

Export Factor Analysis

Technology Type	Export Factor (%)
Wind	3.9
Micro CHP	4.6
PV	5.2
All	4.7

Table 1.1

Wind - Export Factor 3.9%									
Ref No.	Generation Capacity (kW)	Actual Export (kWh)	Individual Export Factor (%)	Technology Specific EAC (kWh)	% Difference	Error (kWh)	Non-Technology Specific EAC (kWh)	% Error (kWh)	
1	20	1420.92	0.81	6832.80	380.87	5411.88	8234.40	479.51	6813.48
2	20	9636.12	5.50	6832.80	-29.09	-2803.32	8234.40	-14.55	-1401.72
3	5	3625.77	8.28	1708.20	-52.89	-1917.57	2058.60	-43.22	-1567.17
4	2.5	1585.24	7.24	854.10	-46.12	-731.14	1029.30	-35.07	-555.94
Micro CHP - Export Factor 4.6%									
5	1	572.05	1.31	402.96	-29.56	-169.09	411.72	-28.03	-160.33
6	1	823.00	1.88	402.96	-51.04	-420.04	411.72	-49.97	-411.28
7	1	842.31	9.62	402.96	-52.16	-439.35	411.72	-51.12	-430.59
8	1	65.64	0.75	402.96	513.87	337.32	411.72	527.21	346.08
9	1	557.75	6.37	402.96	-27.75	-154.79	411.72	-26.18	-146.03
10	1	469.15	5.36	402.96	-14.11	-66.19	411.72	-12.24	-57.43
11	1	210.14	2.40	402.96	91.76	192.82	411.72	95.93	201.58
12	1	477.72	5.45	402.96	-15.65	-74.76	411.72	-13.82	-66.00
13	1	473.51	5.41	402.96	-14.90	-70.55	411.72	-13.05	-61.79
14	1	0.00	0.00	402.96 N/A		402.96	411.72 N/A		411.72
15	1	281.15	3.21	402.96	43.32	121.81	411.72	46.44	130.57
16	1	128.43	1.47	402.96	213.76	274.53	411.72	220.58	283.29
17	1	175.52	2.00	402.96	129.58	227.44	411.72	134.57	236.20
18	1	473.94	5.41	402.96	-14.98	-70.98	411.72	-13.13	-62.22
19	1	350.42	4.00	402.96	14.99	52.54	411.72	17.49	61.30
20	1	425.97	4.86	402.96	-5.40	-23.01	411.72	-3.35	-14.25
21	1	734.92	8.39	402.96	-45.17	-331.96	411.72	-43.98	-323.20
22	1	282.06	3.22	402.96	42.86	120.90	411.72	45.97	129.66
23	1	380.23	4.34	402.96	5.98	22.73	411.72	8.28	31.49
PV - Export Factor 5.2%									
24	4.92	2057.52	4.77	2241.16	8.93	183.64	2025.66	-1.55	-31.86
25	2.88	1112.42	4.41	1311.90	17.93	199.48	1185.75	6.59	73.34
26	2.52	1934.27	8.76	1147.91	-40.65	-786.36	1037.53	-46.36	-896.73
27	2.28	776.18	3.89	1038.59	33.81	262.40	938.72	20.94	162.54
28	2.23	682.00	3.49	1015.81	48.95	333.81	918.14	34.62	236.14
29	2	12.22	0.07	911.04	7353.10	898.82	823.44	6636.45	811.22
30	2	825.53	4.71	911.04	10.36	85.51	823.44	-0.25	-2.09
31	1.92	466.32	2.77	874.60	87.55	408.28	790.50	69.52	324.18
32	1.68	2067.97	14.05	765.27	-62.99	-1302.70	691.69	-66.55	-1376.28
33	1.44	1318.97	10.46	655.95	-50.27	-663.02	592.88	-55.05	-726.09
34	1.2	293.29	2.79	546.62	86.38	253.34	494.06	68.46	200.78
35	1.2	831.03	7.91	546.62	-34.22	-284.41	494.06	-40.55	-336.97
36	0.96	266.39	3.17	437.30	64.16	170.91	395.25	48.37	128.86
37	0.96	198.44	2.36	437.30	120.37	238.86	395.25	99.18	196.81
38	0.9	278.21	3.53	409.97	47.36	131.75	370.55	33.19	92.33

Table 1.2

Total Gross Error Comparison				
Technology Type	Gross Error Generation Specific Export Factor (kWh)	Gross Error Non-Generation Specific Export Factor (kWh)	Specific Per Site (kWh)	Non-Specific Per Site (kWh)
Wind	10863.91	10338.31	2715.98	2584.58
Micro CHP	3573.77	3565.01	188.09	187.63
PV	6203.28	5596.23	413.55	373.08
TOTAL	20640.97	19499.56	543.18	513.15

Table 1.3

Total Net Error Comparison				
Technology Type	Net Error Generation Specific Export Factor (kWh)	Net Error Non-Generation Specific Export Factor (kWh)	Net Error Per Site - Specific EF (kWh)	Net Error Per Site - Non-Specific EF (kWh)
Wind	-40.15	3288.65	-10.04	822.16
Micro CHP	-67.67	98.77	-3.56	5.20
PV	130.31	-1143.83	8.69	-76.26
TOTAL	22.48	2243.58	-4.91	751.10
Weighted Error =			0.40	149.09

Table 1.4