Table S1 Studied datasets and their respective access numbers and references. The last column of the table indicates the groups (e.g., control, condition 1, condition 2) belonging to each dataset.

	Access number	Ref. (Code)	Data size	Classes
Bone matrix	GDS928	[70] (B1)	10499 genes and 6 replica	control (1), temporal groups 1, 2, 3, 4, 5 (5)
	E-MEXP-1618	[62] (B2)	54675 genes and 84 replica	group 1 (84)
	GSE30322	[77] (B3)	24747 genes and 31 replica	temporal group 1 (5) and control 1 (5), temporal group 2 (5) and control 2 (5), temporal group 3 (5) and control 3 (5)
	GSE47552	[76] (B4)	33297 genes and 99 replica	control (5), group 1 (41), group 2 (33), group 3 (20)
Cancer cells	GDS5059	[63] (C1)	54675 genes and 30 replica	temporal group 1 (8) and control (2), temporal group 2 (8) and control (2), temporal group 3 (8) and control (2)
	GDS5071	[71] (C2)	33297 genes and 13 replica	control (6), group 1 (7)
	GDS5010	[59] (C3)	45101 genes and 18 replica	control 1 (3) and group 1 (3), control 2 (3) and group 2 (3), control 3 (3) and group 3 (3)
	GDS5070	[60] (C4)	54675 genes and 12 replica	control 1 (3) and group 1 (3), control 2 (3) and group 2 (3)
	GSE45016	[65] (C5)	54675 genes and 11 replica	control (1), group 1 (10)
Drosophila development	GSE9149	[83] (D1)	14010 genes and 29 replica	group 1 (6), group 2 (6), group 3 (6), group 4 (6), group 5 (5)
	GSE35240	[66] (D2)	18952 genes and 15 replica	control 1 (3), control 2 (3), group 1 (3), group 2 (3), group
	GSE31564	[78] (D3)	18952 genes and 24 replica	2 controls (3) and 6 temporal groups (3)
	GSE18208	[69] (D4)	18952 genes and 16 replica	control (2), group 1 (7), group 2 (7)
	GSE34400	[67] (D5)	18952 genes and 44 replica	control (6), group 1 (38)
Neuron cells	GSE28146	[61] (N1)	54657 genes and 30 replica	control (7), group 1 (7), group 2 (8), group 3 (8)
	GSE43578	[72] (N2)	35557 genes and 18 replica	control 1 (5), group 1 (4), control 2 (3), group 2 (6)
Plant cells	GDS2895	[74] (P1)	28800 genes and 20 replica	group 1 (4), group 2 (4), group 3 (4), group 4 (4), group 5 (4)
	GSE14304	[68] (P2)	42537 genes and 16 replica	group 1 (2), group 2 (2), group 3 (2), group 4 (2), group 5 (2), group 6 (2), group 7 (2), group 8 (2)
	GSE14304	[68] (P3)	57381 genes and 98 replica	group 1 (98)
	GDS2114	[73] (P4)	22810 genes and 12 replica	control 1 (1) and group 1(3), control 2 (1) and group 2 (3), control 3 (1) and group 3 (3)
	GDS3244	[64] (P5)	61170 genes and 160 replica	40 groups (4)

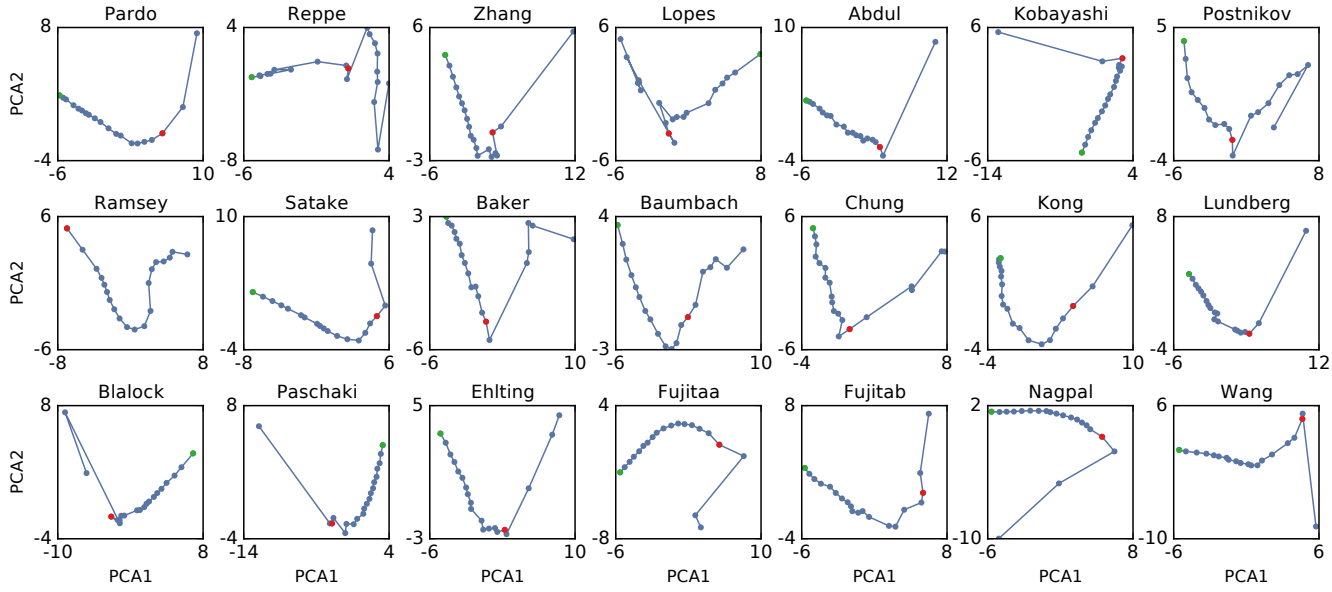

Fig. S1 PCA projections of network properties obtained using distinct threshold values. The name on the top of each plot corresponds to the first author of the dataset were the networks were generated. Green dots indicate the network corresponding to the lowest threshold. Red dots indicate the detected transition from stable to unstable properties.

Table S2 Absolute Pearson correlation coefficients obtained for the relationships between node strength (sum of edge weights) and degree. Green cells indicate values larger than 0.5.

	T variation	T entropy	T comp. 0.4	T comp. 0.6	T comp. 0.8	T deg. 100	T deg. 1000	T power-law
Pardo	0.65	0.65	0.31	0.47	0.47	0.75	0.93	0.31
Reppe	0.16	0.63	0.41	0.58	0.77	0.46	0.84	0.70
Zhang	0.08	0.65	0.36	0.50	0.61	0.61	0.87	0.58
Lopes	0.06	0.82	0.52	0.64	0.75	0.53	0.82	0.33
Abdul	0.19	0.89	0.62	0.77	0.84	0.51	0.75	0.28
Kobayashi	0.28	0.70	0.50	0.56	0.61	0.62	0.81	0.67
Postnikov	0.34	0.65	0.43	0.51	0.55	0.67	0.91	0.91
Ramsey	0.84	0.73	0.57	0.64	0.66	0.50	0.73	0.44
Satake	0.13	0.30	0.16	0.19	0.22	0.40	0.77	0.15
Baker	0.51	0.55	0.40	0.46	0.64	0.31	0.60	0.42
Baumbach	0.77	0.83	0.72	0.77	0.80	0.70	0.80	0.80
Chung	0.62	0.22	0.61	0.60	0.43	0.30	0.94	0.82
Kong	0.56	0.53	0.63	0.78	0.83	0.51	0.78	0.58
Lundberg	0.11	0.92	0.61	0.78	0.87	0.67	0.92	0.78
Blalock	0.09	0.59	0.38	0.42	0.46	0.60	0.89	0.71
Paschaki	0.13	0.63	0.41	0.51	0.59	0.61	0.86	0.68
Ehlting	0.20	0.75	0.49	0.57	0.64	0.67	0.90	0.76
Fujitaa	0.42	0.49	0.38	0.42	0.53	0.35	0.66	0.29
Fujitab	0.00	0.16	0.07	0.03	0.12	0.07	0.55	0.07
Nagpal	0.34	0.71	0.44	0.56	0.63	0.69	0.90	0.58
Wang	0.10	0.72	0.60	0.77	0.89	0.53	0.76	0.38

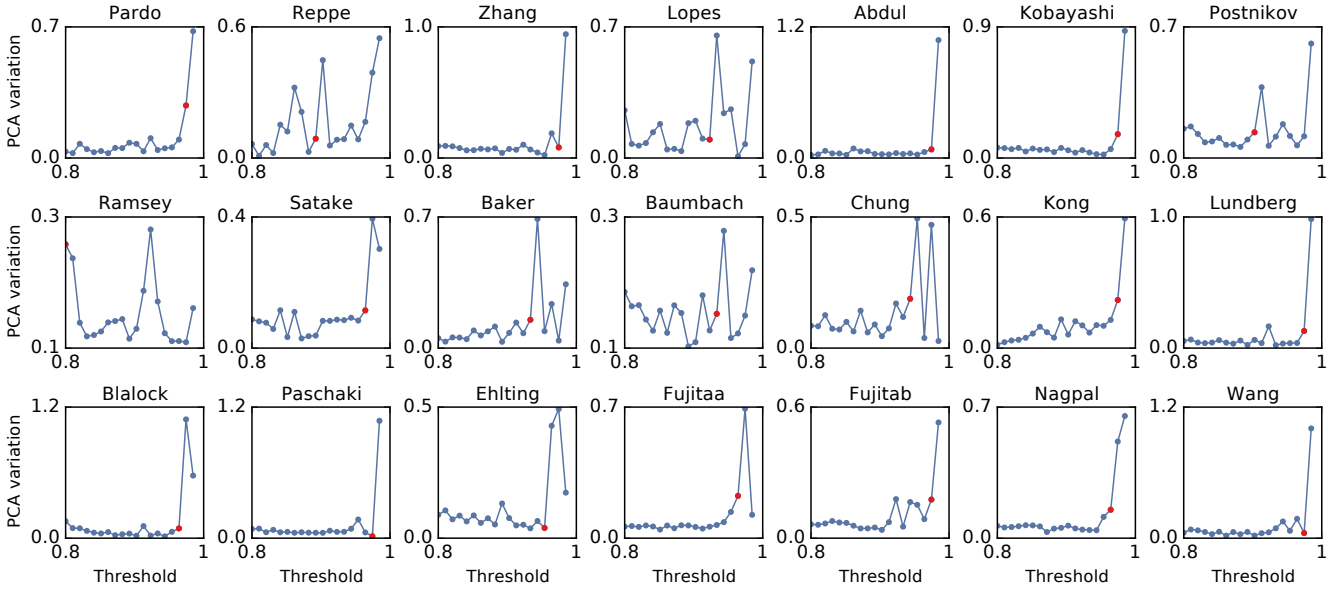

Fig. S2 Variation among consecutive PCA points from Figure S1. The name on the top of each plot corresponds to the first author of the dataset were the networks were generated. Red dots indicate the detected transition from stable to unstable properties.

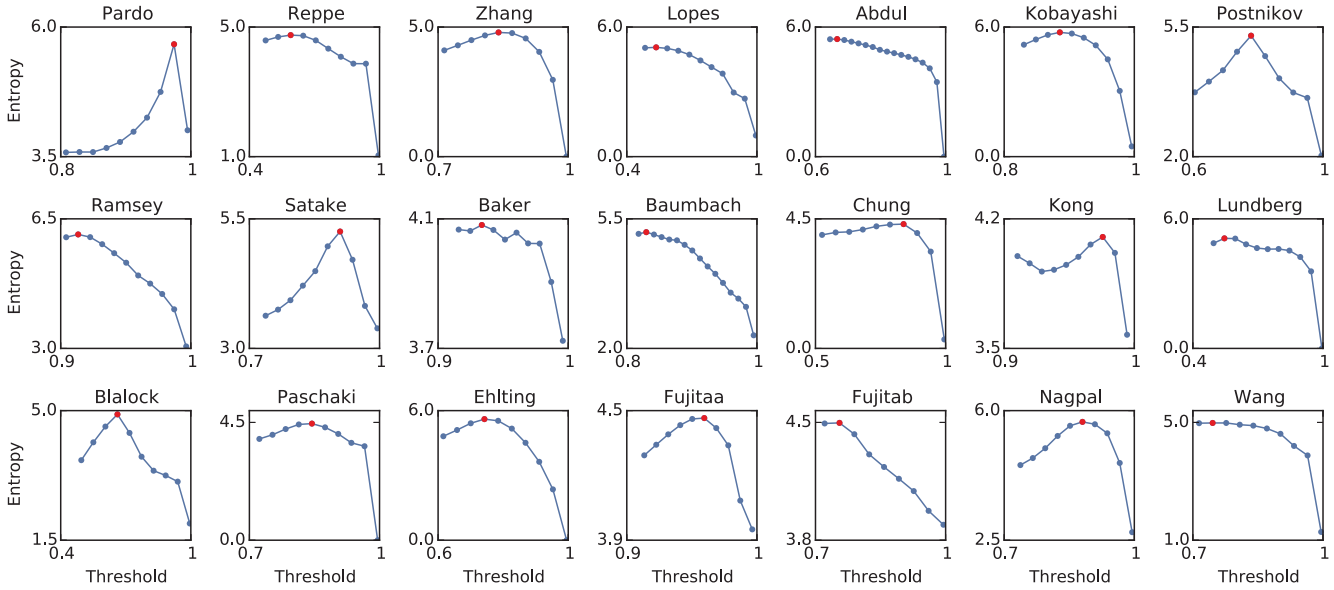

Fig. S3 Entropy values obtained for networks generated by different threshold values. Red dots indicate the maximum entropy reached by each dataset.

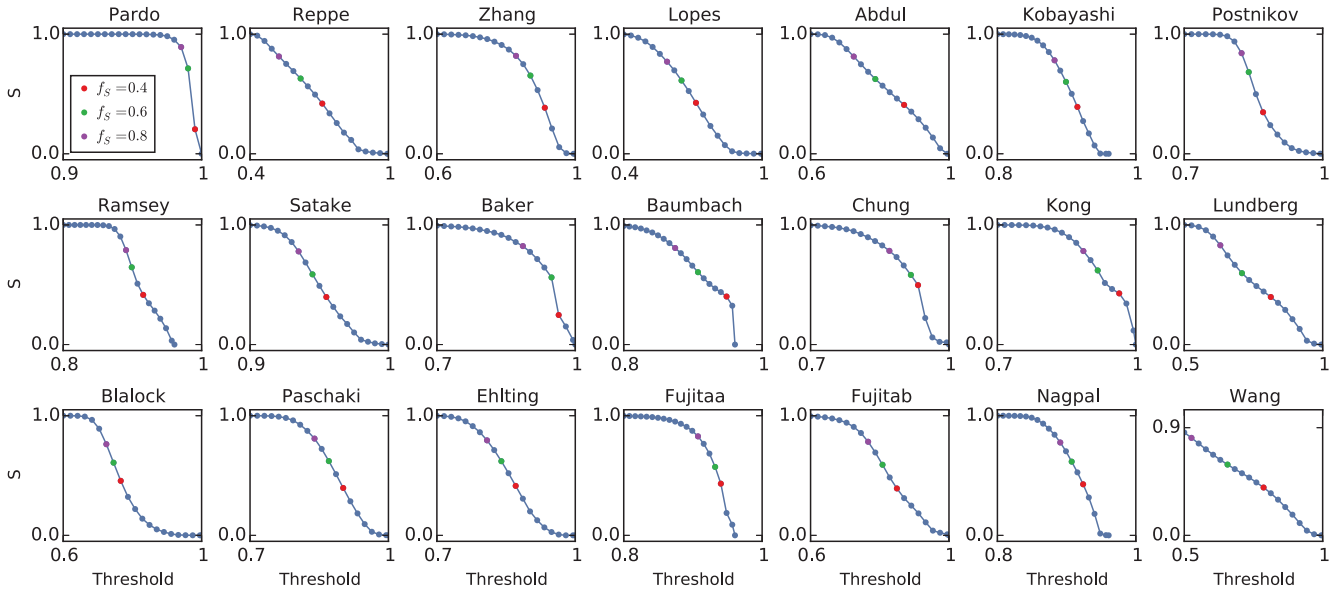

Fig. S4 Network's giant component size as a function of threshold. The size is normalized by the total number of genes studied in each experiment. Colored dots indicate the giant component sizes used in the analysis, represented as f_s.

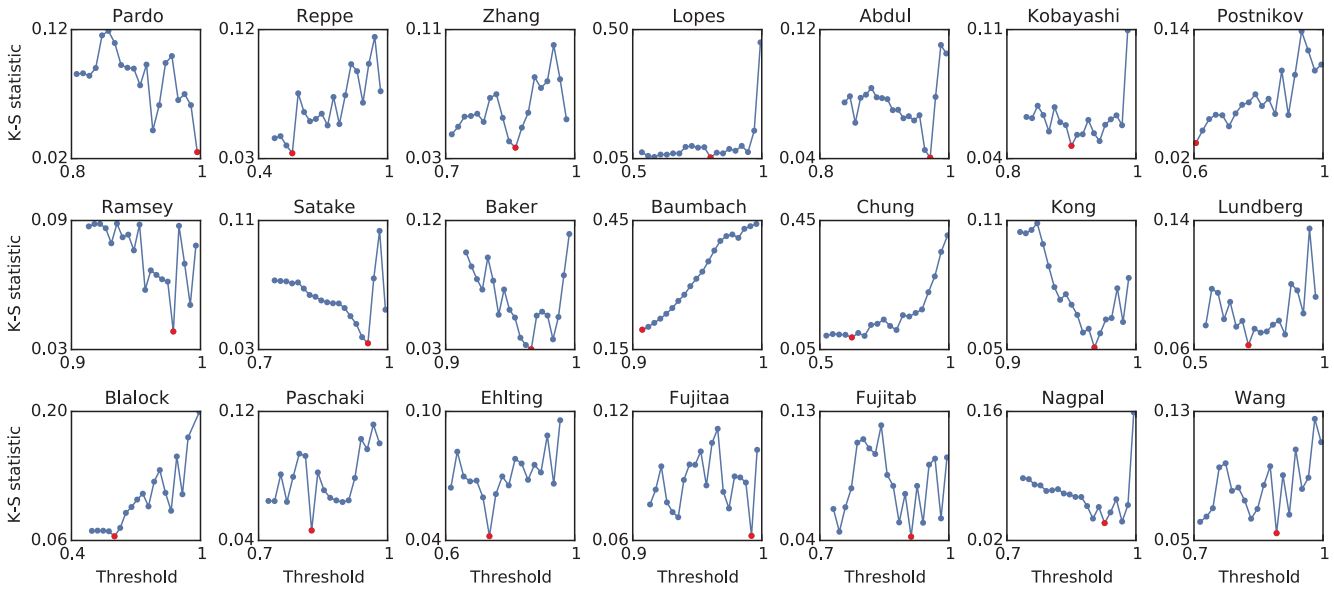

Fig. S5 Kolmogorov-Smirnov statistic comparing the degree distribution of the networks to a power-law function.

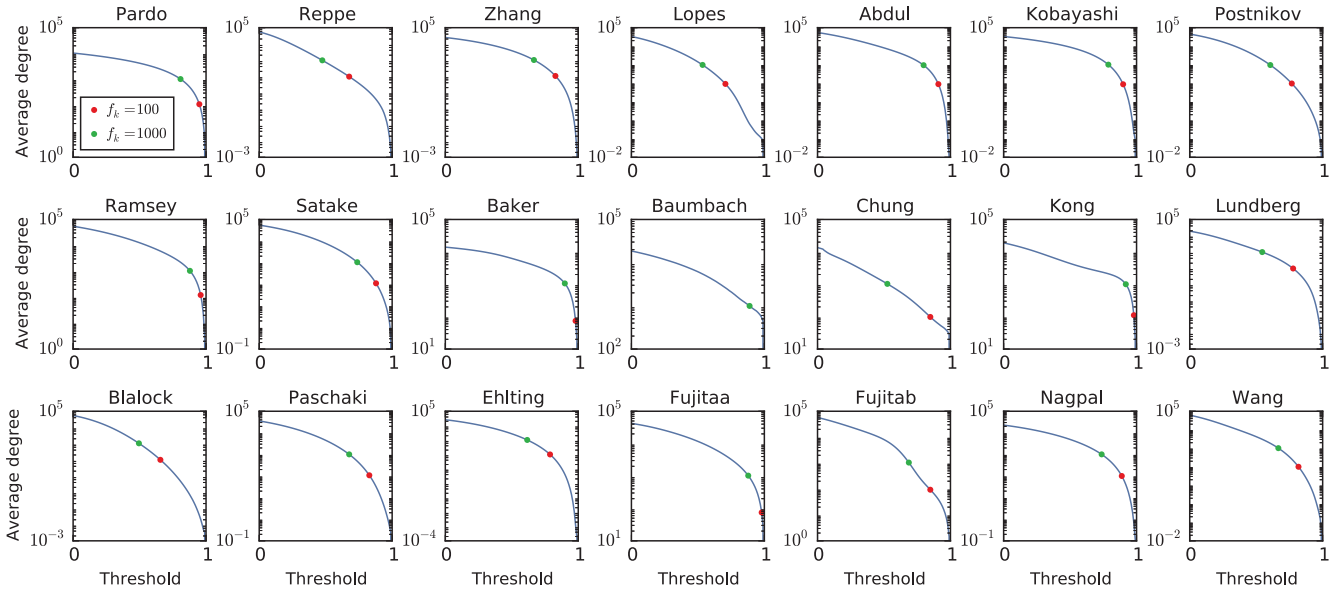

Fig. S6 Average degree of the networks obtained by different thresholds. The dots indicate the chosen average degree for analyzing this criterion, represented as f_k.

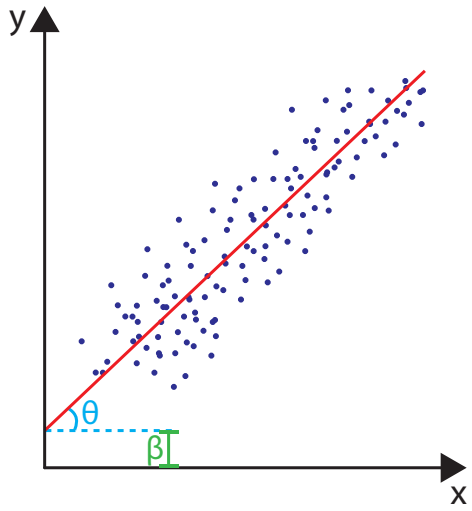

Fig. S7 Meaning of the angular (α) and linear (β) coefficients. The red line represents a linear regression of the blue points. β is given by the y value where the red line intercepts the y axis. θ is the angle between the red line and the x axis. α is calculated as $\alpha = \tan(\theta)$.

Table S3 Measures obtained for each dataset when considering different threshold criteria. The box below the table indicates the position of each measure in the table's cells. *N giant* is the number of nodes in the giant component, *Avg. degree* represents the average degree, *Std. degree* is the standard deviation of the nodes degree, *Clust. coef.* is the clustering coefficient, *Diameter* is the network diameter. We also show statistics associated to the community structure found for each network (found using the method presented in [84]): *R*1 indicates the number of nodes in the largest community, divided by *N giant*, *R*2 is the number of nodes in the second largest community, divided by *N giant*, *Comun. avg. size* is the average number of nodes contained in the communities.

	T variation			T entropy			T comp. 0.4			T comp. 0.6			T comp. 0.8			T deg. 100			T deg. 1000			T power-law		
Pardo	10303	33	32.2	10305	33	32.7	2152	5	6.4	7492	8	9.3	7492	8	9.3	10498	111	91.2	10499	1040	520.9	2152	5	6.4
	0.47	25	0.73	0.47	25	0.73	0.63	53	0.87	0.52	51	0.85	0.52	51	0.85	0.48	14	0.65	0.54	4	0.43	0.63	53	0.87
	0.12	0.09	468.3	0.14	0.11	448.0	0.07	0.06	55.2	0.07	0.07	170.3	0.07	0.07	170.3	0.19	0.14	954.4	0.21	0.21	1749.8	0.07	0.06	55.2
Reppe	1171	42	52.0	37161	394	556.6	22939	146	257.8	34396	316	470.6	44480	715	887.9	27365	190	319.1	49756	1060	1234.3	40664	527	695.9
	0.60	12	0.52	0.52	14	0.66	0.59	16	0.71	0.53	12	0.68	0.46	12	0.59	0.57	15	0.71	0.43	11	0.52	0.49	12	0.63
	0.48	0.31	234.2	0.21	0.17	1238.7	0.22	0.17	573.5	0.21	0.15	1146.5	0.19	0.19	2471.1	0.21	0.16	829.2	0.33	0.19	1658.5	0.20	0.17	1506.1
Zhang	117	6	6.0	21191	165	215.6	9520	26	41.8	16180	62	94.5	20256	132	179.1	20144	128	175.0	24566	1018	879.4	19272	106	149.4
	0.46	11	0.49	0.46	14	0.68	0.46	34	0.78	0.46	19	0.74	0.46	17	0.69	0.46	18	0.70	0.46	9	0.49	0.46	18	0.71
	0.19	0.18	16.7	0.24	0.18	1324.4	0.20	0.16	207.0	0.22	0.18	622.3	0.25	0.15	964.6	0.25	0.14	1060.2	0.39	0.22	1889.7	0.24	0.14	837.9
Lopes	106	8	7.1	28928	1120	1763.3	14186	201	428.2	20392	386	762.0	25632	713	1248.4	14585	209	444.5	28928	1120	1763.3	5370	60	123.5
	0.43	6	0.42	0.57	11	0.23	0.55	16	0.28	0.57	15	0.26	0.57	12	0.24	0.56	20	0.28	0.57	11	0.23	0.43	26	0.41
	0.31	0.24	21.2	0.32	0.25	1257.7	0.21	0.19	322.4	0.26	0.20	485.5	0.31	0.25	732.3	0.20	0.19	331.5	0.32	0.25	1257.7	0.23	0.17	141.3
Abdul	2354	10	15.0	52335	3246	4510.3	22336	706	1044.6	34157	1773	2477.8	44441	2527	3560.2	16060	303	470.2	32175	1600	2242.1	4901	24	37.0
	0.38	19	0.68	0.65	15	0.19	0.52	17	0.31	0.60	13	0.24	0.63	13	0.21	0.45	18	0.37	0.59	14	0.24	0.36	19	0.61
	0.25	0.16	102.3	0.41	0.21	951.5	0.26	0.24	698.0	0.25	0.24	509.8	0.35	0.22	389.8	0.28	0.25	446.1	0.25	0.24	527.5	0.21	0.19	175.0
Kobayashi	2168	4	3.6	32385	303	546.3	13045	25	41.1	20015	56	105.0	26014	107	206.1	26298	110	213.6	33297	1007	1427.9	30769	201	380.7
	0.31	28	0.82	0.41	18	0.34	0.27	29	0.53	0.30	23	0.46	0.34	23	0.41	0.34	22	0.40	0.48	8	0.27	0.38	21	0.36
	0.10	0.09	57.1	0.21	0.17	2944.1	0.20	0.13	109.6	0.19	0.19	171.1	0.18	0.16	292.3	0.18	0.15	226.7	0.34	0.18	5549.5	0.23	0.20	732.6
Postnikov	6845	29	68.4	44800	79	197.1	15662	34	91.9	30790	36	111.4	37931	41	126.3	44993	96	223.1	45101	960	896.2	45101	960	896.2
	0.54	40	0.48	0.48	12	0.52	0.52	28	0.50	0.52	24	0.52	0.51	25	0.53	0.47	10	0.51	0.37	3	0.39	0.37	3	0.39
	0.19	0.15	152.1	0.42	0.17	5600.0	0.22	0.18	127.3	0.21	0.14	311.0	0.17	0.13	972.6	0.37	0.25	6427.6	0.51	0.17	11275.2	0.51	0.17	11275.2
Ramsey	54675	2387	3782.0	54191	1051	2131.8	22713	626	1031.7	35320	742	1404.2	43166	767	1553.5	16757	395	638.9	54191	1051	2131.8	13084	241	390.5
	0.70	5	0.20	0.66	18	0.21	0.58	23	0.27	0.62	34	0.24	0.63	33	0.23	0.54	23	0.31	0.66	18	0.21	0.50	26	0.34
	0.67	0.17	18225.0	0.68	0.14	9031.8	0.33	0.27	172.1	0.52	0.18	353.2	0.50	0.17	553.4	0.27	0.26	174.6	0.68	0.14	9031.8	0.30	0.28	165.6
Satake	12403	24	66.2	53595	52	129.4	21734	25	74.0	32091	27	82.1	42580	31	92.1	54665	110	205.8	54675	1048	814.6	20499	25	72.9
	0.66	39	0.63	0.59	19	0.70	0.65	34	0.67	0.64	30	0.69	0.62	31	0.70	0.55	10	0.69	0.43	3	0.53	0.65	38	0.67
	0.22	0.08	206.7	0.13	0.13	3828.2	0.22	0.09	255.7	0.22	0.10	324.2	0.20	0.09	519.3	0.14	0.13	4969.5	0.16	0.14	5467.5	0.23	0.12	230.3
Baker	8924	960	879.9	9786	1123	1012.3	3462	410	426.7	7862	756	711.8	11535	1512	1298.5	2084	275	278.6	10922	1361	1193.2	3831	449	481.2
	0.77	22	0.50	0.79	24	0.50	0.68	17	0.31	0.74	24	0.50	0.82	17	0.50	0.67	12	0.23	0.81	22	0.50	0.68	30	0.29
	0.47	0.36	175.0	0.46	0.34	191.9	0.49	0.34	123.6	0.47	0.38	178.7	0.45	0.33	349.5	0.35	0.32	148.9	0.45	0.33	254.0	0.47	0.32	182.4
Baumbach	11322	2314	2494.3	18287	2004	2686.8	7610	2736	2210.1	11468	2294	2495.9	15300	1964	2544.3	7064	2794	2123.9	15356	1962	2545.4	15356	1962	2545.4
	0.99	24	0.02	0.96	14	0.08	0.99	33	0.01	0.99	24	0.02	0.98	18	0.04	0.99	35	0.01	0.98	18	0.04	0.98	18	0.04
	0.43	0.21	808.7	0.31	0.30	3047.8	0.52	0.11	380.5	0.42	0.21	955.7	0.34	0.27	1530.0	0.55	0.11	353.2	0.34	0.28	1535.6	0.34	0.28	1535.6
Chung	3425	88	92.1	11702	130	109.3	6745	107	95.5	7905	104	96.3	10634	112	99.0	11418	122	104.9	13577	1033	763.5	13575	577	468.5
	0.98	57	0.87	0.80	20	0.89	0.97	49	0.94	0.96	33	0.94	0.89	20	0.92	0.83	20	0.90	0.52	4	0.40	0.54	6	0.53
	0.20	0.09	142.7	0.17	0.16	417.9	0.22	0.06	249.8	0.27	0.07	304.0	0.25	0.12	393.9	0.29	0.12	346.0	0.19	0.19	1357.7	0.18	0.17	646.4
Kong	7382	458	577.4	6912	357	460.8	8107	798	920.2	11746	1680	1921.5	14814	1789	2264.8	6438	324	412.4	11380	1667	1877.6	7621	563	686.9
	0.61	34	0.28	0.58	38	0.31	0.67	26	0.22	0.81	28	0.10	0.86	22	0.08	0.57	41	0.32	0.80	29	0.11	0.63	30	0.26
	0.24	0.21	388.5	0.26	0.21	406.6	0.24	0.23	405.4	0.24	0.20	783.1	0.34	0.17	1139.5	0.27	0.22	306.6	0.20	0.19	711.2	0.24	0.21	401.1
Lundberg	85	6	5.9	18680	984	1233.3	7533	138	209.1	11310	399	513.5	15728	621	828.5	8670	205	287.2	18680	984	1233.3	11084	382	493.5
	0.56	9	0.46	0.57	9	0.29	0.56	13	0.47	0.53	16	0.40	0.55	12	0.34	0.55	21	0.45	0.57	9	0.29	0.53	17	0.40
	0.32	0.25	17.0	0.36	0.26	3736.0	0.23	0.22	342.4	0.28	0.25	418.9	0.25	0.25	1048.5	0.21	0.21	433.5	0.36	0.26	3736.0	0.29	0.24	481.9
Blalock	38	8	6.7	54152	92	198.1	24906	28	77.2	33214	33	91.1	41658	40	108.8	54331	100	209.2	54675	1048	903.5	54675	245	371.1
	0.57	4	0.19	0.38	11	0.61	0.42	19	0.66	0.41	22	0.66	0.40	20	0.65	0.38	11	0.61	0.31	3	0.42	0.36	6	0.55
	0.34	0.24	9.5	0.15	0.11	3610.1	0.15	0.12	191.6	0.16	0.11	281.5	0.13	0.10	344.3	0.18	0.11	3395.7	0.16	0.15	6075.0	0.25	0.13	4970.5
Paschaki	583	23	26.7	31465	149	266.7	14083	42	91.5	22071	68	140.6	28757	111	211.2	30089	127	235.9	35556	1008	1031.9	33897	215	353.4
	0.60	18	0.54	0.46	21	0.59	0.52	25	0.61	0.49	21	0.61	0.47	21	0.60	0.46	18	0.59	0.45	5	0.48	0.45	15	0.57
	0.25	0.23	36.4	0.31	0.14	533.3	0.21	0.21	260.8	0.27	0.20	315.3	0.30	0.21	364.0	0.31	0.15	518.8	0.30	0.17	5926.0	0.31	0.14	997.0
Ehlting	438	5	5.9	25175	221	387.6	10640	32	70.3	15956	54	119.4	20439	88	186.4	22382	114	232.6	25739	1015	1065.1	25346	243	414.8
	0.30	11	0.62	0.44	13	0.40	0.37	23	0.46	0.39	19	0.44	0.41	17	0.43	0.42	18	0.41	0.46	4	0.36	0.44	12	0.40
	0.15	0.13	29.2	0.32	0.20	2097.9	0.18	0.16	259.5	0.22	0.18	431.2	0.25	0.23	464.5	0.30	0.21	678.2	0.43	0.17	4289.8	0.36	0.22	2534.6
Fujitaa	23818	301	621.2	32165	437	870.3	18286	248	498.2	24211	306	631.0	35028	527	1005.4	12544	248	442.3	40877	1066	1609.9	6320	210	298.3
	0.69	52	0.38	0.70	30	0.40	0.68	79	0.38	0.69	48	0.38	0.71	28	0.41	0.67	53	0.38	0.72	16	0.46	0.66	31	0.41
	0.26	0.16	643.7	0.25	0.11	869.3	0.24	0.17	415.6	0.25	0.14	781.0	0.24	0.11	1167.6	0.25	0.13	432.6	0.23	0.18	3406.4	0.26	0.16	175.6
Fujitab	1229	166	170.8	46682	409	630.4	22490	241	415.1	33862	273	472.7	44900	374	590.9	22279	241	414.1	54874	1094	1453.9	12695	214	344.3
	0.76	21	0.24	0.63	15	0.74	0.77	24	0.73	0.74	22	0.76	0.65	16	0.76	0.77	24	0.72	0.50	11	0.59	0.78	28	0.67
	0.30	0.27	153.6	0.24	0.15	1729.0	0.19	0.17	255.6	0.17	0.16	1209.4	0.23	0.15	1726.9	0.19	0.17	244.8	0.25	0.19	4221.1	0.17	0.15	264.5
Nagpal	7002	11	13.1	21202	132	176.8	9739	18	22.2	14054	39	50.2	17706	68	91.9	20425	112	150.4	22810	1008	895.9	14921	44	58.2
	0.43	34	0.83	0.42	20	0.61	0.40	24	0.79	0.39	23	0.72	0.40	24	0.67	0.42	19	0.63	0.48	4	0.44	0.40	25	0.71
	0.14	0.13	189.2	0.18	0.14	706.7	0.12	0.12	304.3	0.17	0.13	319.4	0.17	0.12	402.4	0.16	0.13	583.6	0.24	0.20	4562.0	0.14	0.14	257.3
Wang	361	42	45.0	31957	1263	1518.0	24452	482	662.6	36189	1990	2260.4	49840	4475	4762.6	20579	297	444.5	34947	1778	2043.6	12929	120	220.7
	0.80	17	0.28	0.51	11	0.45	0.52	14	0.55	0.53	9	0.40	0.58	8	0.29	0.55	16	0.58	0.53	10	0.41	0.61	21	0.54
	0.38	0.31	72.2	0.28	0.28	2282.6	0.26	0.20	764.1	0.31	0.27	3015.8	0.38	0.24	7120.0	0.29	0.22	735.0	0.28	0.28	3883.0	0.27	0.24	323.2

N giant	Avg. degree	Std. degree
Clust. coef.	Diameter	Modularity
R1	R2	Comun. avg. size

Table S4 Pearson correlation values between the methods shown in Figure S8.

	T variation	T entropy	T comp 0.4	T comp 0.6	T comp 0.8	T deg. 100	T deg. 1000	T power-law
T variation	1	0.05	0.09	0.05	0.02	0.02	-0.03	0.14
T entropy	0.05	1	0.92	0.93	0.90	0.80	0.75	0.61
T comp 0.4	0.09	0.92	1	0.97	0.93	0.89	0.79	0.64
T comp 0.6	0.05	0.93	0.97	1	0.99	0.80	0.71	0.56
T comp 0.8	0.02	0.90	0.93	0.99	1	0.73	0.66	0.51
T deg. 100	0.02	0.80	0.89	0.80	0.73	1	0.95	0.83
T deg. 1000	-0.03	0.75	0.79	0.71	0.66	0.95	1	0.88
T power-law	0.14	0.61	0.64	0.56	0.51	0.83	0.88	1

Table S5 Alpha values ($\tilde{\alpha}$) for the methods shown in Figure S8.

	T variation	T entropy	T comp. 0.4	T comp. 0.6	T comp. 0.8	T deg. 100	T deg. 1000	T power-law
T variation	1.00	0.02	0.04	0.02	0.01	0.01	-0.01	0.04
T entropy	0.16	1.00	1.39	1.09	0.87	1.06	0.70	0.57
T comp. 0.4	0.19	0.60	1.00	0.75	0.60	0.77	0.48	0.39
T comp. 0.6	0.12	0.78	1.25	1.00	0.81	0.89	0.56	0.45
T comp. 0.8	0.06	0.93	1.47	1.20	1.00	0.99	0.63	0.50
T deg. 100	0.04	0.61	1.02	0.71	0.53	1.00	0.67	0.59
T deg. 1000	-0.10	0.81	1.29	0.90	0.69	1.34	1.00	0.88
T power-law	0.49	0.65	1.04	0.71	0.53	1.17	0.87	1.00

Table S6 Beta values ($\tilde{\beta}$) for the methods shown in Figure S8.

	T variation	T entropy	T comp. 0.4	T comp. 0.6	T comp. 0.8	T deg. 100	T deg. 1000	T power-law
T variation	0.00	0.94	0.91	0.93	0.94	0.94	0.95	0.91
T entropy	0.64	0.00	-0.45	-0.13	0.09	-0.11	0.30	0.31
T comp. 0.4	0.71	0.41	0.00	0.25	0.41	0.23	0.55	0.56
T comp. 0.6	0.73	0.22	-0.27	0.00	0.19	0.08	0.45	0.47
T comp. 0.8	0.75	0.07	-0.50	-0.21	-0.00	-0.04	0.35	0.39
T deg. 100	0.82	0.38	-0.05	0.25	0.43	0.00	0.38	0.36
T deg. 1000	0.80	0.07	-0.44	-0.06	0.16	-0.44	-0.00	-0.03
T power-law	0.38	0.32	-0.09	0.23	0.41	-0.17	0.22	0.00

Table S7 Chosen thresholds by the different criteria for each experiment.

	T variation	T entropy	T comp. 0.4	T comp. 0.6	T comp. 0.8	T deg. 100	T deg. 1000	T power-law
Pardo	0.974	0.974	0.995	0.990	0.990	0.949	0.808	0.995
Reppe	0.892	0.590	0.711	0.616	0.521	0.677	0.475	0.557
Zhang	0.974	0.813	0.911	0.869	0.827	0.828	0.667	0.839
Lopes	0.923	0.535	0.711	0.648	0.584	0.707	0.535	0.801
Abdul	0.974	0.667	0.869	0.784	0.721	0.909	0.798	0.964
Kobayashi	0.974	0.857	0.942	0.921	0.900	0.899	0.788	0.875
Postnikov	0.903	0.779	0.869	0.837	0.821	0.768	0.606	0.606
Ramsey	0.800	0.879	0.942	0.921	0.911	0.960	0.879	0.971
Satake	0.964	0.909	0.953	0.942	0.932	0.879	0.737	0.954
Baker	0.933	0.920	0.963	0.948	0.884	0.980	0.899	0.960
Baumbach	0.933	0.830	0.984	0.932	0.890	0.990	0.889	0.889
Chung	0.944	0.838	0.932	0.916	0.869	0.848	0.525	0.624
Kong	0.974	0.978	0.963	0.916	0.884	0.980	0.919	0.971
Lundberg	0.974	0.545	0.811	0.706	0.627	0.778	0.545	0.711
Blalock	0.964	0.662	0.763	0.742	0.721	0.657	0.495	0.600
Paschaki	0.974	0.818	0.900	0.869	0.837	0.828	0.677	0.794
Ehlting	0.954	0.742	0.869	0.837	0.806	0.788	0.616	0.736
Fujitaa	0.964	0.943	0.974	0.963	0.932	0.980	0.879	0.989
Fujitab	0.974	0.755	0.848	0.806	0.763	0.848	0.687	0.898
Nagpal	0.964	0.880	0.953	0.932	0.911	0.889	0.737	0.927
Wang	0.974	0.703	0.784	0.653	0.521	0.818	0.667	0.874

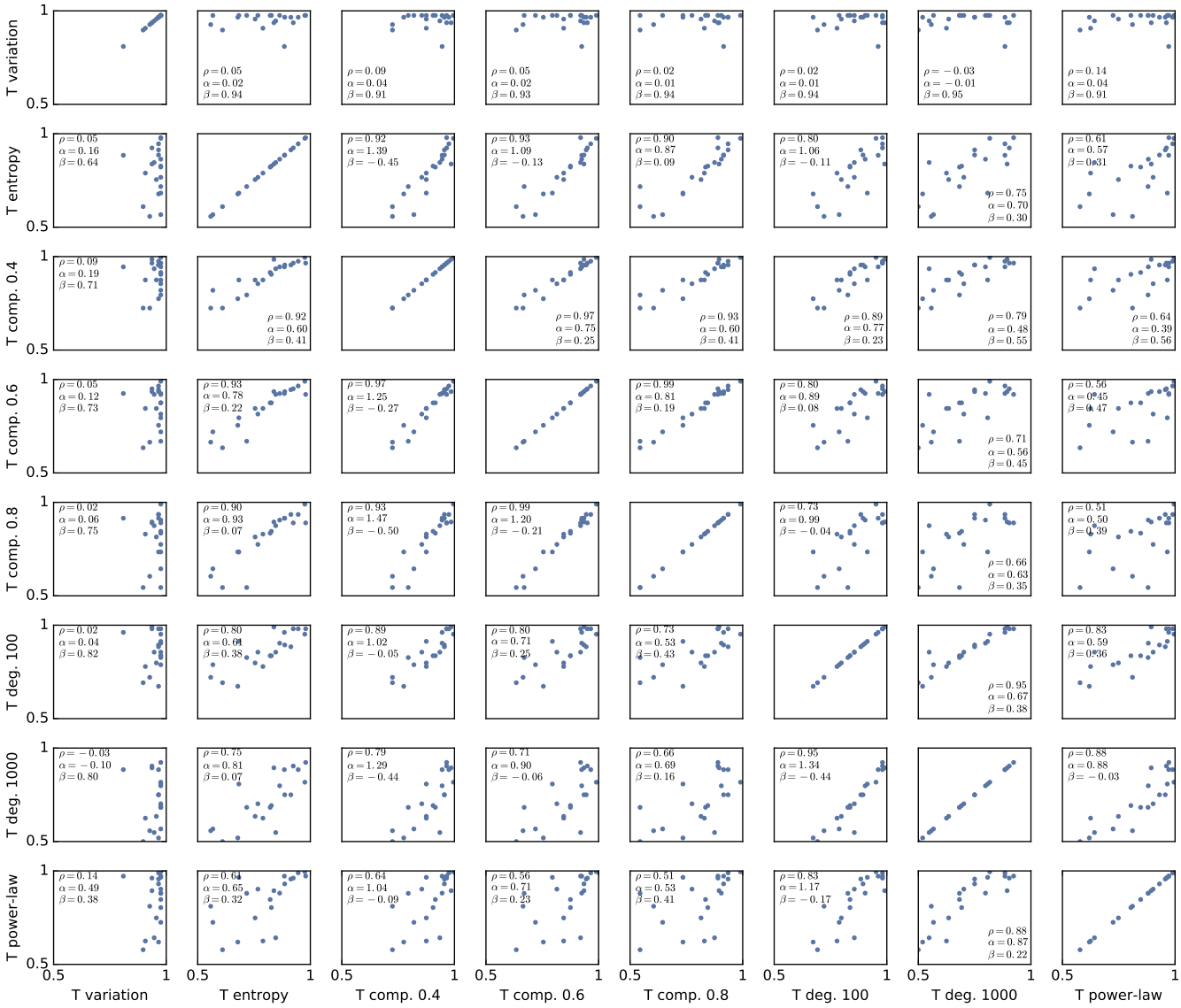

Fig. S8 Scatter plots between the threshold values chosen by different criteria. Each point corresponds to a dataset. Please refer to the main text for the meaning of the axes names. ρ indicates the Pearson correlation coefficient between the plotted values, α indicates the angular coefficient, and β the linear coefficient of a straight line least squares fit of the data.

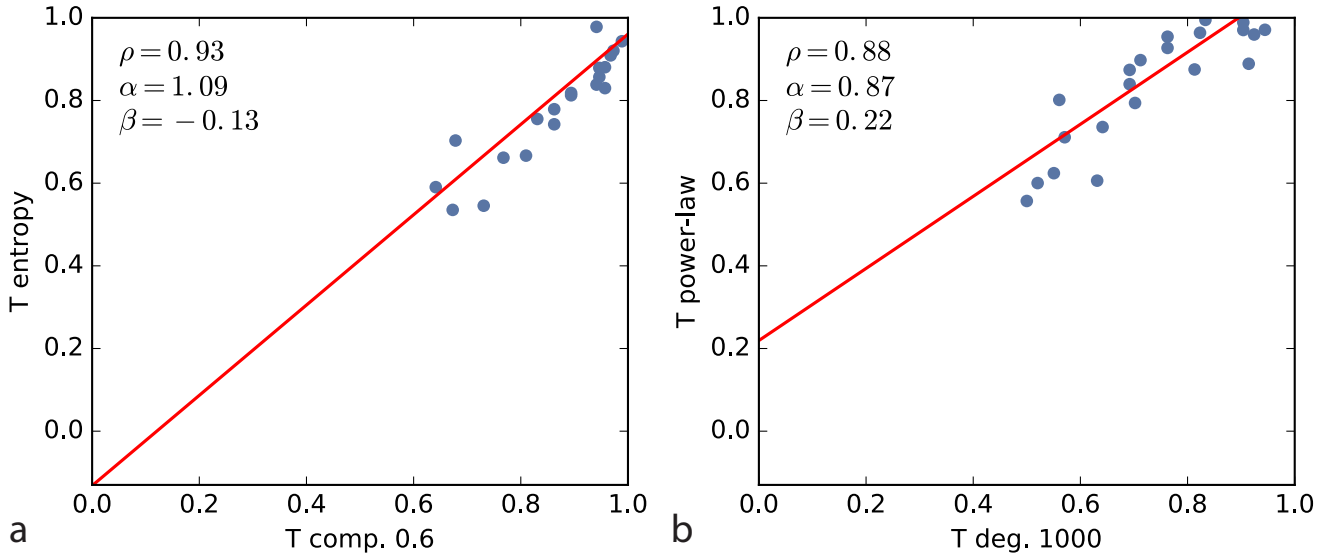

Fig. S9 Correlation between criteria: entropy versus component 60% (a), and power-law versus average degree 1000 (b). ρ corresponds to the Pearson correlation coefficient, α to the angular coefficient and β to the linear coefficient. The red line indicates the best straight line fit using least squares.

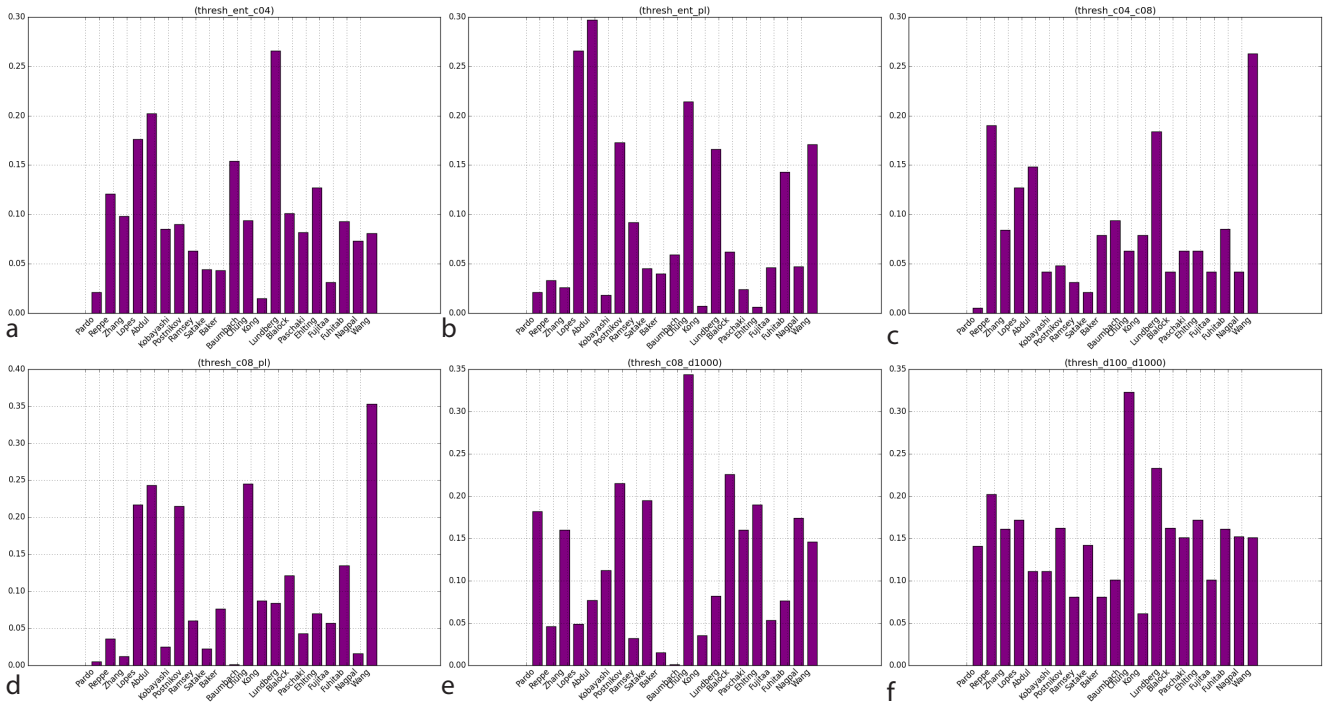

Fig. S10 Difference between the threshold values chosen by two criteria. This comparison considered the criteria that had the largest divergences in Figure 9. (a) entropy X component 40%, (b) entropy X power-law, (c) component 40% X component 80%, (d) component 80% X power-law, (e) component 80% X average degree 1000, (f) average degree 1000 X average degree 100.