Time	AQI	NO	NO ₂	NO _x	SO ₂	PM _{2.5}	WD	WS	TEMP
	-	ppb	ppb	ppb	ppb	$\mu\text{g}/\text{m}^3$	deg	m/s	°C
Dec-06 20:00	37.0	54.9	19.9	74.8	196.0	2.6	206.5	3.9	3.7

SESAA Glen Ewen Station - December 2015 Summary Report

Pollutants		Month Records		24-Hour Records				1-Hour Records			
Name	Conc. Unit	Avg. Conc.	Total Uptime	Maximum		SAAQS Standard	Exceed Days	Maximum		SAAQS Standard	Exceed Hours
				Conc.	Time			Conc.	Time		
NO	ppb	0.4	98%	0.9	Dec-02	-	-	5.9	Dec-02 14:00	-	-
NO ₂	ppb	2.0	98%	4.7	Dec-01	106	0	10.8	Dec-02 17:00	159	0
NO _x	ppb	2.3	98%	5.5	Dec-02	-	-	15.1	Dec-02 14:00	-	-
SO ₂	ppb	1.4	98%	5.3	Dec-02	48	0	24.3	Dec-02 14:00	172	0
H ₂ S	ppb	0.2	96%	0.9	Dec-01	3.6	0	6.9	Dec-01 08:00	11	0
O ₃	ppb	17.8	98%	26.6	Dec-17	-	-	29.9	Dec-17 12:00	82	0

SAAQS: Saskatchewan Ambient Air Quality Standards





Parameters	Unit	Color Code for Wind Speed and Pollution Concentration Class					
Wind Speed	m/s	$0.3 \leq WS < 1.4$	$1.4 \leq WS < 3.1$	$3.1 \leq WS < 7.8$	$7.8 \leq WS < 10.8$	$10.8 \leq WS < 13.6$	$WS \geq 13.6$
SO ₂	ppb	$0 \leq C < 1$	$1 \leq C < 5$	$5 \leq C < 10$	$10 \leq C < 57$	$57 \leq C < 172$	$C \geq 172$
NO ₂	ppb	$0 \leq C < 5$	$5 \leq C < 15$	$15 \leq C < 30$	$30 \leq C < 100$	$100 \leq C < 212$	$C \geq 212$
H ₂ S	ppb	$0 \leq C < 1$	$1 \leq C < 3.6$	$3.6 \leq C < 5$	$5 \leq C < 8$	$8 \leq C < 10.8$	$C \geq 10.8$
O ₃	ppb	$0 \leq C < 10$	$10 \leq C < 20$	$20 \leq C < 40$	$40 \leq C < 60$	$60 \leq C < 82$	$C \geq 82$

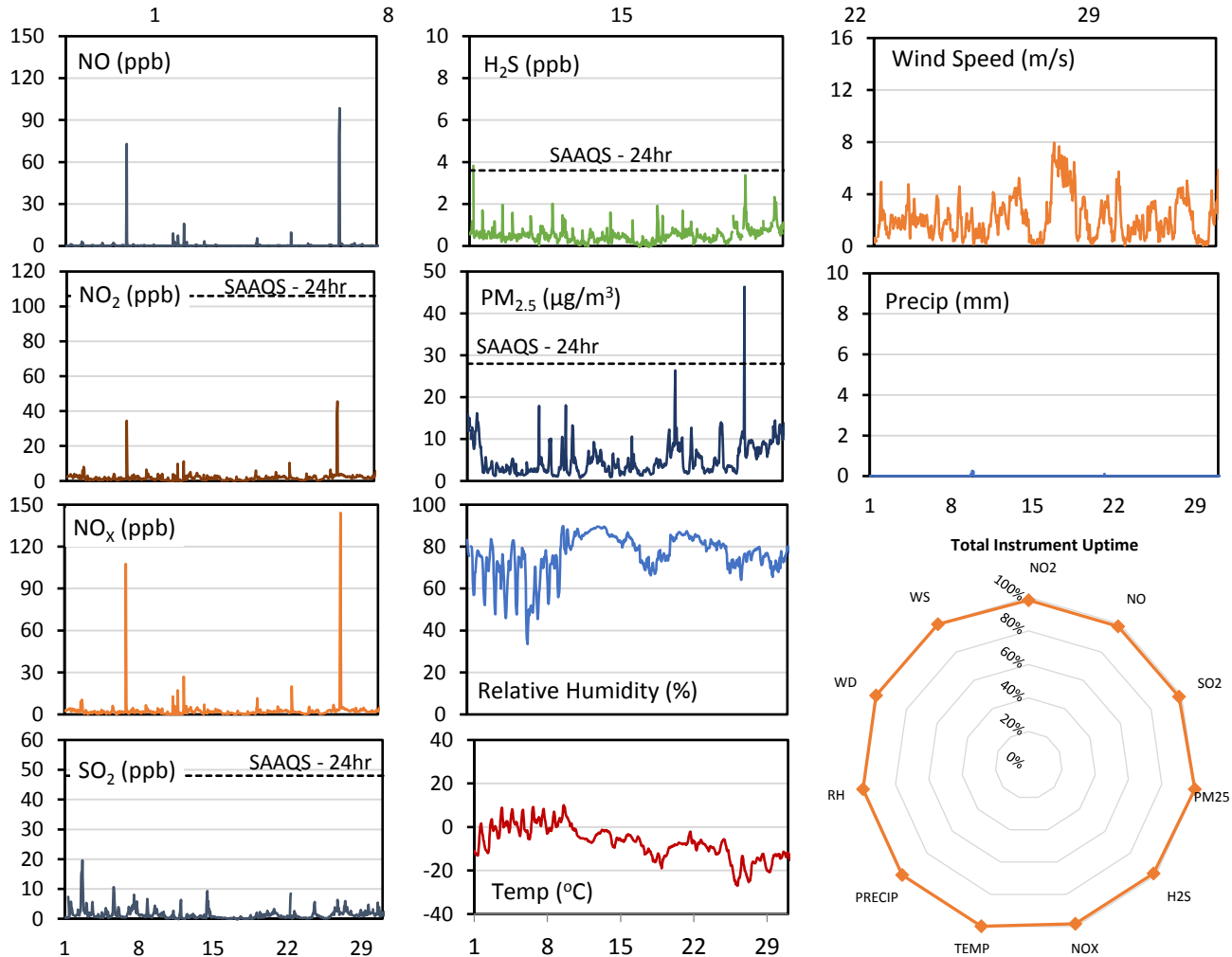
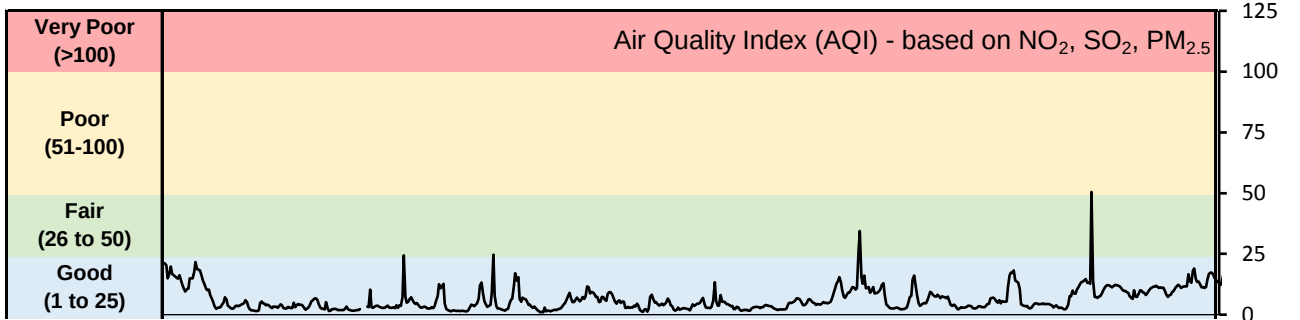
Monthly Update

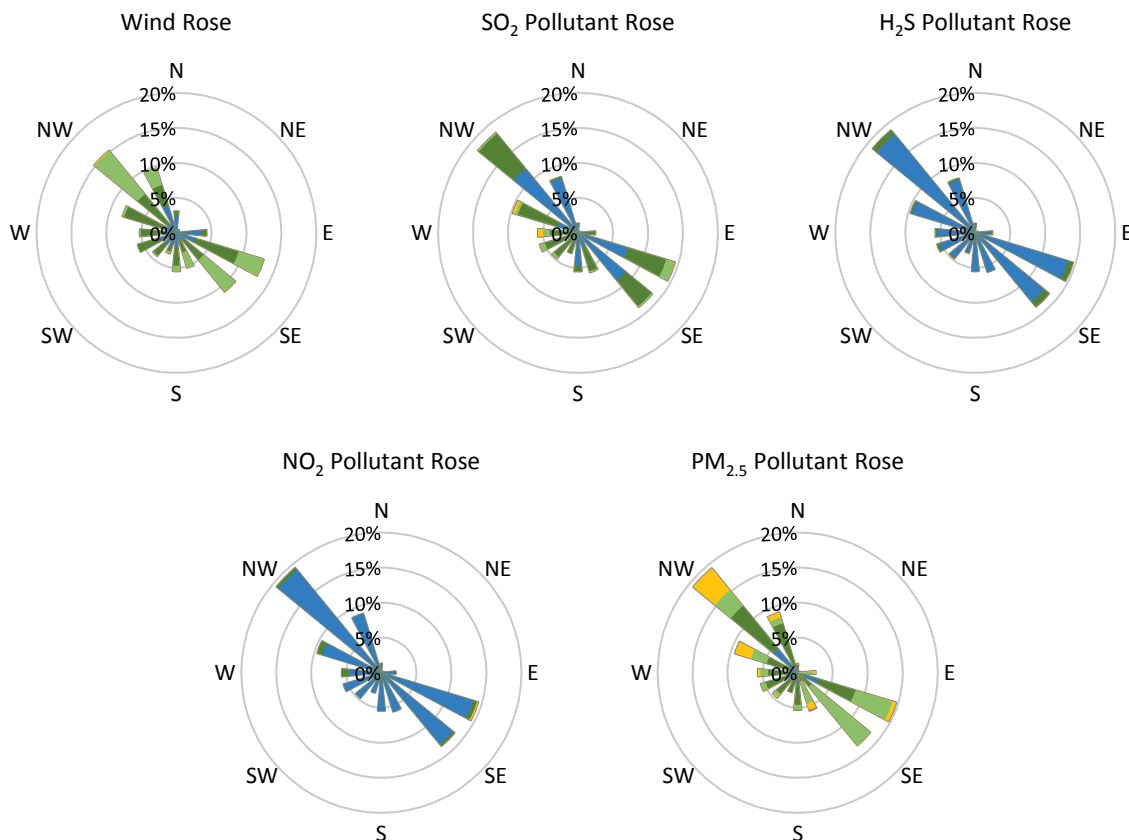
- Achieved 100% of scheduled uptime
- Downtime results from routine daily Internal Zeroes and Spans
- All compliance parameters are above 90% data validity; no operational issues

SESAA Oxbow Station - December 2015 Summary Report

Pollutants		Month Records		24-Hour Records				1-Hour Records			
Name	Conc. Unit	Avg. Conc.	Total Uptime	Maximum		SAAQS Standard	Exceed Days	Maximum		SAAQS Standard	Exceed Hours
				Conc.	Time			Conc.	Time		
NO	ppb	0.7	98%	8.4	Dec-27	-	-	98.6	Dec-27 10:00	-	-
NO ₂	ppb	1.9	98%	6.7	Dec-27	106	0	45.6	Dec-27 10:00	159	0
NO _x	ppb	2.6	98%	15.1	Dec-27	-	-	144.2	Dec-27 10:00	-	-
SO ₂	ppb	1.5	98%	4.9	Dec-02	48	0	19.6	Dec-02 16:00	172	0
H ₂ S	ppb	0.5	98%	1.1	Dec-30	3.6	0	3.8	Dec-01 09:00	11	0
PM _{2.5}	µg/m ³	5.1	100%	12.2	Dec-01	28	0	46.3	Dec-27 09:00	-	-

SAAQS: Saskatchewan Ambient Air Quality Standards





Parameters	Unit	Color Code for Wind Speed and Pollution Concentration Class						
Wind Speed	m/s	0.3 ≤ WS < 1.4	1.4 ≤ WS < 3.1	3.1 ≤ WS < 7.8	7.8 ≤ WS < 10.8	10.8 ≤ WS < 13.6	WS ≥ 13.6	
SO ₂	ppb	0 ≤ C < 1	1 ≤ C < 5	5 ≤ C < 10	10 ≤ C < 57	57 ≤ C < 172	C ≥ 172	
NO ₂	ppb	0 ≤ C < 5	5 ≤ C < 15	15 ≤ C < 30	30 ≤ C < 100	100 ≤ C < 212	C ≥ 212	
H ₂ S	ppb	0 ≤ C < 1	1 ≤ C < 3.6	3.6 ≤ C < 5	5 ≤ C < 8	8 ≤ C < 10.8	C ≥ 10.8	
PM _{2.5}	µg/m ³	0 ≤ C < 2	2 ≤ C < 4	4 ≤ C < 10	10 ≤ C < 20	20 ≤ C < 30	C ≥ 30	

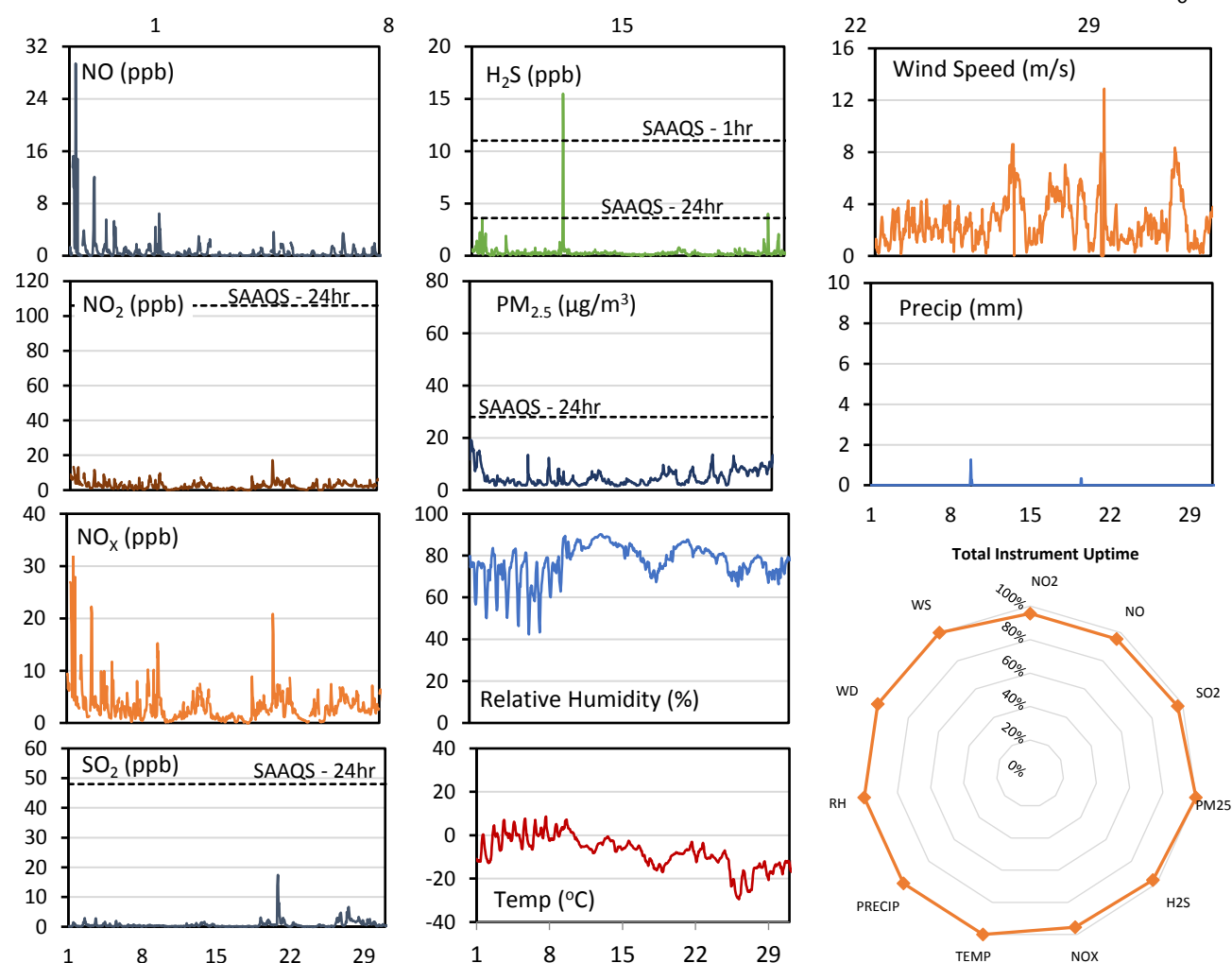
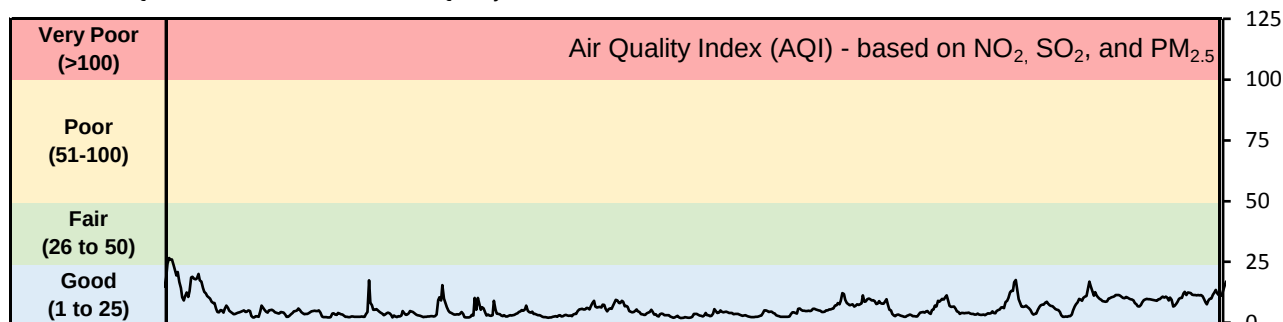
Monthly Update

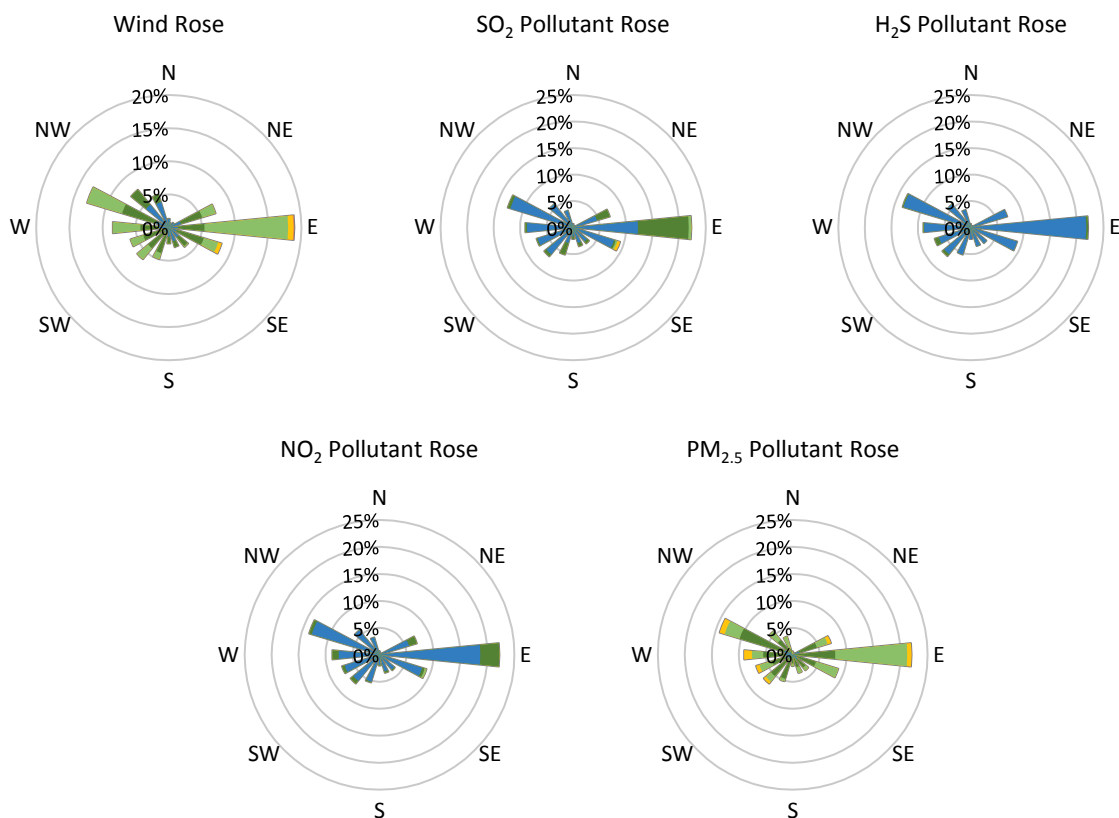
- Achieved 100% of scheduled uptime
- All compliance parameters are above 90% data validity; no operational issues

SESAA Stoughton Station - December 2015 Summary Report

Pollutants		Month Records		24-Hour Records				1-Hour Records			
Name	Conc. Unit	Avg. Conc.	Total Uptime	Maximum		SAAQS Standard	Exceed Days	Maximum		SAAQS Standard	Exceed Hours
				Conc.	Time			Conc.	Time		
NO	ppb	0.6	96%	5.0	Dec-01	-	-	29.4	Dec-01 15:00	-	-
NO ₂	ppb	2.5	96%	7.3	Dec-01	106	0	17.2	Dec-20 19:00	159	0
NO _x	ppb	3.2	96%	12.3	Dec-01	-	-	38.0	Dec-01 15:00	-	-
SO ₂	ppb	0.7	97%	3.1	Dec-20	48	0	17.4	Dec-20 20:00	172	0
H ₂ S	ppb	0.3	97%	1.6	Dec-09	3.6	0	15.5	Dec-09 18:00	11	2
PM _{2.5}	µg/m ³	4.8	100%	13.7	Dec-01	28	0	19.3	Dec-01 03:00	-	-

SAAQS: Saskatchewan Ambient Air Quality Standards





Parameters	Unit	Color Code for Wind Speed and Pollution Concentration Class						
Wind Speed	m/s	$0.3 \leq WS < 1.4$	$1.4 \leq WS < 3.1$	$3.1 \leq WS < 7.8$	$7.8 \leq WS < 10.8$	$10.8 \leq WS < 13.6$	$WS \geq 13.6$	
SO ₂	ppb	$0 \leq C < 1$	$1 \leq C < 5$	$5 \leq C < 10$	$10 \leq C < 57$	$57 \leq C < 172$	$C \geq 172$	
NO ₂	ppb	$0 \leq C < 5$	$5 \leq C < 15$	$15 \leq C < 30$	$30 \leq C < 100$	$100 \leq C < 212$	$C \geq 212$	
H ₂ S	ppb	$0 \leq C < 1$	$1 \leq C < 3.6$	$3.6 \leq C < 5$	$5 \leq C < 8$	$8 \leq C < 10.8$	$C \geq 10.8$	
PM _{2.5}	µg/m ³	$0 \leq C < 2$	$2 \leq C < 4$	$4 \leq C < 10$	$10 \leq C < 20$	$20 \leq C < 30$	$C \geq 30$	

Monthly Update

- Achieved 100% of scheduled uptime for all parameters
- Downtime due to routine daily Internal Zeroes and Spans

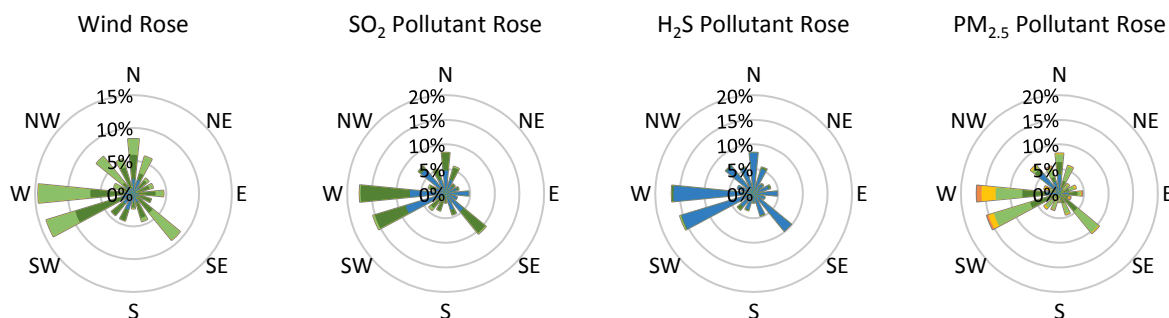
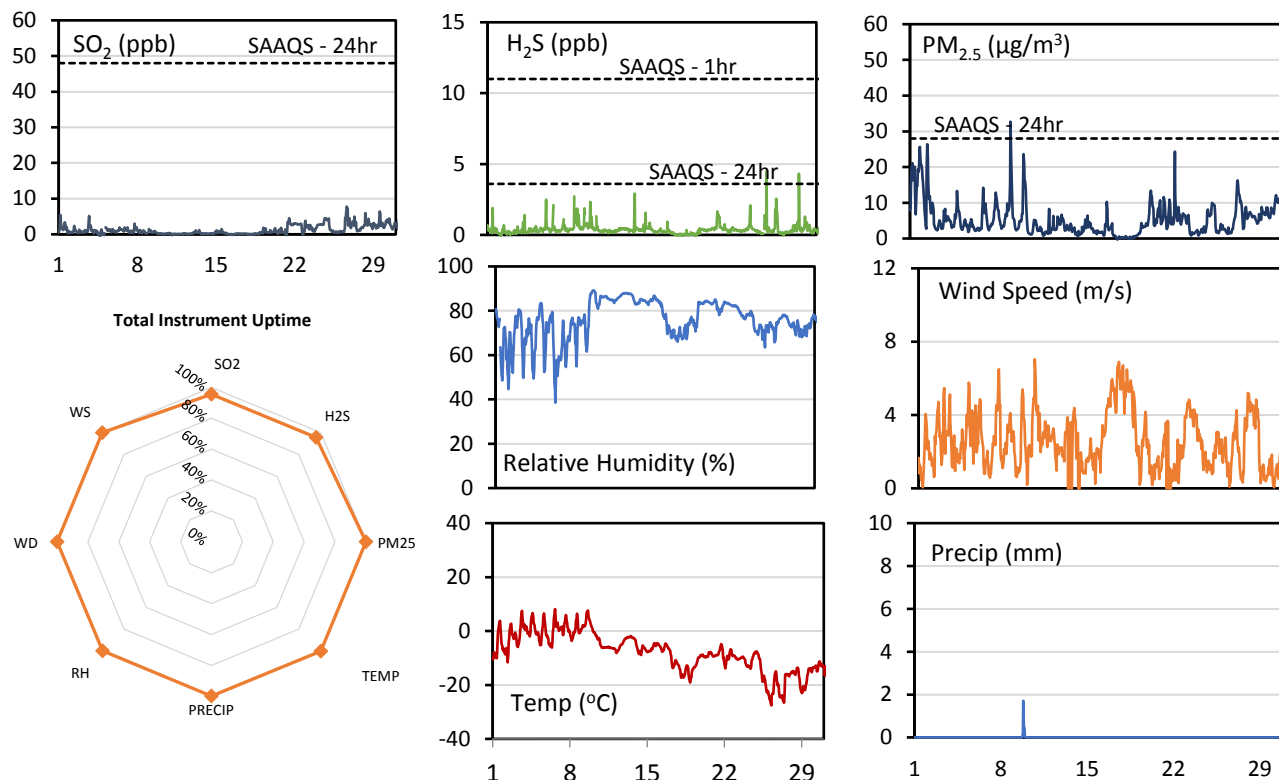
Exceedance Summary (1- Hour Average - Exceedances Highlighted)

Exceedance Day	AQI	NO ₂ ppb	NO ppb	SO ₂ ppb	PM _{2.5} µg/m ³	NO _x ppb	H ₂ S ppb	Temp °C	WD deg	WS m/s
Dec-09 18:00	2.9	8.5	3.9	0.4	2.3	12.4	15.5	4.4	106.5	0.3
Dec-09 19:00	10.2	9.6	4.1	0.3	8.2	13.7	12.1	3.2	83.3	0.8

SESAA Wauchope Station - December 2015 Summary Report

Pollutants		Month Records		24-Hour Records				1-Hour Records			
Name	Conc. Unit	Avg. Conc.	Total Uptime	Maximum		SAAQS Standard	Exceed Days	Maximum		SAAQS Standard	Exceed Hours
				Conc.	Time			Conc.	Time		
SO ₂	ppb	1.3	96%	3.3	Dec-24	48	0	7.8	Dec-26 15:00	172	0
H ₂ S	ppb	0.4	96%	0.9	Dec-09	3.6	0	4.5	Dec-26 11:00	11	0
PM _{2.5}	µg/m ³	5.3	100%	17.2	Dec-01	28	0	32.7	Dec-09 00:00	-	-

SAAQS: Saskatchewan Ambient Air Quality Standards



Parameters	Unit	Color Code for Wind Speed and Pollution Concentration Class					
Wind Speed	m/s	0.3 ≤ WS < 1.4	1.4 ≤ WS < 3.1	3.1 ≤ WS < 7.8	7.8 ≤ WS < 10.8	10.8 ≤ WS < 13.6	WS ≥ 13.6
SO ₂	ppb	0 ≤ C < 1	1 ≤ C < 5	5 ≤ C < 10	10 ≤ C < 57	57 ≤ C < 172	C ≥ 172
H ₂ S	ppb	0 ≤ C < 1	1 ≤ C < 3.6	3.6 ≤ C < 5	5 ≤ C < 8	8 ≤ C < 10.8	C ≥ 10.8
PM _{2.5}	µg/m ³	0 ≤ C < 2	2 ≤ C < 4	4 ≤ C < 10	10 ≤ C < 20	20 ≤ C < 30	C ≥ 30

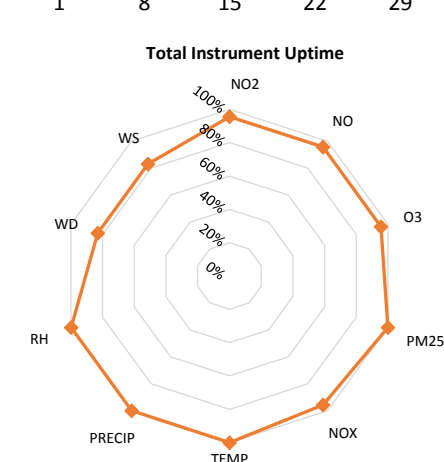
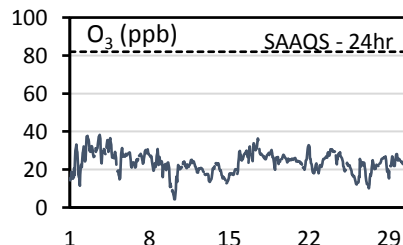
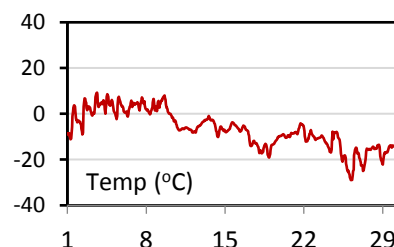
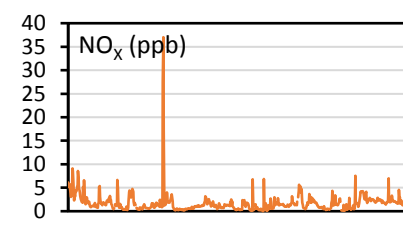
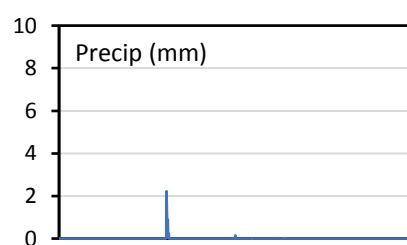
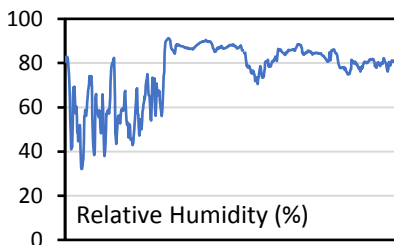
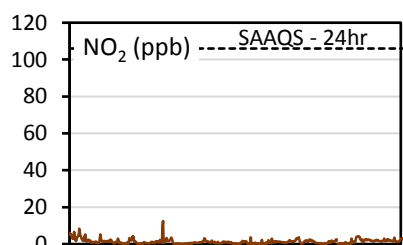
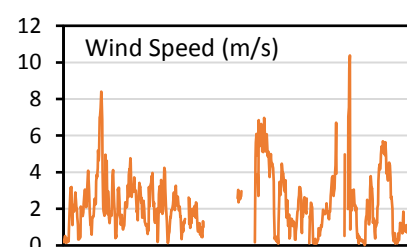
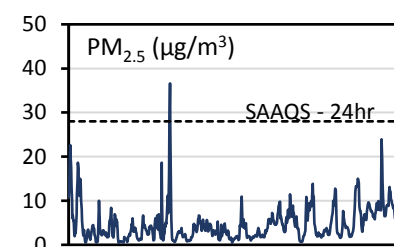
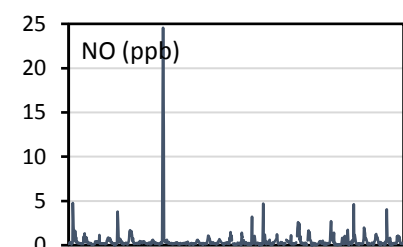
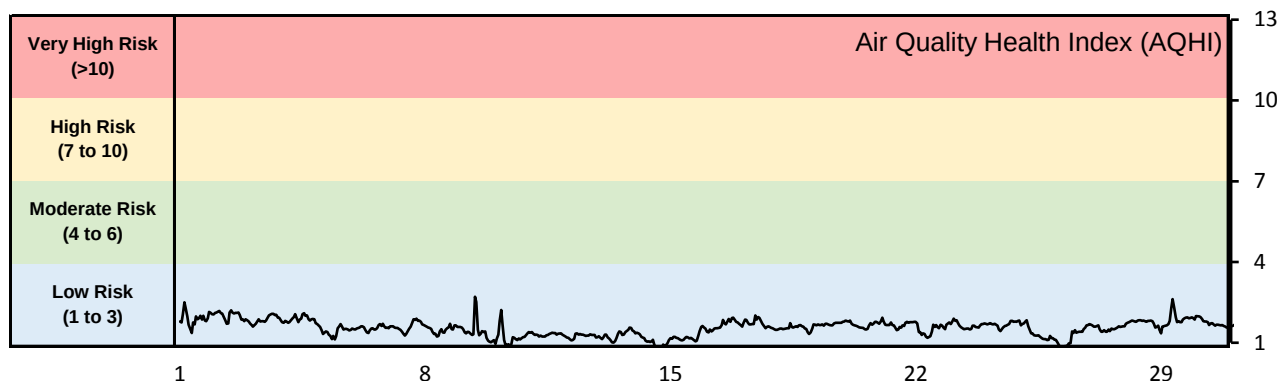
Monthly Update

- Achieved 100% of scheduled uptime
- Downtime of 4% results from routine daily Internal Zeroes and Spans
- All compliance parameters are above 90% data validity; no operational issues

SESAA Wawota Station - December 2015 Summary Report

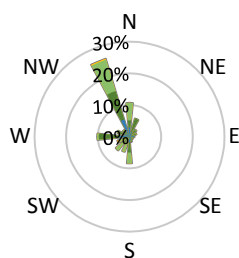
Pollutants		Month Records		24-Hour Records				1-Hour Records			
Name	Conc. Unit	Avg. Conc.	Uptime	Maximum		SAAQS Standard	Exceed Days	Maximum		SAAQS Standard	Exceed Hours
				Conc.	Time			Conc.	Time		
NO	ppb	0.5	96%	2.7	Dec-09	-	-	24.6	Dec-09 11:00	-	-
NO ₂	ppb	1.3	96%	4.4	Dec-01	106	0	12.5	Dec-09 11:00	159	0
NO _x	ppb	1.8	96%	5.1	Dec-01	-	-	37.0	Dec-09 11:00	-	-
O ₃	ppb	23.8	96%	30.7	Dec-02	-	-	38.3	Dec-03 15:00	82	0
PM _{2.5}	µg/m ³	4.7	100%	10.6	Dec-01	28	0	36.6	Dec-10 04:00	-	-

SAAQS: Saskatchewan Ambient Air Quality Standards

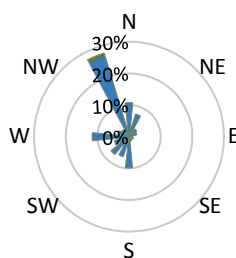


SESAA Wawota Station - December 2015 Summary Report

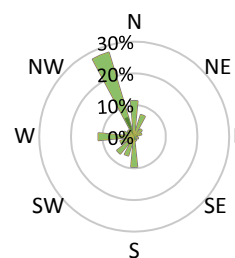
Wind Rose



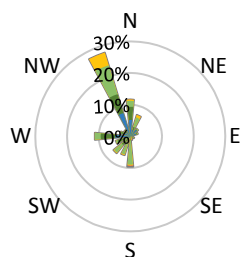
NO₂ Pollutant Rose



O₃ Pollutant Rose



PM_{2.5} Pollutant Rose



Parameters	Unit	Color Code for Wind Speed and Pollution Concentration Class						
Wind Speed	m/s	0.3 ≤ WS < 1.4	1.4 ≤ WS < 3.1	3.1 ≤ WS < 7.8	7.8 ≤ WS < 10.8	10.8 ≤ WS < 13.6	WS ≥ 13.6	
O ₃	ppb	0 ≤ C < 10	10 ≤ C < 20	20 ≤ C < 40	40 ≤ C < 60	60 ≤ C < 82	C ≥ 82	
NO ₂	ppb	0 ≤ C < 5	5 ≤ C < 15	15 ≤ C < 30	30 ≤ C < 100	100 ≤ C < 212	C ≥ 212	
PM _{2.5}	µg/m ³	0 ≤ C < 2	2 ≤ C < 4	4 ≤ C < 10	10 ≤ C < 20	20 ≤ C < 30	C ≥ 30	

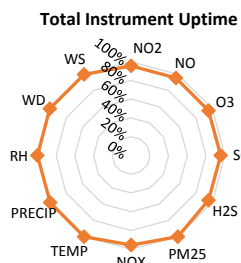
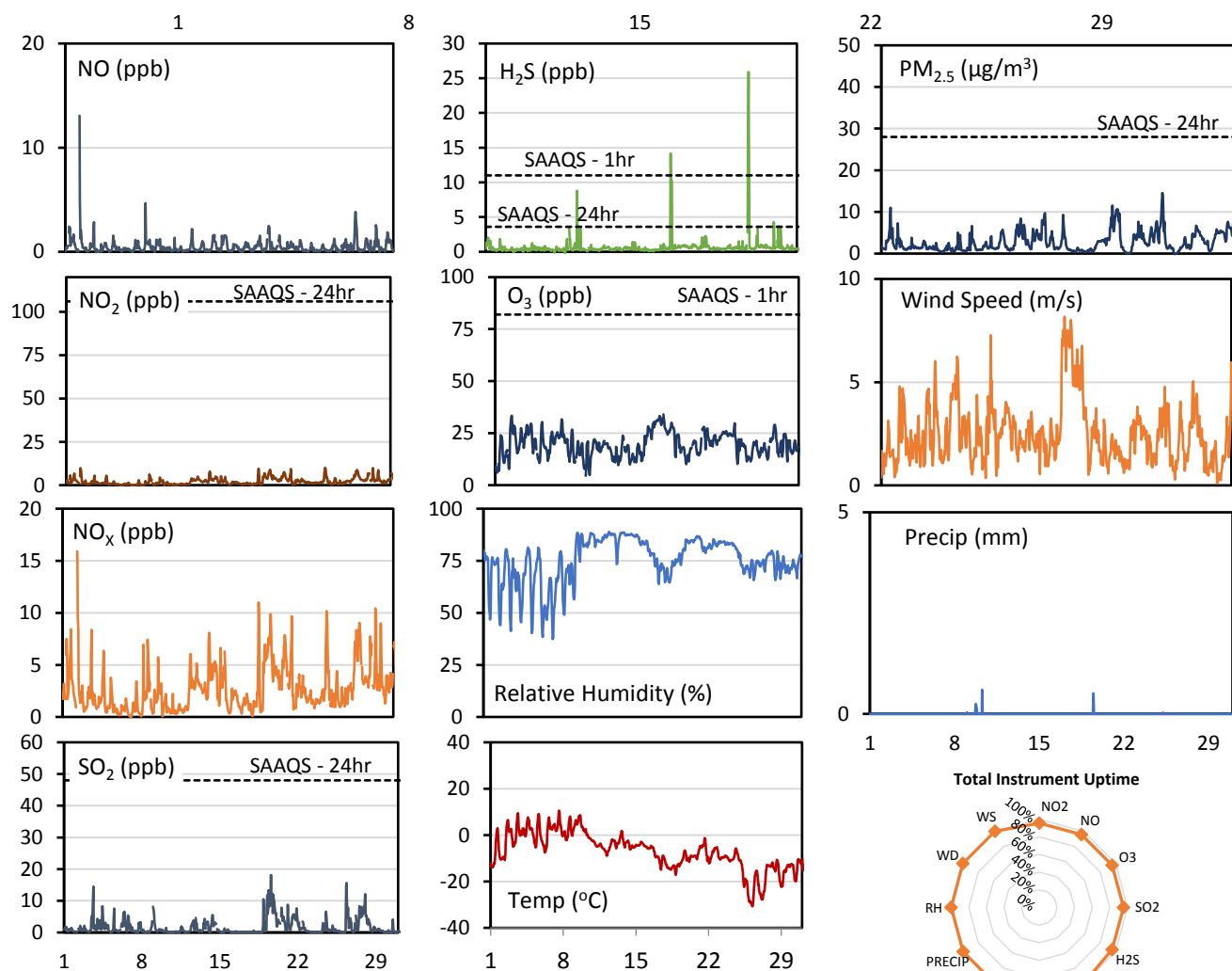
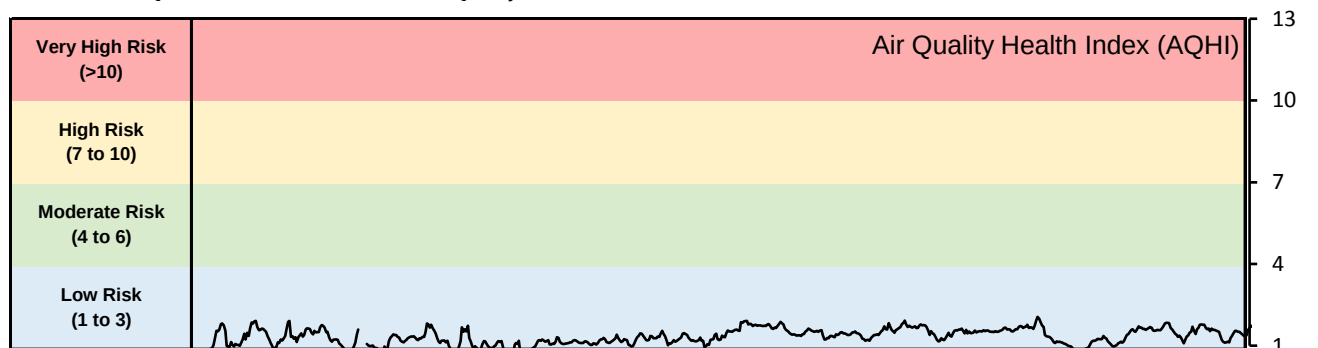
Monthly Update

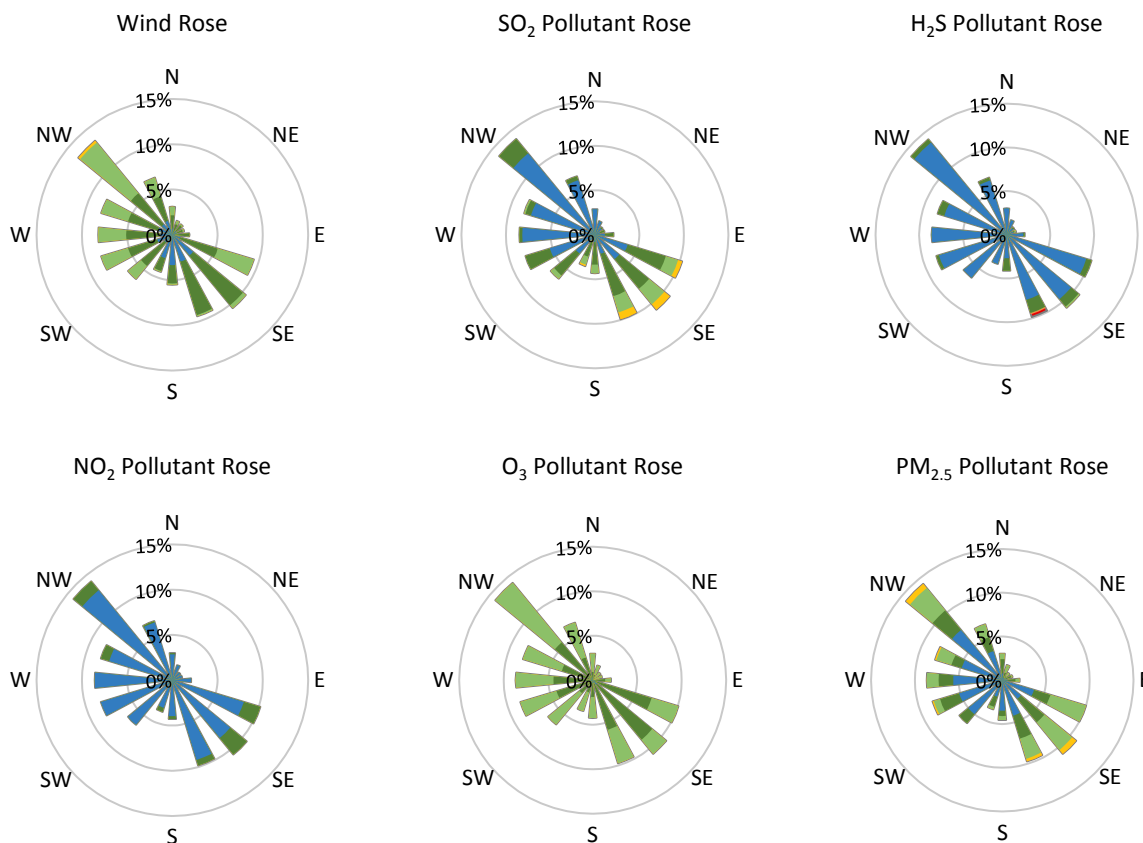
- Achieved 100% of scheduled uptime except for wind direction and wind speed (83%)
- Downtime of 4% results from routine daily Internal Zeroes and Spans
- Downtime for wind direction and speed due to operational issues

SESAA Weyburn Station - December 2015 Summary Report

Pollutants		Month Records		24-Hour Records				1-Hour Records			
Name	Conc. Unit	Avg. Conc.	Uptime	Maximum		SAAQS Standard	Exceed Days	Maximum		SAAQS Standard	Exceed Hours
				Conc.	Time			Conc.	Time		
NO	ppb	0.5	96%	1.2	Dec-02	-	-	13.1	Dec-02 07:00	-	-
NO ₂	ppb	2.2	96%	4.7	Dec-19	106	0	10.0	Dec-24 23:00	159	0
NO _x	ppb	2.7	96%	5.4	Dec-19	-	-	18.2	Dec-02 07:00	-	-
SO ₂	ppb	1.7	96%	8.1	Dec-19	48	0	18.1	Dec-19 14:00	172	0
H ₂ S	ppb	0.7	96%	3.1	Dec-26	3.6	0	25.9	Dec-26 08:00	11	4
O ₃	ppb	19.8	96%	30.2	Dec-17	-	-	34.8	Dec-31 22:00	82	0
PM _{2.5}	µg/m ³	2.8	100%	6.1	Dec-24	28	0	14.6	Dec-24 23:00	-	-

SAAQS: Saskatchewan Ambient Air Quality Standards





Parameters	Unit	Color Code for Wind Speed and Pollution Concentration Class					
Wind Speed	m/s	$0.3 \leq WS < 1.4$	$1.4 \leq WS < 3.1$	$3.1 \leq WS < 7.8$	$7.8 \leq WS < 10.8$	$10.8 \leq WS < 13.6$	$WS \geq 13.6$
SO ₂	ppb	$0 \leq C < 1$	$1 \leq C < 5$	$5 \leq C < 10$	$10 \leq C < 57$	$57 \leq C < 172$	$C \geq 172$
NO ₂	ppb	$0 \leq C < 5$	$5 \leq C < 15$	$15 \leq C < 30$	$30 \leq C < 100$	$100 \leq C < 212$	$C \geq 212$
H ₂ S	ppb	$0 \leq C < 1$	$1 \leq C < 3.6$	$3.6 \leq C < 5$	$5 \leq C < 8$	$8 \leq C < 10.8$	$C \geq 10.8$
O ₃	ppb	$0 \leq C < 10$	$10 \leq C < 20$	$20 \leq C < 40$	$40 \leq C < 60$	$60 \leq C < 82$	$C \geq 82$
PM _{2.5}	$\mu\text{g}/\text{m}^3$	$0 \leq C < 2$	$2 \leq C < 4$	$4 \leq C < 10$	$10 \leq C < 20$	$20 \leq C < 30$	$C \geq 30$

Monthly Update

- Achieved 100% of scheduled uptime for all parameters
- Downtime due to routine daily Internal Zeroes and Spans
- All compliance parameters are above 90% data validity

Exceedance Summary (1- Hour Average - Exceedances Highlighted)

Exceedance Time	AQHI	NO ₂ ppb	NO ppb	SO ₂ ppb	O ₃ ppb	NO _x ppb	H ₂ S ppb	PM _{2.5} $\mu\text{g}/\text{m}^3$	Temp °C	WD deg	WS m/s
Dec-18 20:00	1.4	7.5	0.8	0.4	13.4	8.3	14.2	1.2	-17.2	160.2	0.7
Dec-26 07:00	0.7	0.6	0.6	0.7	12.7	1.2	15.7	0.4	-28.9	146.8	0.8
Dec-26 08:00	0.9	2.6	0.2	15.0	12.5	2.9	25.9	0.7	-25.5	159.7	1.1
Dec-26 09:00	0.9	2.0	0.1	15.6	13.7	2.1	17.1	0.8	-22.7	163.6	1.1