

Performance Measure Summary - Cape Coral FL

There are several inventory and performance measures listed in the pages of this Urban Area Report for the years from 1982 to 2020. There is no single performance measure that experts agree "says it all". A few key points should be recognized by users of the Urban Mobility Scorecard data.

Use the trends - The multi-year performance measures are better indicators, in most cases, than any single year. Examining a few measures over many years reduces the chance that data variations or the estimating procedures may have caused a "spike" in any single year. (5 years is 5 times better than 1 year.)

Use several measures - Each performance measure illustrates a different element of congestion. (The view is more interesting from atop several measures.)

Compare to similar regions - Congestion analyses that compare areas with similar characteristics (for example, population, growth rate, road and public transportation system design) are usually more insightful than comparisons of different regions. (Los Angeles is not Peoria.)

Compare ranking changes and performance measure values - In some performance measures, a small change in the value may cause a significant change in rank from one year to the next. This is the case when there are several regions with nearly the same value. (15 hours is only 1 hour more than 14 hours.)

Consider the scope of improvement options - Any improvement project in a corridor within most of the regions will only have a modest effect on the regional congestion level. (To have an effect on areawide congestion, there must be significant change in the system or service.)

Performance Measures and Definition of Terms

Travel Time Index - A measure of congestion that focuses on each trip and each mile of travel. It is calculated as the ratio of travel time in the peak period to travel time in free-flow. A value of 1.30 indicates that a 20-minute free-flow trip takes 26 minutes in the peak.

Planning Time Index - A travel time reliability measure that represents the total travel time that should be planned for a trip. Computed with the 95th percentile travel time it represents the amount of time that should be planned for a commute trip to be late for only 1 day a month. If it is computed with the 80th percentile travel time it represents the amount of time that should be planned for a trip to be late for only 1 day a week. A PTI of 2.00 means that for a 20-minute trip in light traffic, 40 minutes should be planned.

Peak Commuters - Number of travelers who begin a trip during the morning or evening peak travel periods (6 to 10 a.m. and 3 to 7 p.m.). "Commuters" are private vehicle users unless specifically noted.

Annual Delay per Commuter - A yearly sum of all the per-trip delays for those persons who travel in the peak period (6 to 10 a.m. and 3 to 7 p.m.). This measure illustrates the effect of traffic slowdowns as well as the length of each trip.

Total Delay - The overall size of the congestion problem. Measured by the total travel time above that needed to complete a trip at free-flow speeds. The ranking of total delay usually follows the population ranking (larger regions usually have more delay).

Free-Flow Speeds - These values are derived from time periods with lighter traffic volumes in the INRIX speed database. They are used as the national comparison thresholds. Other speed thresholds may be appropriate for urban project evaluations or sub-region studies.

Excess Fuel Consumed - Increased fuel consumption due to travel in congested conditions rather than free-flow conditions.

Congestion Cost - Value of travel delay for 2020 (estimated at \$20.17 per hour of person travel and \$55.24 per hour of truck time) and excess fuel consumption estimated using state average cost per gallon.

Urban Area - The developed area (population density more than 1,000 persons per square mile) within a metropolitan region. The urban area boundaries change frequently (every year for most growing areas), so increases include both new growth and development that was previously in areas designated as rural.

Number of Rush Hours - Time when the road system might have congestion.

Annual Greenhouse Gases (CO₂) Produced - Tons of CO₂ produced from all vehicle travel.

Excess Greenhouse Gases (CO₂) Produced due to Congestion - Tons of CO₂ produced due to congested portion of travel. The excess CO₂ is a subset of the total CO₂ produced.

Mobility Data for Cape Coral FL

Inventory Measures	2020	2019	2018	2017	2016	2015
Urban Area Information						
Population (1000s)	630	630	610	595	585	575
Rank	67	67	70	72	73	73
Commuters (1000s)	322	322	312	304	298	293
Daily Vehicle-Miles of Travel (1000s)						
Freeway	2,227	2,379	2,350	2,249	2,193	2,016
Arterial Streets	7,537	8,052	7,843	7,672	7,650	7,342
Cost Components						
Value of Time (\$/hour)	20.17	19.14	18.71	18.12	17.91	17.69
Commercial Cost (\$/hour)	55.24	49.49	54.71	52.14	50.20	46.87
Gasoline (\$/gallon)	2.26	2.48	2.77	2.28	2.12	2.23
Diesel (\$/gallon)	2.71	2.85	3.15	2.48	2.31	2.55
System Performance	2020	2019	2018	2017	2016	2015
Congested Travel (% of peak VMT)	--	--	--	16.5	--	--
Congested System (% of lane-miles)	--	--	--	12.1	--	--
Congested Time (number of "Rush Hours")	--	--	--	1.2	--	--
Annual Excess Fuel Consumed						
Total Fuel (1000 gallons)	3,086	8,916	7,872	6,762	5,689	5,550
Rank	77	62	63	69	75	75
Fuel per Peak Auto Commuter (gallons)	6	17	16	14	14	14
Rank	95	78	79	90	90	87
Annual Delay						
Total Delay (1000s of person-hours)	7,399	21,377	18,527	16,733	15,308	14,679
Rank	79	62	65	67	70	72
Delay per Auto Commuter (pers-hrs)	15	45	40	37	36	36
Rank	94	60	77	86	86	82
Travel Time Index	1.06	1.19	1.18	1.18	1.17	1.17
Rank	75	40	41	43	46	46
Commuter Stress Index	1.09	1.21	1.23	1.21	--	--
Rank	44	44	40	41	--	--
Freeway Planning Time Index (95th Pctile)	--	1.30	1.25	1.33	--	--
Rank	--	68	76	66	--	--
Congestion Cost						
Total Cost (\$ millions)	163	455	400	356	320	303
Rank	79	63	64	67	70	73
Cost per Auto Commuter (\$)	337	938	851	776	759	725
Rank	94	51	61	71	73	74
Truck Congestion						
Annual Person-Hours of Delay (000)	243	725	653	661	643	617
Rank	87	67	71	68	68	71
Annual Gallons of Wasted Fuel (000)	449	1,339	1,271	1,222	1,206	1,177
Rank	86	65	66	70	70	70
Annual Congestion Cost (\$ million)	13	36	36	35	33	30
Rank	85	71	70	68	67	69
Annual Greenhouse Gases (CO2) Produced						
Excess Due to Congestion (tons)	30,754	88,853	--	--	--	--
Rank	77	62	--	--	--	--
Due to All Travel (tons)	1,023,297	2,956,435	--	--	--	--
Rank	80	59	--	--	--	--
Truck Annual Greenhouse Gases (CO2) Produced						
Excess Due to Truck Congestion (tons)	4,897	14,617	--	--	--	--
Rank	85	66	--	--	--	--
Due to Truck Travel (tons)	118,316	353,133	--	--	--	--
Rank	93	85	--	--	--	--

* Note: Zeroes in the table reflect values less than 0.5.

Mobility Data for Cape Coral FL

Inventory Measures	2014	2013	2012	2011	2010	2009
Urban Area Information						
Population (1000s)	570	545	520	505	490	475
Rank	73	75	75	78	78	78
Commuters (1000s)	290	282	269	261	252	244
Daily Vehicle-Miles of Travel (1000s)						
Freeway	1,856	1,768	1,730	1,793	1,763	1,700
Arterial Streets	7,118	5,808	5,860	5,879	5,780	5,900
Cost Components						
Value of Time (\$/hour)	17.67	17.39	17.14	16.79	16.28	16.01
Commercial Cost (\$/hour)	44.82	41.23	39.66	44.62	42.50	41.83
Gasoline (\$/gallon)	3.27	3.47	3.50	3.24	2.74	2.33
Diesel (\$/gallon)	3.60	3.90	3.87	3.65	2.96	2.59
System Performance	2014	2013	2012	2011	2010	2009
Congested Travel (% of peak VMT)	--	--	--	--	--	--
Congested System (% of lane-miles)	--	--	--	--	--	--
Congested Time (number of "Rush Hours")	--	--	--	--	--	--
Annual Excess Fuel Consumed						
Total Fuel (1000 gallons)	5,444	5,309	5,268	5,227	5,222	5,132
Rank	75	75	75	75	75	75
Fuel per Peak Auto Commuter (gallons)	13	13	13	13	13	12
Rank	88	89	87	84	84	83
Annual Delay						
Total Delay (1000s of person-hours)	14,274	13,799	13,449	13,103	12,851	12,395
Rank	72	73	71	70	70	70
Delay per Auto Commuter (pers-hrs)	35	35	36	36	36	36
Rank	80	79	72	69	64	61
Travel Time Index	1.18	1.18	1.18	1.19	1.10	1.20
Rank	39	39	38	38	98	36
Commuter Stress Index	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Freeway Planning Time Index (95th Pctile)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Congestion Cost						
Total Cost (\$ millions)	299	285	274	263	248	234
Rank	73	73	72	72	70	70
Cost per Auto Commuter (\$)	700	684	675	680	688	675
Rank	74	75	73	71	69	68
Truck Congestion						
Annual Person-Hours of Delay (000)	600	580	565	550	540	521
Rank	71	71	70	69	68	69
Annual Gallons of Wasted Fuel (000)	1,154	1,126	1,117	1,108	1,107	1,088
Rank	71	72	70	70	70	69
Annual Congestion Cost (\$ million)	29	27	25	27	25	23
Rank	70	69	71	68	65	67
Annual Greenhouse Gases (CO2) Produced						
Excess Due to Congestion (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Due to All Travel (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Truck Annual Greenhouse Gases (CO2) Produced						
Excess Due to Truck Congestion (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Due to Truck Travel (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--

* Note: Zeroes in the table reflect values less than 0.5.

Mobility Data for Cape Coral FL

Inventory Measures	2008	2007	2006	2005	2004	2003
Urban Area Information						
Population (1000s)	465	460	440	410	390	370
Rank	78	78	79	81	81	81
Commuters (1000s)	238	234	222	206	195	184
Daily Vehicle-Miles of Travel (1000s)						
Freeway	1,645	1,845	1,900	1,875	1,795	1,500
Arterial Streets	5,965	6,155	5,950	5,600	5,325	5,100
Cost Components						
Value of Time (\$/hour)	16.07	15.47	15.06	14.58	14.10	13.73
Commercial Cost (\$/hour)	40.77	39.30	37.88	36.51	35.19	33.92
Gasoline (\$/gallon)	3.47	2.98	2.66	2.34	1.99	1.53
Diesel (\$/gallon)	4.15	3.36	2.85	2.53	2.01	1.61
System Performance	2008	2007	2006	2005	2004	2003
Congested Travel (% of peak VMT)	--	--	--	--	--	--
Congested System (% of lane-miles)	--	--	--	--	--	--
Congested Time (number of "Rush Hours")	--	--	--	--	--	--
Annual Excess Fuel Consumed						
Total Fuel (1000 gallons)	5,569	5,357	4,704	4,192	3,863	3,568
Rank	74	75	78	78	78	78
Fuel per Peak Auto Commuter (gallons)	15	15	12	11	10	10
Rank	75	73	86	88	90	89
Annual Delay						
Total Delay (1000s of person-hours)	12,808	12,321	10,820	9,643	8,885	8,206
Rank	67	70	76	76	77	76
Delay per Auto Commuter (pers-hrs)	38	37	34	33	32	31
Rank	47	54	69	71	73	75
Travel Time Index	1.22	1.21	1.20	1.19	1.18	1.18
Rank	34	36	37	38	38	38
Commuter Stress Index	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Freeway Planning Time Index (95th Pctile)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Congestion Cost						
Total Cost (\$ millions)	250	229	194	166	147	130
Rank	68	70	76	76	77	76
Cost per Auto Commuter (\$)	691	691	622	572	545	521
Rank	62	66	81	87	89	89
Truck Congestion						
Annual Person-Hours of Delay (000)	538	517	454	405	373	345
Rank	65	68	74	77	76	78
Annual Gallons of Wasted Fuel (000)	1,181	1,136	997	889	819	756
Rank	66	68	73	76	76	76
Annual Congestion Cost (\$ million)	25	23	19	16	14	12
Rank	66	68	73	75	74	75
Annual Greenhouse Gases (CO2) Produced						
Excess Due to Congestion (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Due to All Travel (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Truck Annual Greenhouse Gases (CO2) Produced						
Excess Due to Truck Congestion (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Due to Truck Travel (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--

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Mobility Data for Cape Coral FL

Inventory Measures	2002	2001	2000	1999	1998	1997
Urban Area Information						
Population (1000s)	345	325	305	295	285	270
Rank	84	86	89	90	90	91
Commuters (1000s)	169	157	145	138	131	122
Daily Vehicle-Miles of Travel (1000s)						
Freeway	1,300	1,100	950	850	700	550
Arterial Streets	4,800	4,500	4,300	4,100	3,900	3,650
Cost Components						
Value of Time (\$/hour)	13.43	13.22	12.85	12.43	12.17	11.98
Commercial Cost (\$/hour)	32.69	31.51	30.38	29.28	28.89	28.50
Gasoline (\$/gallon)	1.41	1.51	1.54	1.14	1.07	1.17
Diesel (\$/gallon)	1.41	1.58	1.55	1.19	1.20	1.27
System Performance	2002	2001	2000	1999	1998	1997
Congested Travel (% of peak VMT)	--	--	--	--	--	--
Congested System (% of lane-miles)	--	--	--	--	--	--
Congested Time (number of "Rush Hours")	--	--	--	--	--	--
Annual Excess Fuel Consumed						
Total Fuel (1000 gallons)	3,236	2,909	2,628	2,383	2,107	1,948
Rank	79	80	82	82	84	85
Fuel per Peak Auto Commuter (gallons)	9	8	7	7	5	5
Rank	91	92	91	90	93	92
Annual Delay						
Total Delay (1000s of person-hours)	7,442	6,691	6,045	5,481	4,845	4,479
Rank	76	77	79	80	80	82
Delay per Auto Commuter (pers-hrs)	31	30	29	27	25	25
Rank	72	71	71	74	76	73
Travel Time Index	1.17	1.17	1.16	1.15	1.14	1.14
Rank	40	38	43	50	53	46
Commuter Stress Index	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Freeway Planning Time Index (95th Pctile)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Congestion Cost						
Total Cost (\$ millions)	115	102	90	78	67	62
Rank	76	77	79	80	81	79
Cost per Auto Commuter (\$)	482	439	409	381	343	322
Rank	89	89	89	91	92	93
Truck Congestion						
Annual Person-Hours of Delay (000)	313	281	254	230	203	188
Rank	79	80	82	83	83	84
Annual Gallons of Wasted Fuel (000)	686	617	557	505	447	413
Rank	75	78	82	82	86	86
Annual Congestion Cost (\$ million)	10	9	8	7	6	6
Rank	79	79	79	80	80	80
Annual Greenhouse Gases (CO2) Produced						
Excess Due to Congestion (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Due to All Travel (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Truck Annual Greenhouse Gases (CO2) Produced						
Excess Due to Truck Congestion (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Due to Truck Travel (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--

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Mobility Data for Cape Coral FL

Inventory Measures	1996	1995	1994	1993	1992	1991
Urban Area Information						
Population (1000s)	265	260	255	250	250	245
Rank	91	90	90	89	89	89
Commuters (1000s)	118	114	110	107	105	101
Daily Vehicle-Miles of Travel (1000s)						
Freeway	400	350	340	335	330	295
Arterial Streets	3,595	3,465	3,100	2,775	2,430	2,205
Cost Components						
Value of Time (\$/hour)	11.71	11.37	11.06	10.78	10.47	10.17
Commercial Cost (\$/hour)	28.12	27.75	27.38	27.02	26.66	26.30
Gasoline (\$/gallon)	1.30	1.20	1.08	1.13	1.12	1.10
Diesel (\$/gallon)	1.40	1.30	1.17	1.22	1.20	1.24
System Performance	1996	1995	1994	1993	1992	1991
Congested Travel (% of peak VMT)	--	--	--	--	--	--
Congested System (% of lane-miles)	--	--	--	--	--	--
Congested Time (number of "Rush Hours")	--	--	--	--	--	--
Annual Excess Fuel Consumed						
Total Fuel (1000 gallons)	1,778	1,680	1,494	1,423	1,351	1,254
Rank	85	83	84	85	85	85
Fuel per Peak Auto Commuter (gallons)	4	4	4	3	3	3
Rank	92	90	91	90	90	90
Annual Delay						
Total Delay (1000s of person-hours)	4,089	3,865	3,437	3,272	3,107	2,884
Rank	79	79	81	80	79	80
Delay per Auto Commuter (pers-hrs)	23	23	21	20	19	19
Rank	74	73	75	74	74	68
Travel Time Index	1.13	1.13	1.12	1.12	1.11	1.11
Rank	50	47	50	45	49	46
Commuter Stress Index	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Freeway Planning Time Index (95th Pctile)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Congestion Cost						
Total Cost (\$ millions)	55	51	44	41	38	34
Rank	79	79	81	80	80	80
Cost per Auto Commuter (\$)	303	295	270	267	256	243
Rank	91	91	92	91	89	89
Truck Congestion						
Annual Person-Hours of Delay (000)	172	162	144	137	130	121
Rank	82	82	84	83	83	83
Annual Gallons of Wasted Fuel (000)	377	356	317	302	286	266
Rank	85	83	85	84	84	84
Annual Congestion Cost (\$ million)	5	5	4	4	4	3
Rank	80	80	81	80	79	82
Annual Greenhouse Gases (CO2) Produced						
Excess Due to Congestion (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Due to All Travel (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Truck Annual Greenhouse Gases (CO2) Produced						
Excess Due to Truck Congestion (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Due to Truck Travel (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--

* Note: Zeroes in the table reflect values less than 0.5.

Mobility Data for Cape Coral FL

Inventory Measures	1990	1989	1988	1987	1986	1985
Urban Area Information						
Population (1000s)	245	240	235	230	225	215
Rank	89	88	88	88	88	88
Commuters (1000s)	100	97	94	92	89	84
Daily Vehicle-Miles of Travel (1000s)						
Freeway	270	255	235	225	210	205
Arterial Streets	2,075	2,035	1,975	1,810	1,745	1,650
Cost Components						
Value of Time (\$/hour)	9.75	9.25	8.83	8.48	8.18	8.03
Commercial Cost (\$/hour)	25.95	25.60	25.26	24.93	24.60	24.27
Gasoline (\$/gallon)	1.05	1.08	1.00	1.00	0.98	1.28
Diesel (\$/gallon)	1.11	1.07	0.99	0.99	0.97	1.27
System Performance	1990	1989	1988	1987	1986	1985
Congested Travel (% of peak VMT)	--	--	--	--	--	--
Congested System (% of lane-miles)	--	--	--	--	--	--
Congested Time (number of "Rush Hours")	--	--	--	--	--	--
Annual Excess Fuel Consumed						
Total Fuel (1000 gallons)	1,164	1,066	940	829	775	673
Rank	83	83	83	83	83	83
Fuel per Peak Auto Commuter (gallons)	3	3	2	2	2	2
Rank	90	85	87	86	84	84
Annual Delay						
Total Delay (1000s of person-hours)	2,677	2,452	2,162	1,908	1,782	1,549
Rank	79	80	80	81	81	81
Delay per Auto Commuter (pers-hrs)	17	16	15	13	13	12
Rank	70	68	67	75	64	63
Travel Time Index	1.10	1.09	1.08	1.08	1.07	1.07
Rank	47	49	49	45	49	48
Commuter Stress Index	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Freeway Planning Time Index (95th Pctile)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Congestion Cost						
Total Cost (\$ millions)	30	27	22	19	17	15
Rank	80	80	81	81	81	81
Cost per Auto Commuter (\$)	242	231	218	203	189	167
Rank	87	87	87	87	87	88
Truck Congestion						
Annual Person-Hours of Delay (000)	112	103	91	80	75	65
Rank	83	83	83	83	83	82
Annual Gallons of Wasted Fuel (000)	247	226	199	176	164	143
Rank	83	83	83	83	83	82
Annual Congestion Cost (\$ million)	3	3	2	2	2	2
Rank	81	76	83	81	76	73
Annual Greenhouse Gases (CO2) Produced						
Excess Due to Congestion (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Due to All Travel (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Truck Annual Greenhouse Gases (CO2) Produced						
Excess Due to Truck Congestion (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--
Due to Truck Travel (tons)	--	--	--	--	--	--
Rank	--	--	--	--	--	--

* Note: Zeroes in the table reflect values less than 0.5.

Mobility Data for Cape Coral FL

Inventory Measures	1984	1983	1982
Urban Area Information			
Population (1000s)	205	200	195
Rank	88	88	88
Commuters (1000s)	80	77	74
Daily Vehicle-Miles of Travel (1000s)			
Freeway	190	180	170
Arterial Streets	1,590	1,470	1,400
Cost Components			
Value of Time (\$/hour)	7.75	7.43	7.20
Commercial Cost (\$/hour)	23.94	23.63	23.31
Gasoline (\$/gallon)	1.29	1.32	1.38
Diesel (\$/gallon)	1.28	1.31	1.37
System Performance	1984	1983	1982
Congested Travel (% of peak VMT)	--	--	--
Congested System (% of lane-miles)	--	--	--
Congested Time (number of "Rush Hours")	--	--	--
Annual Excess Fuel Consumed			
Total Fuel (1000 gallons)	596	566	513
Rank	83	83	83
Fuel per Peak Auto Commuter (gallons)	1	1	1
Rank	87	86	82
Annual Delay			
Total Delay (1000s of person-hours)	1,372	1,302	1,180
Rank	81	79	80
Delay per Auto Commuter (pers-hrs)	11	11	10
Rank	64	56	58
Travel Time Index	1.06	1.06	1.06
Rank	50	45	42
Commuter Stress Index	--	--	--
Rank	--	--	--
Freeway Planning Time Index (95th Pctile)	--	--	--
Rank	--	--	--
Congestion Cost			
Total Cost (\$ millions)	13	12	10
Rank	80	79	80
Cost per Auto Commuter (\$)	156	155	142
Rank	87	85	88
Truck Congestion			
Annual Person-Hours of Delay (000)	58	55	50
Rank	82	80	80
Annual Gallons of Wasted Fuel (000)	126	120	109
Rank	81	79	77
Annual Congestion Cost (\$ million)	1	1	1
Rank	82	79	78
Annual Greenhouse Gases (CO2) Produced			
Excess Due to Congestion (tons)	--	--	--
Rank	--	--	--
Due to All Travel (tons)	--	--	--
Rank	--	--	--
Truck Annual Greenhouse Gases (CO2) Produced			
Excess Due to Truck Congestion (tons)	--	--	--
Rank	--	--	--
Due to Truck Travel (tons)	--	--	--
Rank	--	--	--

* Note: Zeroes in the table reflect values less than 0.5.