



Cooper Farms' Wind VW
Van Wert, OH

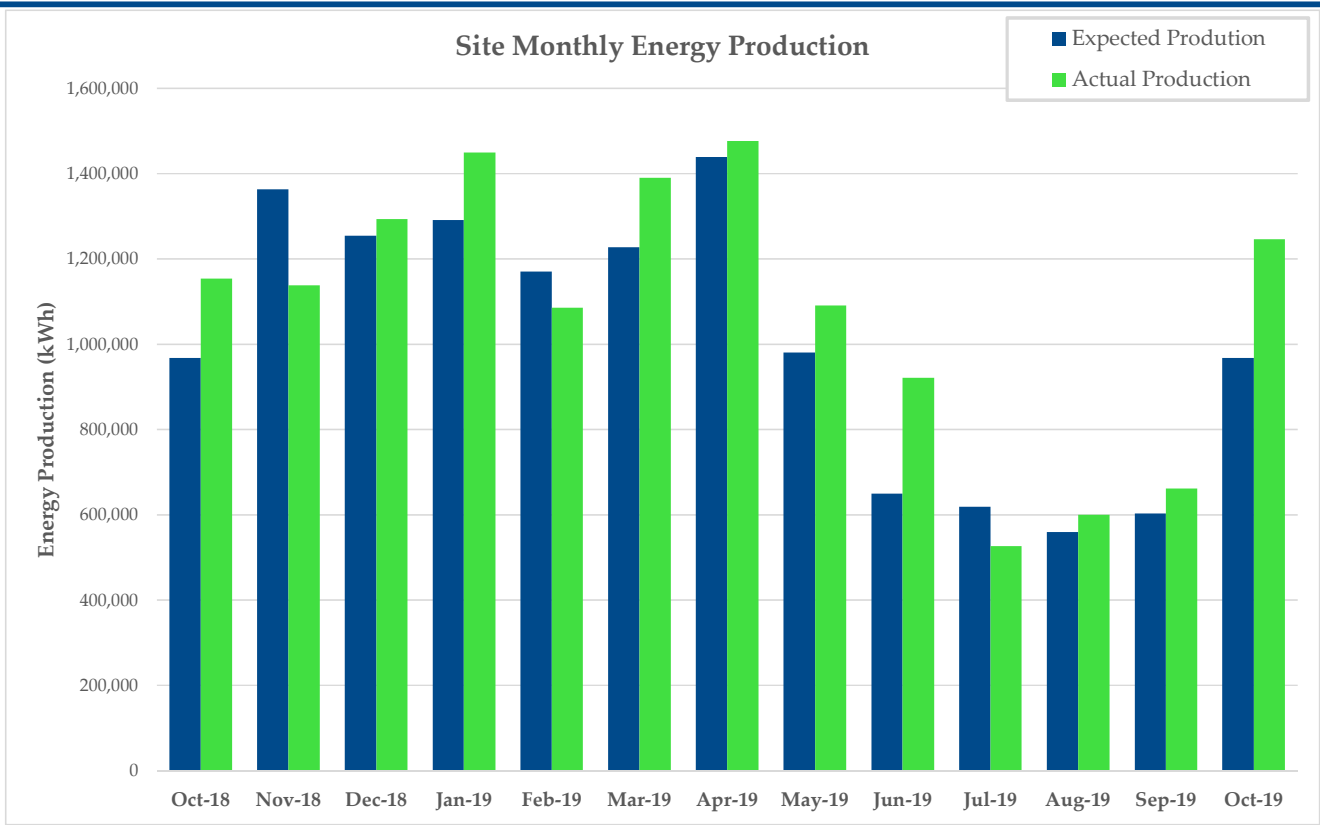


A. Site Energy Production Summary

	Energy Production (kWh)				
	Site		By Turbine		
	Expected Production	Actual Production	WTG 1	WTG 2	WTG 3
Oct-18	967,926	1,153,610	388,960	373,700	390,950
Nov-18	1,362,692	1,138,070	381,630	373,480	382,960
Dec-18	1,254,397	1,293,550	427,830	426,560	439,160
Jan-19	1,290,968	1,449,160	491,430	475,470	482,260
Feb-19	1,170,349	1,085,536	358,334	356,884	370,318
Mar-19	1,227,217	1,390,286	471,222	450,690	468,374
Apr-19	1,438,497	1,476,210	495,410	493,970	486,830
May-19	980,450	1,090,450	368,640	351,610	370,200
Jun-19	649,158	921,230	304,100	301,760	315,370
Jul-19	618,687	526,810	179,780	167,330	179,700
Aug-19	559,508	600,600	200,850	197,710	202,040
Sep-19	603,085	661,430	222,160	210,200	229,070
Oct-19	967,926	1,245,578	439,840	409,100	396,638
Production 2019 (ytd) (kWh)	9,505,846	10,447,290	3,531,766	3,414,724	3,500,800
Total Production (kWh)*	12,122,935	12,878,910	4,341,226	4,214,764	4,322,920
Capacity Factor*	32.67%		*Value calculated over the last 12 months		

B. Site Energy Production Graph

October-2019



Monthly Report
October-2019

C. Safety Summary

	This Month	Project Cumulative
Recordable Incident(s)	0	0
Near Miss(es)	0	0

D. Planned Maintenance Events

Date	Event	Duration (hr)	Turbine
February-2020	Goldwind 7.5 Year Maintenance	~8	WTG 1
February-2020	Goldwind 7.5 Year Maintenance	~8	WTG 2
February-2020	Goldwind 7.5 Year Maintenance	~8	WTG 3

E. Actual Maintenance Events

Date	Event	Planned/Unplanned	Duration (hrs)	Turbine
10/21/2019	Grid Fault	Unplanned	8.80	WTG 3
10/22/2019	Grid Fault	Unplanned	20.24	WTG 3

F. Turbine Availability & Downtime

Availability	This Month	Year To Date
WTG 1	100.00%	98.57%
WTG 2	99.97%	98.77%
WTG 3	100.00%	100.00%
Avg	99.99%	99.11%

Downtime (hr)	This Month	Year To Date
WTG 1	9.64	399.29
WTG 2	11.03	413.51
WTG 3	37.74	324.03
Total	58.41	1136.83

G. Wind Speed & Capacity Factor

Wind Speed (mph)	This Month	2019 Annual
WTG 1	15.79	13.82
WTG 2	13.48	12.47
WTG 3	13.87	12.93
Estimated	13.89	13.39

Capacity Factor (%)	This Month	2019 Annual
WTG 1	39.41%	32.27%
WTG 2	36.66%	31.20%
WTG 3	35.54%	31.99%
Low Estimate	25.82%	28.72%

H. Report Notes and Comments