



west virginia department of environmental protection

Appendix A: Air Monitoring Data

Promoting a healthy environment.

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West Virginia PM2.5

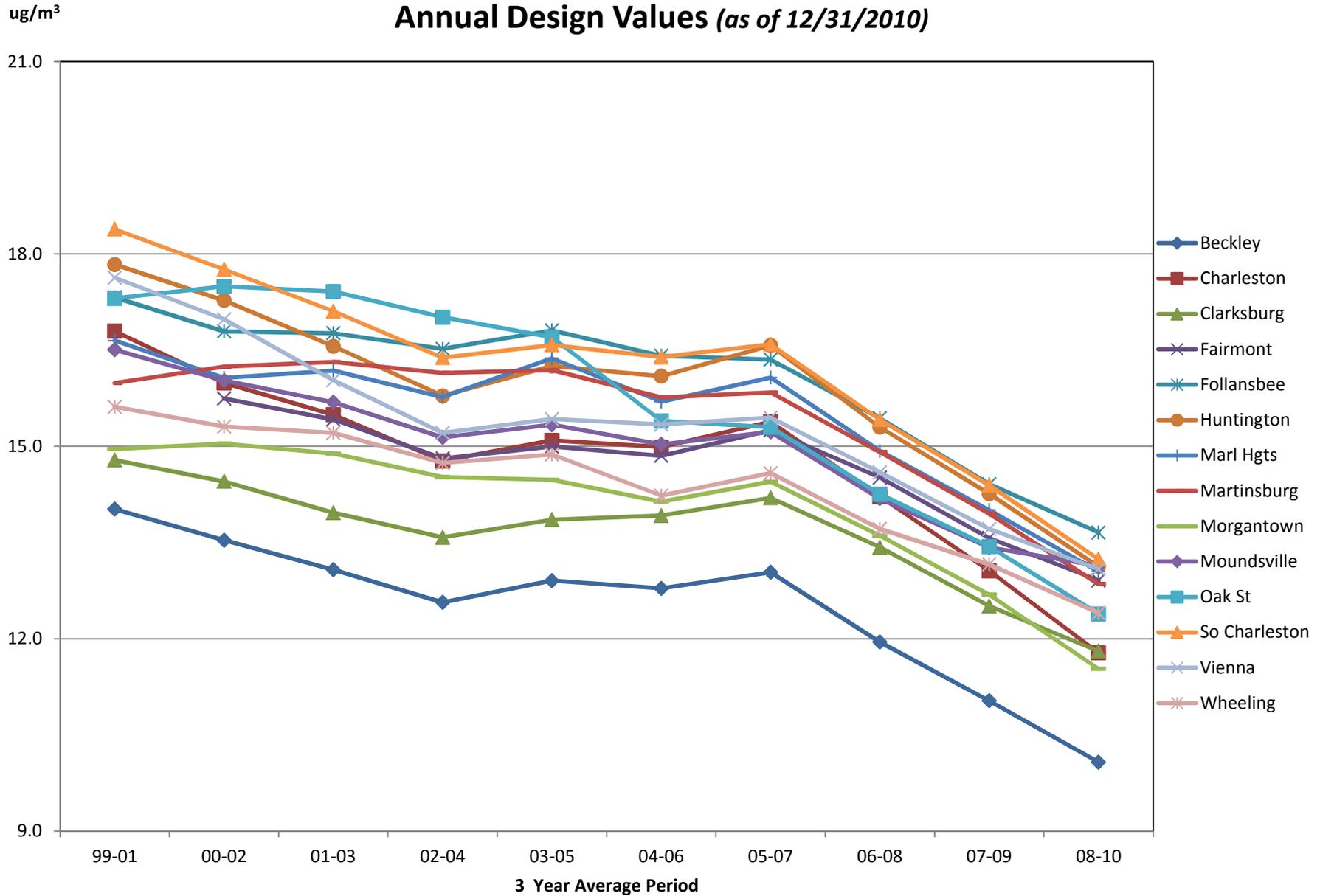
Design Values

data as of 12/31/2010

County	Site	(NAAQS 24 hr 3 yr 98% = 35 ug/m3)								(Annual NAAQS <= 15.0 ug/m3)							
		01-03	02-04	03-05	04-06	05-07	06-08	07-09	08-10	01-03	02-04	03-05	04-06	05-07	06-08	07-09	08-10
Berkeley	Martinsburg	40	37	36	34	33	31	29	31	16.3	16.1	16.2	15.8	15.8	14.9	14.0	12.9
Brooke	Follansbee	42	44	42	40	37	37	34	31	16.8	16.5	16.8	16.4	16.4	15.4	14.4	13.7
	Weirton-Marl. Hgts	46	47	45	43	44	41	37	31	16.2	15.8	16.4	15.7	16.1	14.9	14.0	13.1
Cabell	Huntington	41	37	35	34	37	32	30	26	16.6	15.8	16.3	16.1	16.6	15.2	14.3	13.1
Hancock	Weirton-Oak St.	45	44	41	40	41	38	35	31	17.4	17.0	16.6	15.4	15.2	14.3	13.4	12.4
Harrison	Clarksburg	36	34	32	35	34	31	26	23	14.0	13.6	13.9	13.9	14.2	13.4	12.5	11.8
Kanawha	Charleston	37	34	34	35	36	34	29	25	15.5	14.8	15.1	15.0	15.4	14.2	13.1	11.8
	Guthrie				33	31						13.2	12.2				
	So. Charleston	40	36	36	37	38	36	32	28	17.1	16.4	16.6	16.4	16.6	15.4	14.4	13.2
Marion	Fairmont	39	36	34	34	34	32	28	26	15.4	14.8	15.0	14.9	15.3	14.5	13.6	12.9
Marshall	Moundsville	37	36	33	34	35	34	31	29	15.7	15.1	15.3	15.0	15.2	14.2	13.4	13.1
Mercer	Bluefield	34	32	33						12.5	12.1	12.8					
Monongalia	Morgantown	40	39	36	34	36	34	30	25	14.9	14.5	14.5	14.1	14.4	13.6	12.7	11.5
Ohio	Wheeling	36	35	32	31	32	31	29	26	15.2	14.7	14.9	14.2	14.6	13.7	13.2	12.4
Raleigh	Beckley	34	32	31	31	30	28	24	21	13.1	12.6	12.9	12.8	13.0	11.9	11.0	10.1
Summers	Keeney Knob	29	29	31						10.1	9.8	10.6					
Wood	Vienna	37	35	34	35	37	34	31	28	16.0	15.2	15.4	15.3	15.4	14.6	13.7	13.1

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West Virginia PM2.5 Annual Design Values *(as of 12/31/2010)*



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West Virginia PM2.5

98% Design Values

data as of 12/31/2010

		(NAAQS 24 hr 3 yr 98% = 35 ug/m ³) and (Daily Sampling Criteria = 34 - 36 ug/m ³)															
		2008				2009				2010				3 yr Avg			Annual
County	Site	obs	1	2	3	obs	1	2	3	obs	1	2	3	1	2	3	08-10
Berkeley	Martinsburg	115	34.0	33.7	30.8	121	34.0	27.6	25.7	118	44.2	37.8	36.4	34	31	31	12.9
Brooke	Follansbee	117	39.8	39.5	38.9	122	38.3	24.4	23.2	122	32.6	32.0	29.8	32	31	31	13.7
	Weirton-Marl. Hgts	121	37.4	35.9	34.9	118	48.6	29.3	26.3	122	38.0	36.3	31.6	33	33	31	13.1
Cabell	Huntington	114	31.1	27.9	27.4	112	32.5	29.2	22.5	115	35.5	29.0	28.0	28	26	26	13.1
Hancock	Weirton-Oak St.	119	39.4	37.3	35.8	122	29.6	28.7	25.2	122	34.4	33.1	31.2	32	31	31	12.4
Harrison	Clarksburg	119	28.2	27.2	27.1	118	21.8	20.5	19.5	111	42.1	27.4	22.2	30	25	23	11.8
Kanawha	Charleston	117	53.8	34.1	31.7	117	22.9	21.7	21.1	118	33.0	25.1	23.5	29	26	25	11.8
	So. Charleston	117	49.7	45.1	33.8	333	26.2	26.0	25.2	122	35.1	26.2	25.3	32	29	28	13.2
Marion	Fairmont	116	30.7	29.9	28.0	121	26.3	25.5	22.5	101	34.7	31.4	26.8	28	27	26	12.9
Marshall	Moundsville	361	32.3	31.3	29.1	359	25.8	25.7	25.5	117	38.5	34.3	33.5	31	30	29	13.1
Monongalia	Morgantown	117	35.7	34.3	27.6	351	24.2	23.0	22.8	118	32.7	25.4	23.9	28	25	25	11.5
Ohio	Wheeling	121	32.5	30.5	27.2	119	24.5	24.2	23.2	119	30.5	28.7	28.2	27	26	26	12.4
Raleigh	Beckley	113	29.0	23.5	23.4	113	19.7	19.4	18.4	120	29.0	25.4	21.3	24	22	21	10.1
Wood	Vienna	113	35.6	34.7	28.2	350	26.9	26.5	26.3	117	41.9	30.1	28.4	32	28	28	13.1

* obs = # observations
 * 1,2,3 = rank of values
 * current values are in red
 * daily sampling sites in blue

Credible # of Samples	nth Max Value Used
1 - 50	1
51 - 100	2
101 - 150	3
151 - 200	4
201 - 250	5
251 - 300	6
301 - 350	7
351 - 366	8

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Vienna PM2.5 98% 24-Hour Values as of 12/31/2010

Highest Rank	2000			2001			2002		
			Qtr			Qtr			Qtr
1	10/24	42.9	4	8/2	43.8	3	6/25	59.8	2
2	6/2	38.3	2	5/4	42.3	2	8/3	43.6	3
3	9/3	38.0	3	8/8	42.1	3	6/22	37.0	2
4	6/11	35.8	2	11/15	40.8	4	6/10	35.6	2
5	10/27	33.8	4	1/13	39.2	1	7/22	34.7	3
6	8/25	32.9	3	5/1	38.2	2	8/12	34.7	3
7	10/21	32.8	4	7/24	34.6	3	7/16	32.9	3
8	8/22	32.4	3	6/15	34.5	2	7/25	30.8	3
9	6/5	32.1	2	6/12	33.8	2	1/2	29.6	1
10	1/1	31.0	1	11/18	33.3	4	7/7	28.8	3

Filters	109		118		116
X .98 + 1	107		116		114
Value		38.0		42.1	37.0
 3 Year Avg				42	39
			17.6		17.0

Vienna PM2.5 98% 24-Hour Values as of 12/31/2010

Highest Rank	2003			2004			2005		
			Qtr			Qtr			Qtr
1	6/26	41.9	2	7/2	43.6	3	6/27	43.6	2
2	8/28	32.8	3	6/8	36.7	2	6/24	39.3	2
3	8/19	32.0	3	9/12	34.7	3	6/30	36.2	2
4	8/1	31.8	3	9/24	31.9	3	8/2	34.3	3
5	3/1	29.7	1	9/27	30.0	3	8/11	34.0	3
6	8/16	27.3	3	8/16	29.6	3	9/13	32.5	3
7	8/25	26.9	3	9/3	29.2	3	9/10	31.9	3
8	8/22	26.7	3	8/10	28.7	3	9/25	31.5	3
9	7/20	25.9	3	8/25	28.3	3	8/17	30.7	3
10	7/26	25.6	3	7/17	27.3	3	6/21	30.5	2

Filters	112		120		113
X .98 + 1	110		118		111
Value		32.0		34.7	
		37		35	
3 Year Avg		16.0		15.2	
					15.4

Vienna PM2.5 98% 24-Hour Values as of 12/31/2010

Highest Rank	2006			2007			2008		
			Qtr			Qtr			Qtr
1	7/10	42.1	3	5/30	41.0	2	9/3	35.6	3
2	7/19	39.2	3	7/29	39.3	3	7/29	34.7	3
3	7/31	35.1	3	8/4	38.8	3	7/20	28.2	3
4	8/27	28.7	3	6/2	36.9	2	7/17	26.6	3
5	6/1	28.5	2	9/6	33.4	3	11/2	26.6	4
6	9/8	28.5	3	5/24	33.2	2	2/3	26.1	1
7	9/11	28.2	3	8/7	30.2	3	8/19	26.1	3
8	7/1	27.6	3	8/1	29.8	3	4/18	25.6	2
9	11/10	27.5	4	12/20	28.7	4	1/28	25.3	1
10	8/6	26.5	3	5/27	28.6	2	8/4	25.0	3

Filters	115		116		113
X .98 + 1	113		114		111
Value		35.1		38.8	
		35		37	
3 Year Avg		15.3		15.4	
					14.6

Vienna PM2.5 98% 24-Hour Values as of 12/31/2010

Highest Rank	2009			2010		
			Qtr			Qtr
1	8/14	32.6	3	7/7	41.9	3
2	8/15	28.5	3	7/28	30.1	3
3	9/5	28.0	3	1/14	28.4	1
4	8/27	27.9	3	7/4	25.4	3
5	1/20	27.0	1	12/19	25.4	4
6	11/9	26.9	4	7/16	24.9	3
7	2/9	26.5	1	8/9	23.7	3
8	9/15	26.3	3	2/4	23.0	1
9	11/10	26.2	4	3/9	23.0	1
10	11/21	24.7	4	11/13	22.9	4

Filters	350		117	
X .98 + 1	344		115	
Value		26.5		28.4
		31		28
3 Year Avg		13.7		13.1

Monitor Values Report

Geographic Area: Parkersburg-Marietta-Vienna, WV-OH

Pollutant: PM2.5

Year: 2000

Exceptional Events: Excluded (if any)

Duration Description=24 HOUR

Duration Description	Obs	First Max	Second Max	Third Max	Fourth Max	98th Percentile	Weighted Annual Mean	Exc Events	Monitor Number	Site ID	Address	City	County	State	EPA Region
24 HOUR	108	42.9	38.3	38	35.8	38	17.7	Excluded	1	541071002	Vienna - Neale Elem School	Vienna	Wood	WV	03

Get detailed information about this report, including column descriptions, at http://www.epa.gov/airquality/airdata/ad_about_reports.html#mon

AirData reports are produced from a direct query of the AQS Data Mart. The data represent the best and most recent information available to EPA from state agencies. However, some values may be absent due to incomplete reporting, and some values may change due to quality assurance activities. The AQS database is updated daily by state, local, and tribal organizations who own and submit the data. Please contact the appropriate air quality monitoring agency to report any data problems.
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Readers are cautioned not to rank order geographic areas based on AirData reports. Air pollution levels measured at a particular monitoring site are not necessarily representative of the air quality for an entire county or urban area.

Source: U.S. EPA AirData <<http://www.epa.gov/airdata>>
Generated: January 17, 2012

Monitor Values Report

Geographic Area: Parkersburg-Marietta-Vienna, WV-OH

Pollutant: PM2.5

Year: 2001

Exceptional Events: Excluded (if any)

Duration Description=24 HOUR

Duration Description	Obs	First Max	Second Max	Third Max	Fourth Max	98th Percentile	Weighted Annual Mean	Exc Events	Monitor Number	Site ID	Address	City	County	State	EPA Region
24 HOUR	118	43.8	42.3	42.1	40.8	42	17.4	None	1	541071002	Vienna - Neale Elem School	Vienna	Wood	WV	03

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Generated: January 17, 2012

Monitor Values Report

Geographic Area: Parkersburg-Marietta-Vienna, WV-OH

Pollutant: PM2.5

Year: 2002

Exceptional Events: Excluded (if any)

Duration Description=24 HOUR

Duration Description	Obs	First Max	Second Max	Third Max	Fourth Max	98th Percentile	Weighted Annual Mean	Exc Events	Monitor Number	Site ID	Address	City	County	State	EPA Region
24 HOUR	116	59.8	43.6	37	35.6	37	15.8	None	1	541071002	Vienna - Neale Elem School	Vienna	Wood	WV	03

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Source: U.S. EPA AirData <<http://www.epa.gov/airdata>>
Generated: January 17, 2012

Monitor Values Report

Geographic Area: Parkersburg-Marietta-Vienna, WV-OH

Pollutant: PM2.5

Year: 2003

Exceptional Events: Excluded (if any)

Duration Description=24 HOUR

Duration Description	Obs	First Max	Second Max	Third Max	Fourth Max	98th Percentile	Weighted Annual Mean	Exc Events	Monitor Number	Site ID	Address	City	County	State	EPA Region
24 HOUR	112	41.9	32.8	32	31.8	32	14.9	None	1	541071002	Vienna - Neale Elem School	Vienna	Wood	WV	03

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Generated: January 17, 2012

Monitor Values Report

Geographic Area: Parkersburg-Marietta-Vienna, WV-OH

Pollutant: PM2.5

Year: 2004

Exceptional Events: Excluded (if any)

Duration Description=24 HOUR

Duration Description	Obs	First Max	Second Max	Third Max	Fourth Max	98th Percentile	Weighted Annual Mean	Exc Events	Monitor Number	Site ID	Address	City	County	State	EPA Region
24 HOUR	120	43.6	36.7	34.7	31.9	35	14.9	None	1	541071002	Vienna - Neale Elem School	Vienna	Wood	WV	03

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Generated: January 17, 2012

Monitor Values Report

Geographic Area: Parkersburg-Marietta-Vienna, WV-OH

Pollutant: PM2.5

Year: 2005

Exceptional Events: Excluded (if any)

Duration Description=24 HOUR

Duration Description	Obs	First Max	Second Max	Third Max	Fourth Max	98th Percentile	Weighted Annual Mean	Exc Events	Monitor Number	Site ID	Address	City	County	State	EPA Region
24 HOUR	113	43.6	39.3	36.2	34.3	36	16.4	None	1	541071002	Vienna - Neale Elem School	Vienna	Wood	WV	03

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Generated: January 17, 2012

Monitor Values Report

Geographic Area: Parkersburg-Marietta-Vienna, WV-OH

Pollutant: PM2.5

Year: 2006

Exceptional Events: Excluded (if any)

Duration Description=24 HOUR

Duration Description	Obs	First Max	Second Max	Third Max	Fourth Max	98th Percentile	Weighted Annual Mean	Exc Events	Monitor Number	Site ID	Address	City	County	State	EPA Region
24 HOUR	115	42.1	39.2	35.1	28.7	35	14.7	None	1	541071002	Vienna - Neale Elem School	Vienna	Wood	WV	03

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Generated: January 17, 2012

Monitor Values Report

Geographic Area: Parkersburg-Marietta-Vienna, WV-OH

Pollutant: PM2.5

Year: 2007

Exceptional Events: Excluded (if any)

Duration Description=24 HOUR

Duration Description	Obs	First Max	Second Max	Third Max	Fourth Max	98th Percentile	Weighted Annual Mean	Exc Events	Monitor Number	Site ID	Address	City	County	State	EPA Region
24 HOUR	116	41	39.3	38.8	36.9	39	15.3	None	1	541071002	Vienna - Neale Elem School	Vienna	Wood	WV	03

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Generated: January 17, 2012

Monitor Values Report

Geographic Area: Parkersburg-Marietta-Vienna, WV-OH

Pollutant: PM2.5

Year: 2008

Exceptional Events: Excluded (if any)

Duration Description=24 HOUR

Duration Description	Obs	First Max	Second Max	Third Max	Fourth Max	98th Percentile	Weighted Annual Mean	Exc Events	Monitor Number	Site ID	Address	City	County	State	EPA Region
24 HOUR	113	35.6	34.7	28.2	26.6	28	13.8	None	1	541071002	Vienna - Neale Elem School	Vienna	Wood	WV	03

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Generated: January 17, 2012

Monitor Values Report

Geographic Area: Parkersburg-Marietta-Vienna, WV-OH

Pollutant: PM2.5

Year: 2009

Exceptional Events: Excluded (if any)

Duration Description=24 HOUR

Duration Description	Obs	First Max	Second Max	Third Max	Fourth Max	98th Percentile	Weighted Annual Mean	Exc Events	Monitor Number	Site ID	Address	City	County	State	EPA Region
24 HOUR	350	32.6	28.5	28	27.9	27	12	None	1	541071002	Vienna - Neale Elem School	Vienna	Wood	WV	03

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Generated: January 17, 2012

Monitor Values Report

Geographic Area: Parkersburg-Marietta-Vienna, WV-OH

Pollutant: PM2.5

Year: 2010

Exceptional Events: Excluded (if any)

Duration Description=24 HOUR

Duration Description	Obs	First Max	Second Max	Third Max	Fourth Max	98th Percentile	Weighted Annual Mean	Exc Events	Monitor Number	Site ID	Address	City	County	State	EPA Region
24 HOUR	117	41.9	30.1	28.4	25.4	28	13.4	None	1	541071002	Vienna - Neale Elem School	Vienna	Wood	WV	03

Get detailed information about this report, including column descriptions, at http://www.epa.gov/airquality/airdata/ad_about_reports.html#mon

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