

I. COMPLETE TOPOLOGY

A. High Load

	lambda	gamma
LASSO	0.48	0.01
SCAD	0.61	3.70
MCP	1.00	2.00
ATAN	65.94	0.01
SELO	65.94	0.01

TABLE I: Stage 1 Parameters: Complete topology, high load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.92	0.97	0.86	1.00	1.00	10235.29
SCAD	1.00	1.00	1.00	1.00	0.00	7474.09
MCP	1.00	1.00	1.00	1.00	0.00	7471.31
ATAN	1.00	1.00	1.00	1.00	0.00	7305.28
SELO	1.00	1.00	1.00	1.00	0.00	7505.18

TABLE II: Stage 1 Metrics: Complete topology, high load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE III: Stage 2 Metrics: Complete topology, high load, and selected using F_β -score with $\beta = 2$.

	lambda	gamma
LASSO	0.00	0.01
SCAD	0.04	3.70
MCP	0.06	2.00
ATAN	0.02	0.01
SELO	0.02	0.01

TABLE IV: Stage 1 Parameters: Complete topology, high load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.46	0.68	0.30	1.00	14.00	5460.47
SCAD	0.50	0.71	0.33	1.00	12.00	5431.37
MCP	0.50	0.71	0.33	1.00	12.00	5431.29
ATAN	0.50	0.71	0.33	1.00	12.00	5431.83
SELO	0.50	0.71	0.33	1.00	12.00	5431.85

TABLE V: Stage 1 Metrics: Complete topology, high load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE VI: Stage 2 Metrics: Complete topology, high load, and selected using EBIC.

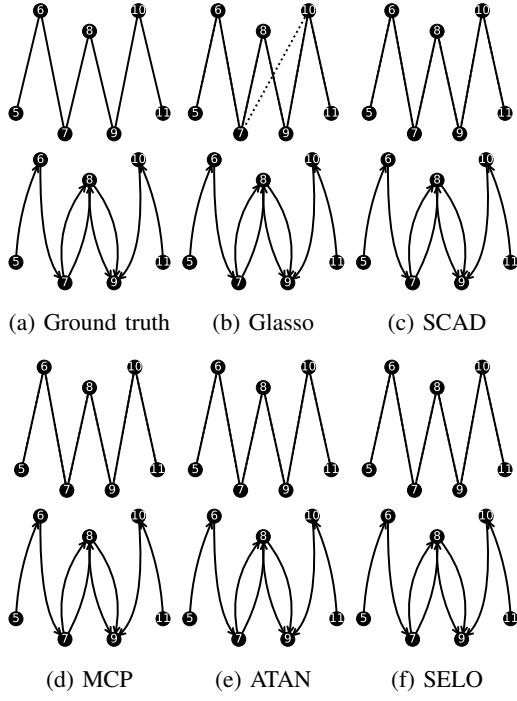


Fig. 1: Complete topology, high load, selected using F_β -score with $\beta = 2$

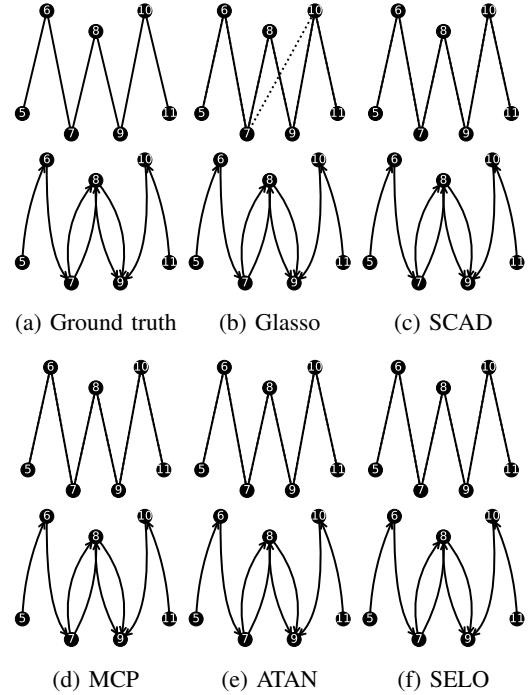


Fig. 3: Complete topology, high load, selected using recall

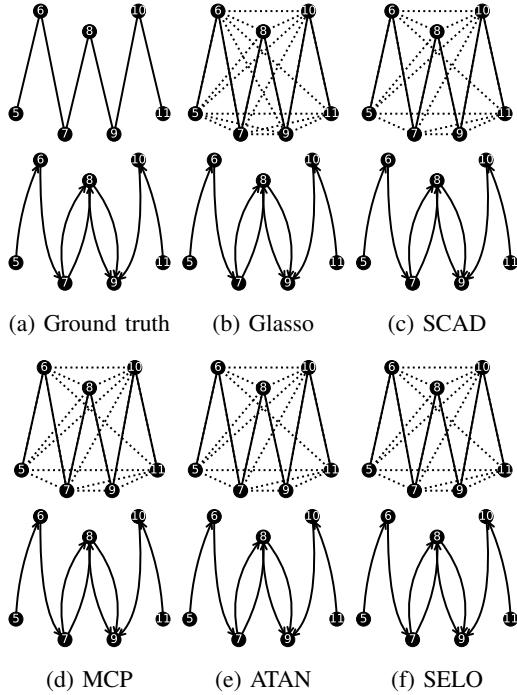


Fig. 2: Complete topology, high load, selected using EBIC

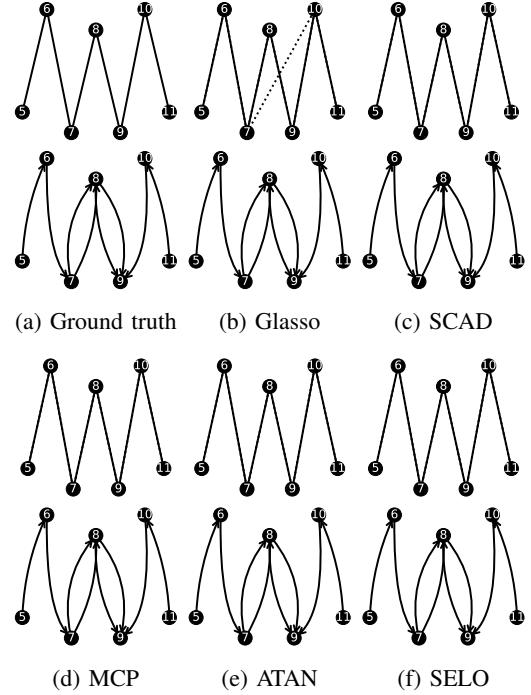


Fig. 4: Complete topology, high load, selected using f-score

B. Medium Load

	lambda	gamma
LASSO	0.42	0.01
SCAD	0.33	3.70
MCP	0.42	2.00
ATAN	9.17	0.01
SELO	8.11	0.01

TABLE VII: Stage 1 Parameters: Complete topology, medium load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.80	0.91	0.67	1.00	3.00	9181.34
SCAD	0.86	0.94	0.75	1.00	2.00	5159.89
MCP	0.80	0.91	0.67	1.00	3.00	4810.91
ATAN	0.80	0.91	0.67	1.00	3.00	5003.25
SELO	0.80	0.91	0.67	1.00	3.00	4981.20

TABLE VIII: Stage 1 Metrics: Complete topology, medium load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE IX: Stage 2 Metrics: Complete topology, medium load, and selected using F_β -score with $\beta = 2$.

	lambda	gamma
LASSO	0.00	0.01
SCAD	0.10	3.70
MCP	0.18	2.00
ATAN	0.18	0.01
SELO	0.16	0.01

TABLE X: Stage 1 Parameters: Complete topology, medium load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.46	0.68	0.30	1.00	14.00	4486.63
SCAD	0.67	0.83	0.50	1.00	6.00	4438.74
MCP	0.67	0.83	0.50	1.00	6.00	4438.74
ATAN	0.63	0.81	0.46	1.00	7.00	4443.47
SELO	0.63	0.81	0.46	1.00	7.00	4442.88

TABLE XI: Stage 1 Metrics: Complete topology, medium load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE XII: Stage 2 Metrics: Complete topology, medium load, and selected using EBIC.

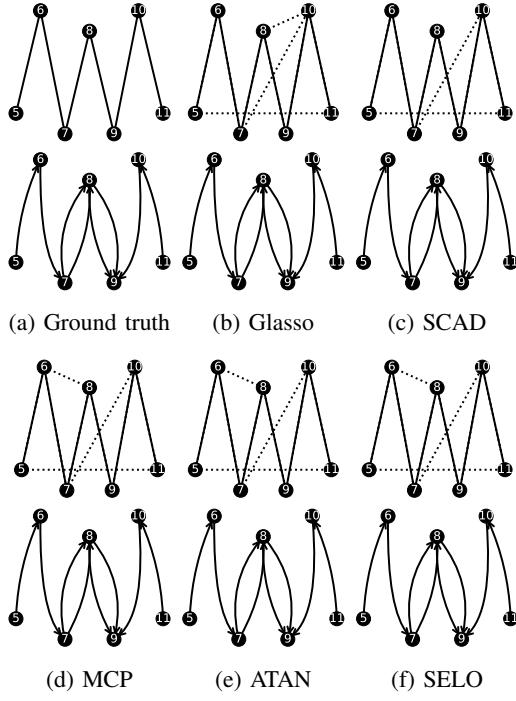


Fig. 5: Complete topology, medium load, selected using F_β -score with $\beta = 2$

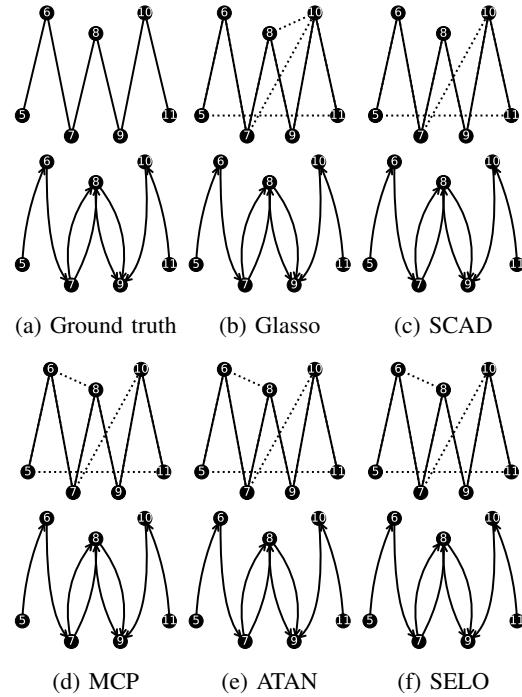


Fig. 7: Complete topology, medium load, selected using recall

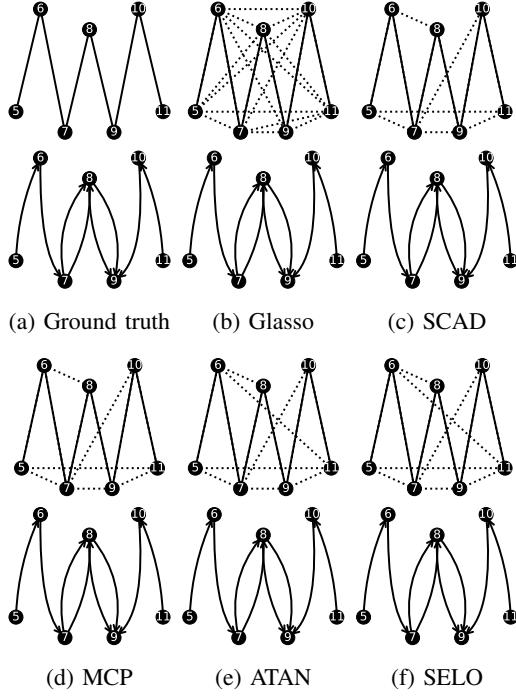


Fig. 6: Complete topology, medium load, selected using EBIC

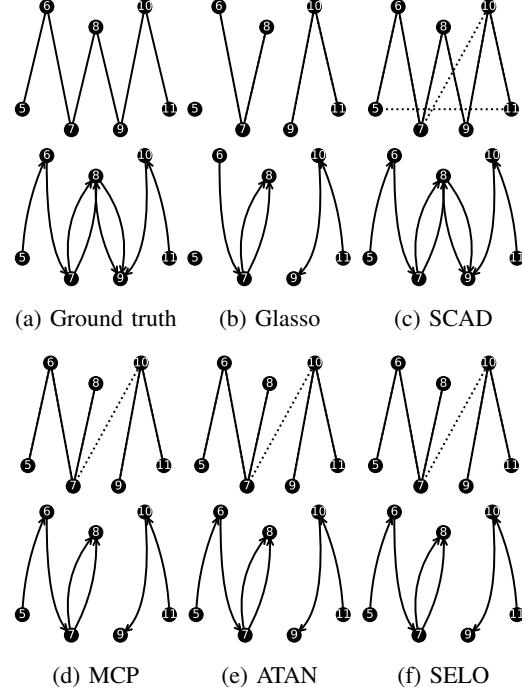


Fig. 8: Complete topology, medium load, selected using f-score

C. Low Load

	lambda	gamma
LASSO	0.42	0.01
SCAD	0.54	3.70
MCP	0.88	2.00
ATAN	35.59	0.01
SELO	31.47	0.01

TABLE XIII: Stage 1 Parameters: Complete topology, low load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.67	0.76	0.56	0.83	5.00	8964.55
SCAD	0.83	0.83	0.83	0.83	2.00	5898.26
MCP	0.91	0.86	1.00	0.83	1.00	6072.38
ATAN	0.83	0.83	0.83	0.83	2.00	5777.96
SELO	0.83	0.83	0.83	0.83	2.00	5713.06

TABLE XIV: Stage 1 Metrics: Complete topology, low load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd
LASSO	0.86	0.79	1.00	0.75	1
SCAD	0.86	0.79	1.00	0.75	1
MCP	0.86	0.79	1.00	0.75	1
ATAN	0.86	0.79	1.00	0.75	1
SELO	0.86	0.79	1.00	0.75	1

TABLE XV: Stage 2 Metrics: Complete topology, low load, and selected using F_β -score with $\beta = 2$.

	lambda	gamma
LASSO	0.00	0.01
SCAD	0.07	3.70
MCP	0.12	2.00
ATAN	0.11	0.01
SELO	0.11	0.01

TABLE XVI: Stage 1 Parameters: Complete topology, low load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.52	0.73	0.35	1.00	11.00	3910.25
SCAD	0.56	0.69	0.42	0.83	8.00	3874.59
MCP	0.56	0.69	0.42	0.83	8.00	3874.59
ATAN	0.56	0.69	0.42	0.83	8.00	3875.12
SELO	0.56	0.69	0.42	0.83	8.00	3875.21

TABLE XVII: Stage 1 Metrics: Complete topology, low load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	0.86	0.79	1.00	0.75	1
MCP	0.86	0.79	1.00	0.75	1
ATAN	0.86	0.79	1.00	0.75	1
SELO	0.86	0.79	1.00	0.75	1

TABLE XVIII: Stage 2 Metrics: Complete topology, low load, and selected using EBIC.

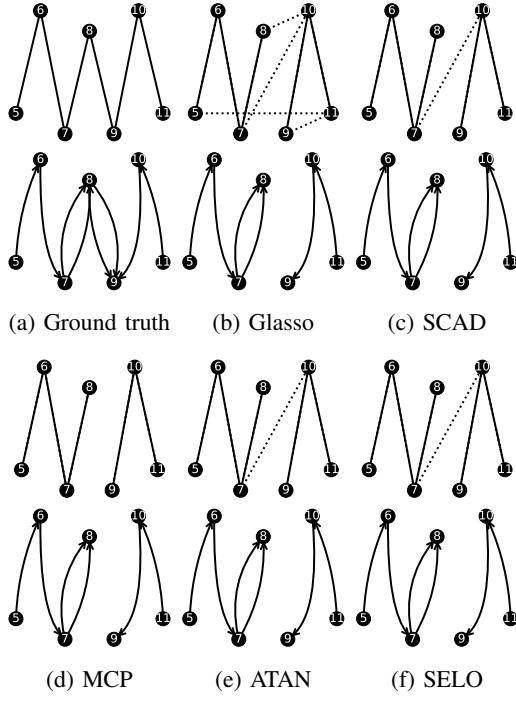


Fig. 9: Complete topology, low load, selected using F_β -score with $\beta = 2$

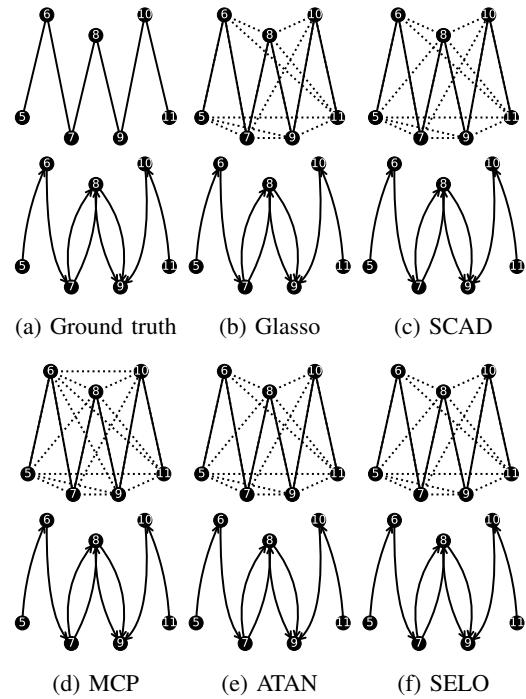


Fig. 11: Complete topology, low load, selected using recall

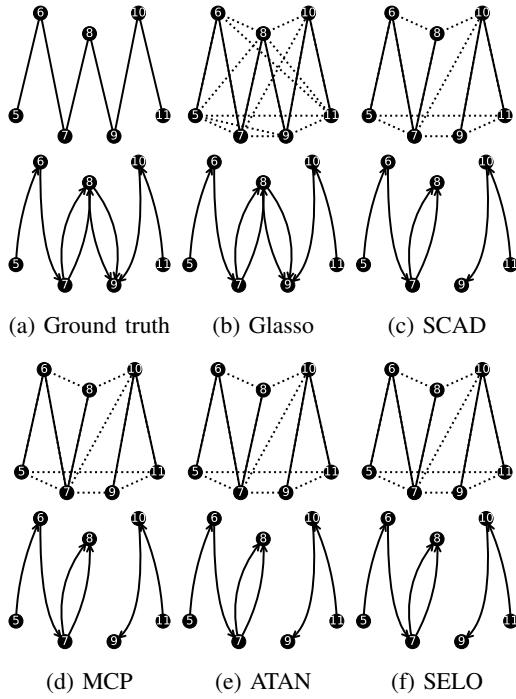


Fig. 10: Complete topology, low load, selected using EBIC

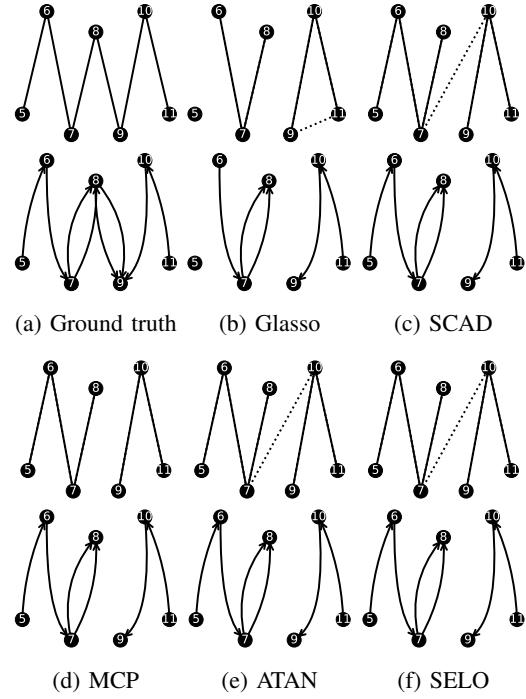


Fig. 12: Complete topology, low load, selected using f-score

D. All Loads

	lambda	gamma
LASSO	0.29	0.01
SCAD	0.29	3.70
MCP	0.42	2.00
ATAN	2.67	0.01
SELO	2.67	0.01

TABLE XIX: Stage 1 Parameters: Complete topology, all loads, and selected using F_β -score with $\beta = 2$.

	lambda	gamma
LASSO	0.01	0.01
SCAD	0.02	3.70
MCP	0.04	2.00
ATAN	0.00	0.01
SELO	0.01	0.01

TABLE XXII: Stage 1 Parameters: Complete topology, all loads, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.92	0.97	0.86	1.00	1.00	32116.39
SCAD	0.92	0.97	0.86	1.00	1.00	29521.20
MCP	0.92	0.97	0.86	1.00	1.00	29274.20
ATAN	1.00	1.00	1.00	1.00	0.00	28930.10
SELO	1.00	1.00	1.00	1.00	0.00	28999.48

TABLE XX: Stage 1 Metrics: Complete topology, all loads, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.52	0.73	0.35	1.00	11.00	27718.92
SCAD	0.60	0.79	0.43	1.00	8.00	27666.31
MCP	0.60	0.79	0.43	1.00	8.00	27666.09
ATAN	0.60	0.79	0.43	1.00	8.00	27666.51
SELO	0.60	0.79	0.43	1.00	8.00	27666.75

TABLE XXIII: Stage 1 Metrics: Complete topology, all loads, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE XXI: Stage 2 Metrics: Complete topology, all loads, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE XXIV: Stage 2 Metrics: Complete topology, all loads, and selected using EBIC.

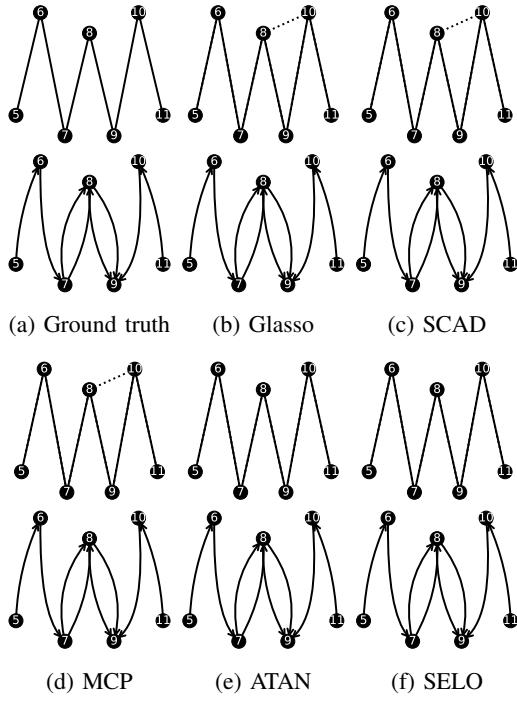


Fig. 13: Complete topology, all loads, selected using F_β -score with $\beta = 2$

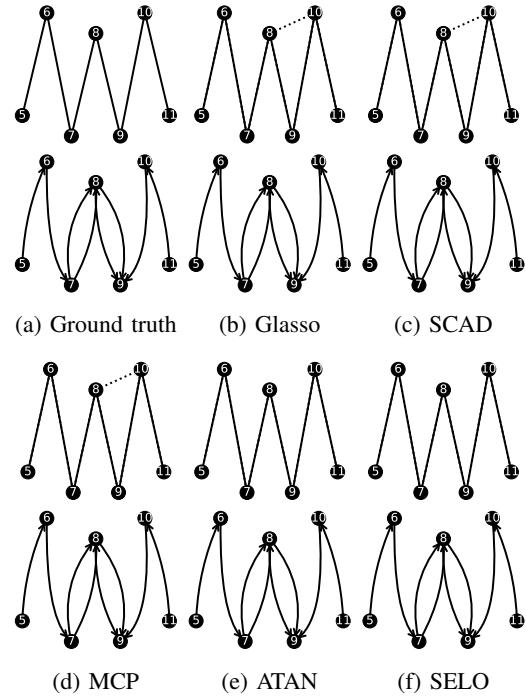


Fig. 15: Complete topology, all loads, selected using recall

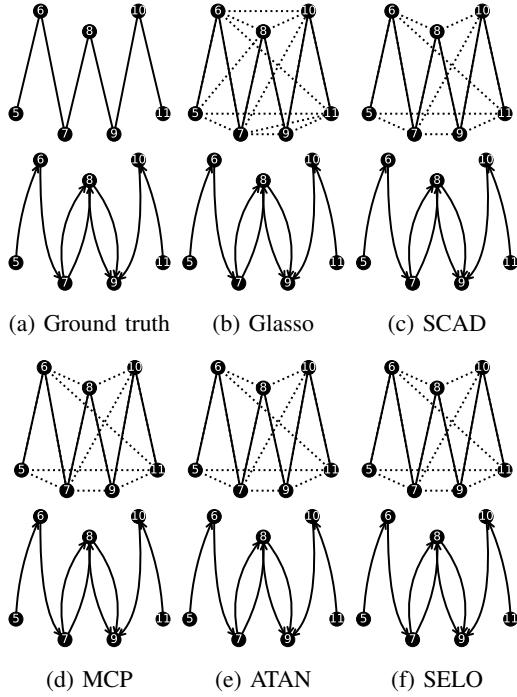


Fig. 14: Complete topology, all loads, selected using EBIC

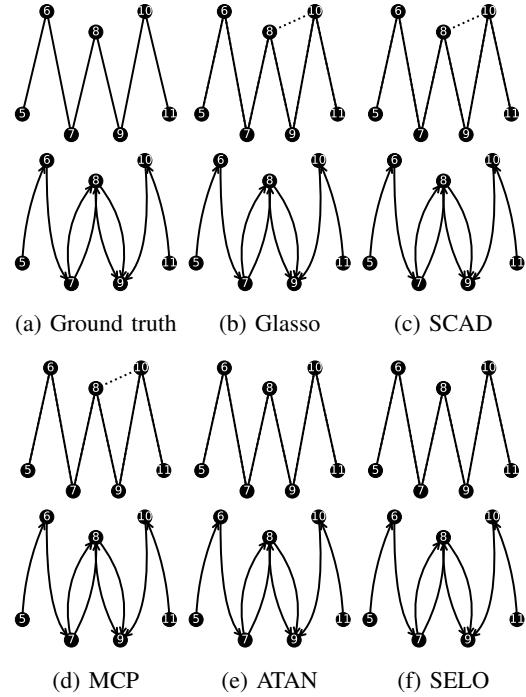


Fig. 16: Complete topology, all loads, selected using f-score

II. PARTIAL-LEFT TOPOLOGY

A. High Load

	lambda	gamma
LASSO	0.42	0.01
SCAD	0.48	3.70
MCP	0.78	2.00
ATAN	35.59	0.01
SELO	31.47	0.01

TABLE XXV: Stage 1 Parameters: Partial-Left topology, high load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.86	0.94	0.75	1.00	2.00	9071.29
SCAD	0.92	0.97	0.86	1.00	1.00	5546.43
MCP	0.92	0.97	0.86	1.00	1.00	5436.10
ATAN	1.00	1.00	1.00	1.00	0.00	5635.40
SELO	1.00	1.00	1.00	1.00	0.00	5603.90

TABLE XXVI: Stage 1 Metrics: Partial-Left topology, high load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE XXVII: Stage 2 Metrics: Partial-Left topology, high load, and selected using F_β -score with $\beta = 2$.

	lambda	gamma
LASSO	0.00	0.01
SCAD	0.10	3.70
MCP	0.18	2.00
ATAN	0.08	0.01
SELO	0.08	0.01

TABLE XXVIII: Stage 1 Parameters: Partial-Left topology, high load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.46	0.68	0.30	1.00	14.00	4209.91
SCAD	0.63	0.81	0.46	1.00	7.00	4170.15
MCP	0.63	0.81	0.46	1.00	7.00	4170.15
ATAN	0.60	0.79	0.43	1.00	8.00	4171.98
SELO	0.60	0.79	0.43	1.00	8.00	4172.09

TABLE XXIX: Stage 1 Metrics: Partial-Left topology, high load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE XXX: Stage 2 Metrics: Partial-Left topology, high load, and selected using EBIC.

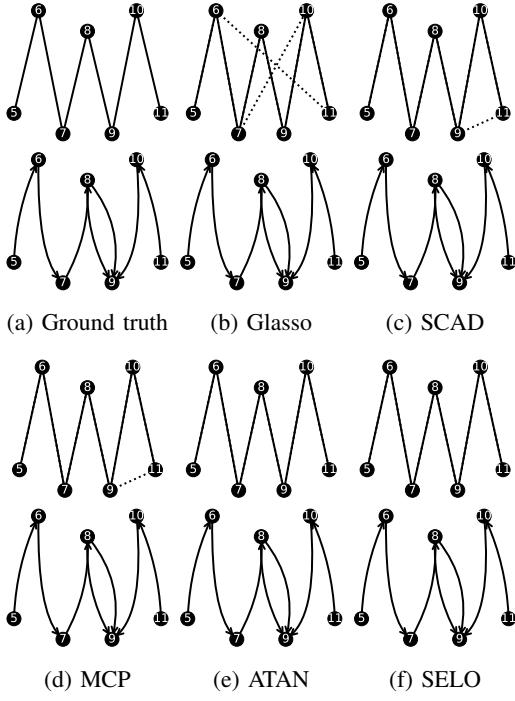


Fig. 17: Partial-Left topology, high load, selected using F_β -score with $\beta = 2$

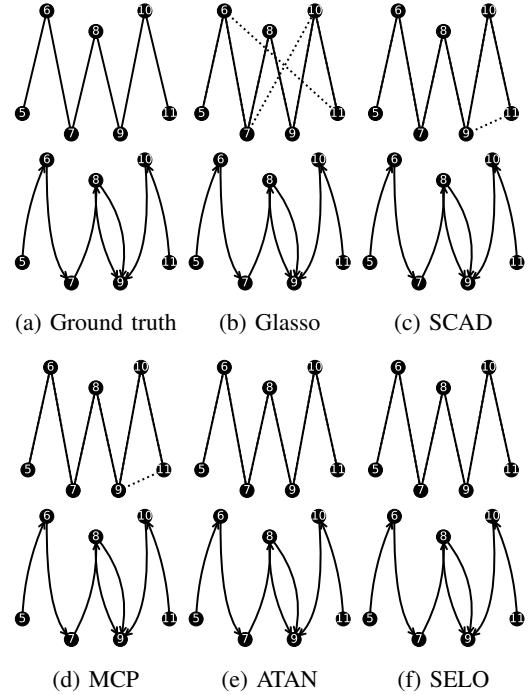


Fig. 19: Partial-Left topology, high load, selected using recall

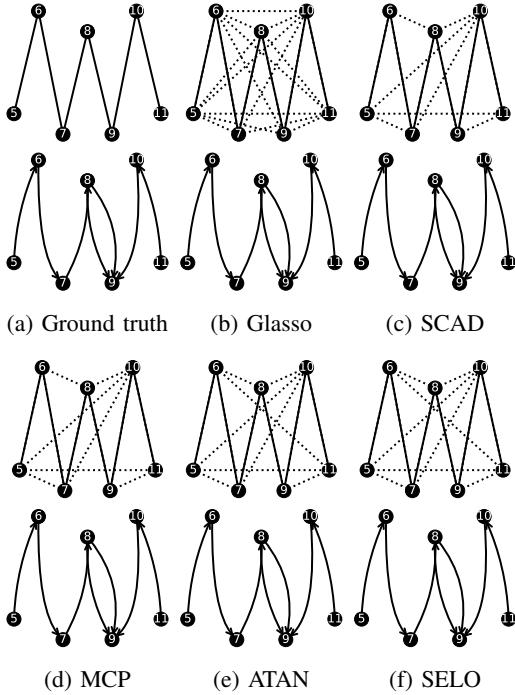


Fig. 18: Partial-Left topology, high load, selected using EBIC

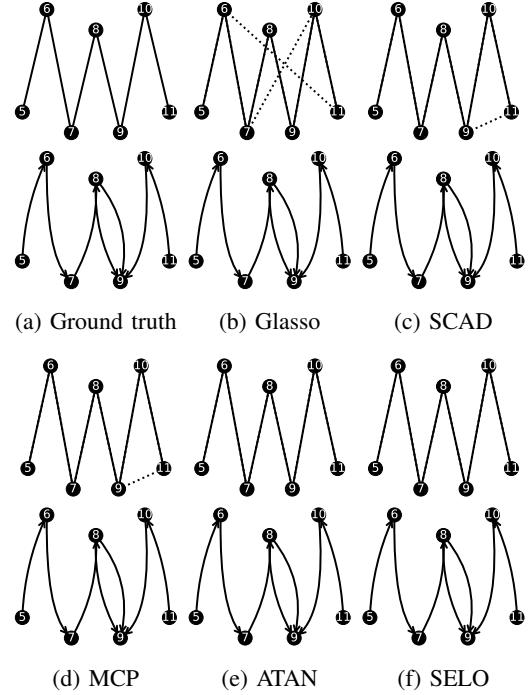


Fig. 20: Partial-Left topology, high load, selected using f-score

B. Medium Load

	lambda	gamma
LASSO	0.37	0.01
SCAD	0.48	3.70
MCP	0.78	2.00
ATAN	35.59	0.01
SELO	31.47	0.01

TABLE XXXI: Stage 1 Parameters: Partial-Left topology, medium load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.80	0.91	0.67	1.00	3.00	8119.40
SCAD	0.86	0.94	0.75	1.00	2.00	4355.57
MCP	0.92	0.97	0.86	1.00	1.00	4433.56
ATAN	0.92	0.97	0.86	1.00	1.00	4598.58
SELO	0.92	0.97	0.86	1.00	1.00	4559.94

TABLE XXXII: Stage 1 Metrics: Partial-Left topology, medium load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE XXXIII: Stage 2 Metrics: Partial-Left topology, medium load, and selected using F_β -score with $\beta = 2$.

	lambda	gamma
LASSO	0.00	0.01
SCAD	0.07	3.70
MCP	0.16	2.00
ATAN	0.14	0.01
SELO	0.14	0.01

TABLE XXXIV: Stage 1 Parameters: Partial-Left topology, medium load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.44	0.67	0.29	1.00	15.00	3283.40
SCAD	0.63	0.81	0.46	1.00	7.00	3229.18
MCP	0.63	0.81	0.46	1.00	7.00	3229.18
ATAN	0.63	0.81	0.46	1.00	7.00	3230.15
SELO	0.63	0.81	0.46	1.00	7.00	3230.33

TABLE XXXV: Stage 1 Metrics: Partial-Left topology, medium load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE XXXVI: Stage 2 Metrics: Partial-Left topology, medium load, and selected using EBIC.

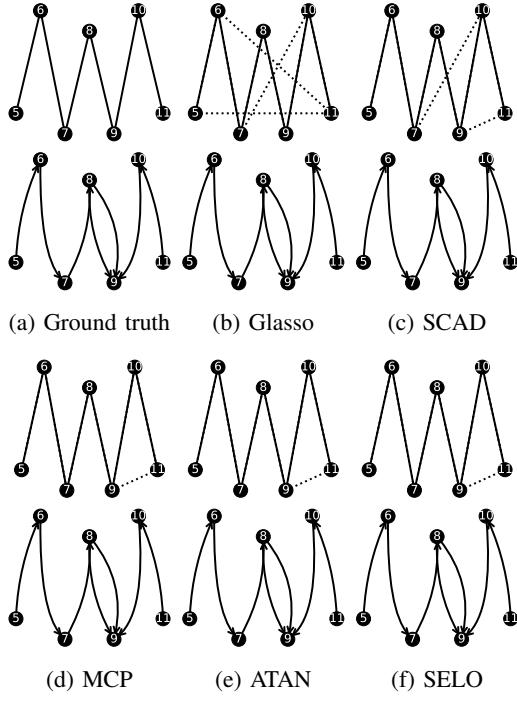


Fig. 21: Partial-Left topology, medium load, selected using F_β -score with $\beta = 2$

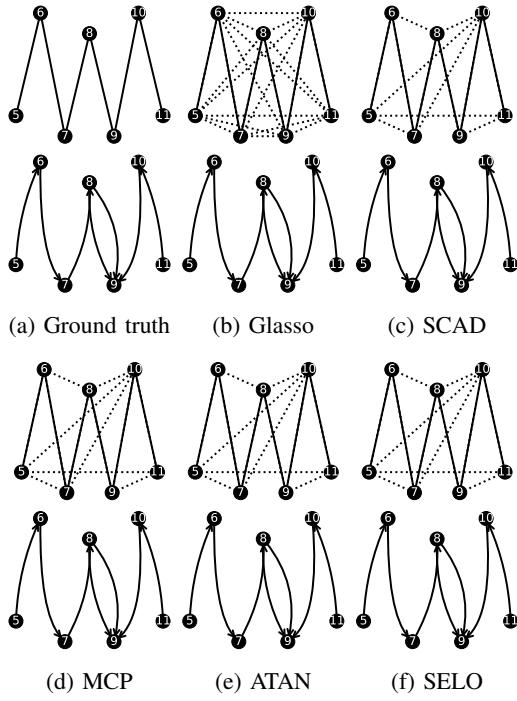


Fig. 22: Partial-Left topology, medium load, selected using EBIC

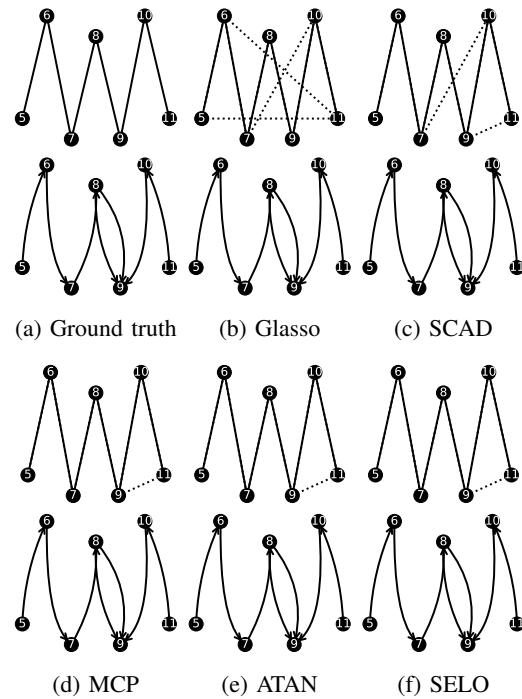


Fig. 23: Partial-Left topology, medium load, selected using recall

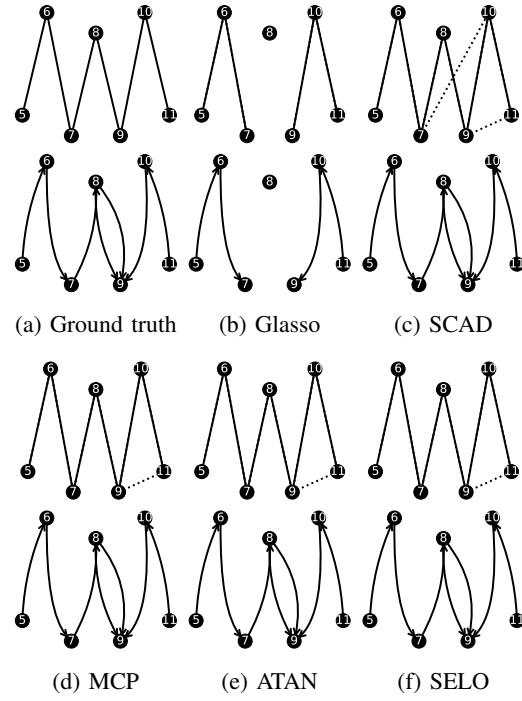


Fig. 24: Partial-Left topology, medium load, selected using f-score

C. Low Load

	lambda	gamma
LASSO	0.16	0.01
SCAD	0.37	3.70
MCP	0.54	2.00
ATAN	15.02	0.01
SELO	13.27	0.01

TABLE XXXVII: Stage 1 Parameters: Partial-Left topology, low load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.80	0.91	0.67	1.00	3.00	4339.56
SCAD	0.75	0.88	0.60	1.00	4.00	1981.35
MCP	0.75	0.88	0.60	1.00	4.00	1776.09
ATAN	0.80	0.91	0.67	1.00	3.00	1976.19
SELO	0.75	0.88	0.60	1.00	4.00	1964.18

TABLE XXXVIII: Stage 1 Metrics: Partial-Left topology, low load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE XXXIX: Stage 2 Metrics: Partial-Left topology, low load, and selected using F_β -score with $\beta = 2$.

	lambda	gamma
LASSO	0.00	0.01
SCAD	0.10	3.70
MCP	0.18	2.00
ATAN	0.54	0.01
SELO	0.48	0.01

TABLE XL: Stage 1 Parameters: Partial-Left topology, low load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.44	0.67	0.29	1.00	15.00	1525.53
SCAD	0.60	0.79	0.43	1.00	8.00	1468.58
MCP	0.60	0.79	0.43	1.00	8.00	1468.58
ATAN	0.67	0.83	0.50	1.00	6.00	1476.13
SELO	0.67	0.83	0.50	1.00	6.00	1475.61

TABLE XLI: Stage 1 Metrics: Partial-Left topology, low load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE XLII: Stage 2 Metrics: Partial-Left topology, low load, and selected using EBIC.

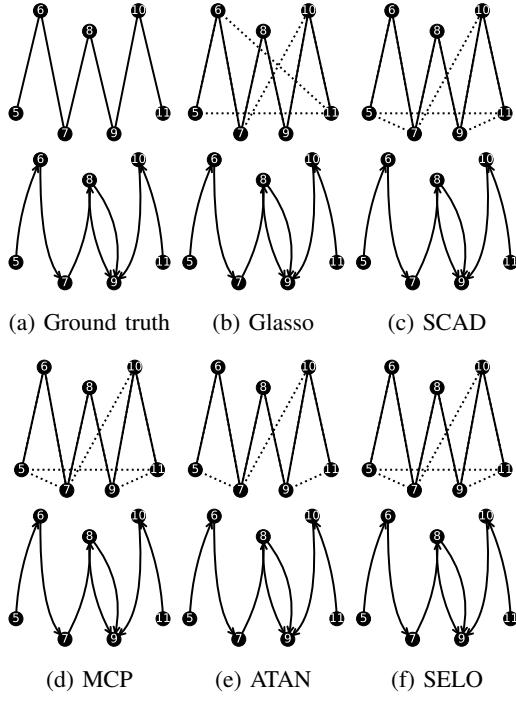


Fig. 25: Partial-Left topology, low load, selected using F_β -score with $\beta = 2$

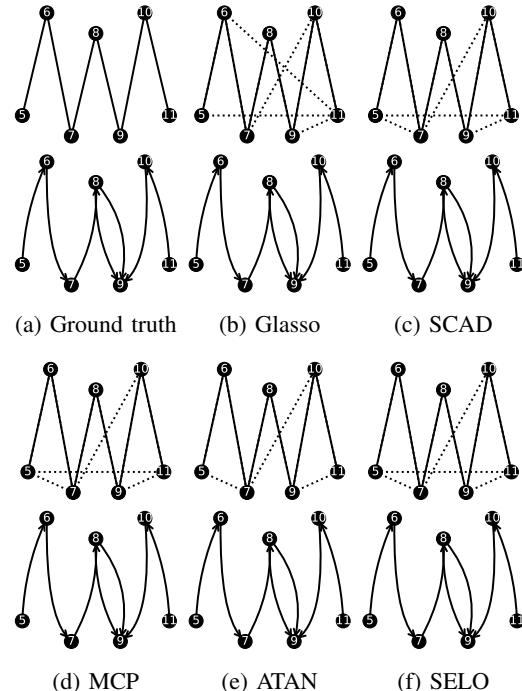


Fig. 27: Partial-Left topology, low load, selected using recall

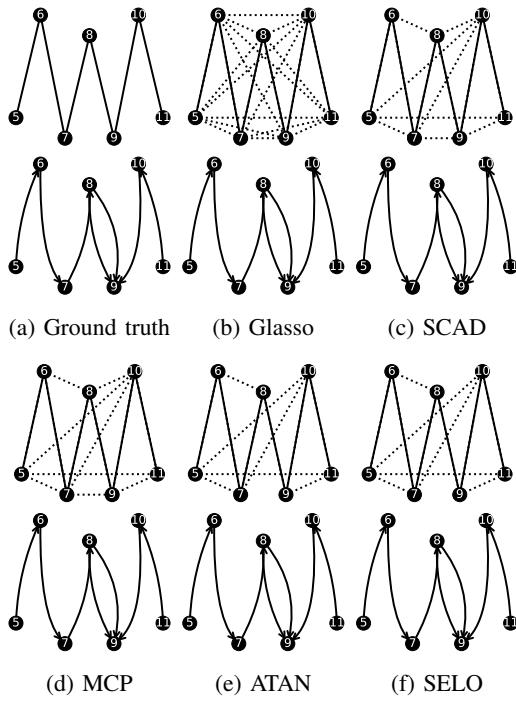


Fig. 26: Partial-Left topology, low load, selected using EBIC

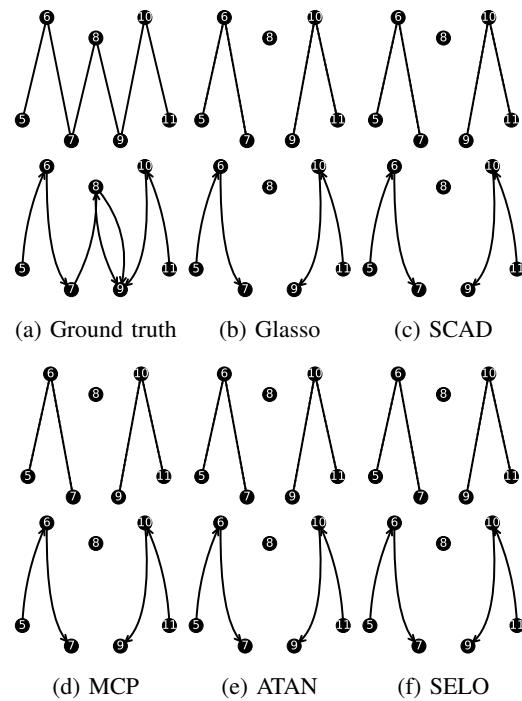


Fig. 28: Partial-Left topology, low load, selected using f-score

D. All Load

	lambda	gamma
LASSO	0.23	0.01
SCAD	0.23	3.70
MCP	0.33	2.00
ATAN	1.85	0.01
SELO	1.85	0.01

TABLE XLIII: Stage 1 Parameters: Partial-Left topology, all loads, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	1.00	1.00	1.00	1.00	0.00	29384.69
SCAD	1.00	1.00	1.00	1.00	0.00	26874.49
MCP	1.00	1.00	1.00	1.00	0.00	26799.29
ATAN	1.00	1.00	1.00	1.00	0.00	26774.31
SELO	1.00	1.00	1.00	1.00	0.00	26821.58

TABLE XLIV: Stage 1 Metrics: Partial-Left topology, all loads, and selected using F_β -score with $\beta = 2$.

	lambda	gamma
LASSO	0.00	0.01
SCAD	0.03	3.70
MCP	0.05	2.00
ATAN	0.01	0.01
SELO	0.01	0.01

TABLE XLVI: Stage 1 Parameters: Partial-Left topology, all loads, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.52	0.73	0.35	1.00	11.00	25839.98
SCAD	0.71	0.86	0.55	1.00	5.00	25769.50
MCP	0.71	0.86	0.55	1.00	5.00	25769.16
ATAN	0.71	0.86	0.55	1.00	5.00	25769.45
SELO	0.71	0.86	0.55	1.00	5.00	25769.53

TABLE XLVII: Stage 1 Metrics: Partial-Left topology, all loads, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE XLV: Stage 2 Metrics: Partial-Left topology, all loads, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE XLVIII: Stage 2 Metrics: Partial-Left topology, all loads, and selected using EBIC.

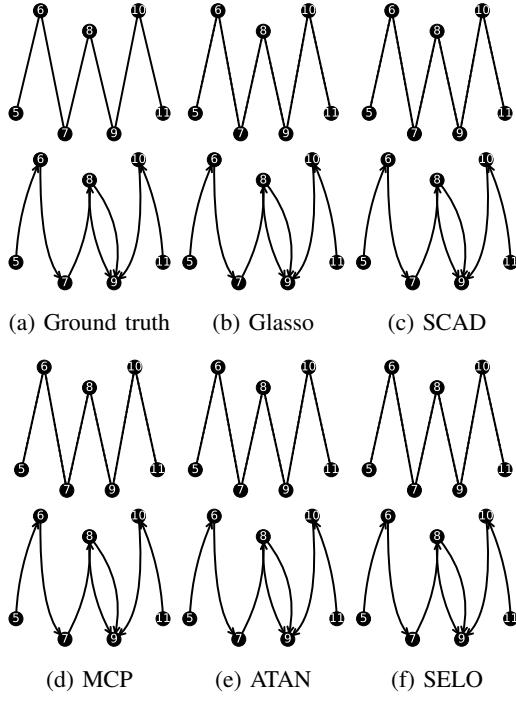


Fig. 29: Partial-Left topology, all loads, selected using F_β -score with $\beta = 2$

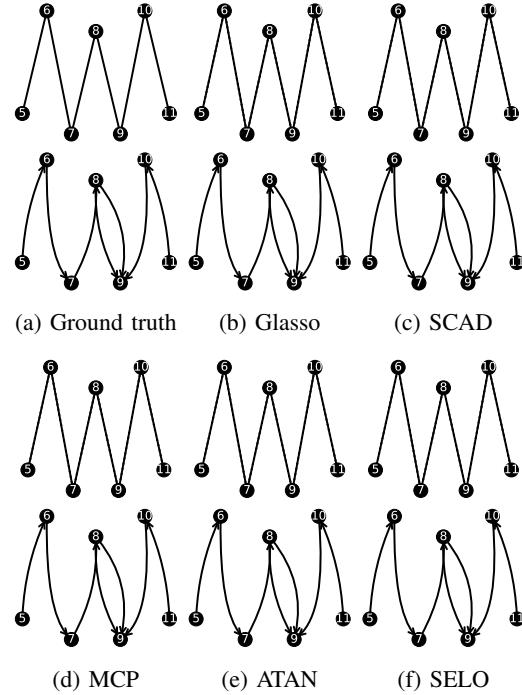


Fig. 31: Partial-Left topology, all loads, selected using recall

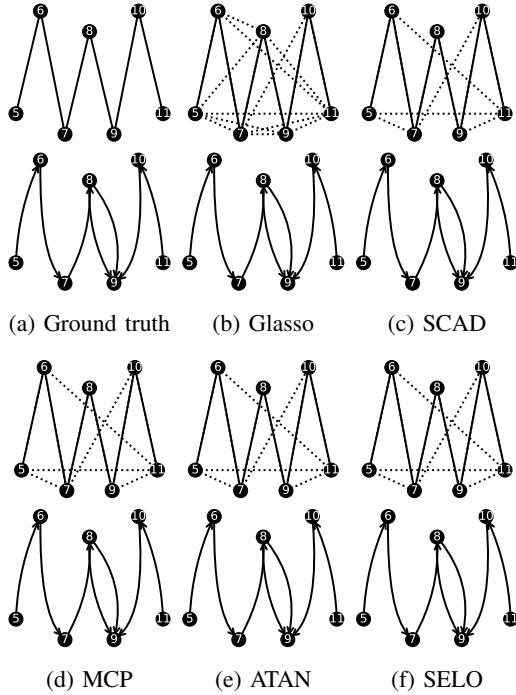


Fig. 30: Partial-Left topology, all loads, selected using EBIC

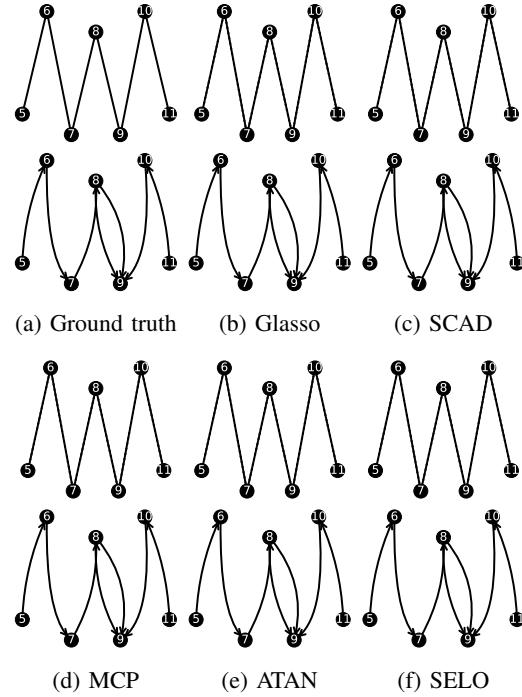


Fig. 32: Partial-Left topology, all loads, selected using f-score

III. PARTIAL-RIGHT TOPOLOGY

A. High Load

	lambda	gamma
LASSO	0.37	0.01
SCAD	0.37	3.70
MCP	0.54	2.00
ATAN	13.27	0.01
SELO	11.73	0.01

TABLE XLIX: Stage 1 Parameters: Partial-Right topology, high load, and selected using F_β -score with $\beta = 2$.

	lambda	gamma
LASSO	0.00	0.01
SCAD	0.06	3.70
MCP	0.11	2.00
ATAN	0.04	0.01
SELO	0.04	0.01

TABLE LII: Stage 1 Parameters: Partial-Right topology, high load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.80	0.91	0.67	1.00	3.00	8335.15
SCAD	0.80	0.91	0.67	1.00	3.00	4882.92
MCP	0.80	0.91	0.67	1.00	3.00	4586.04
ATAN	0.80	0.91	0.67	1.00	3.00	4835.11
SELO	0.80	0.91	0.67	1.00	3.00	4806.79

TABLE L: Stage 1 Metrics: Partial-Right topology, high load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE LI: Stage 2 Metrics: Partial-Right topology, high load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.46	0.68	0.30	1.00	14.00	4150.80
SCAD	0.57	0.77	0.40	1.00	9.00	4106.49
MCP	0.57	0.77	0.40	1.00	9.00	4108.15
ATAN	0.57	0.77	0.40	1.00	9.00	4105.51
SELO	0.57	0.77	0.40	1.00	9.00	4105.60

TABLE LIII: Stage 1 Metrics: Partial-Right topology, high load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE LIV: Stage 2 Metrics: Partial-Right topology, high load, and selected using EBIC.

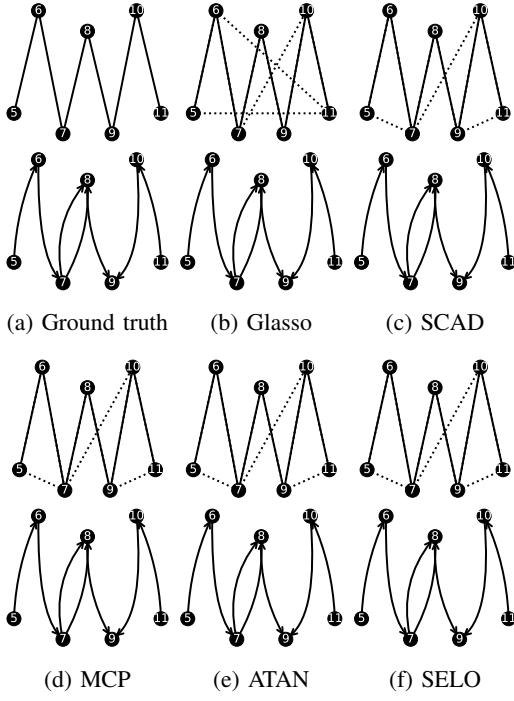


Fig. 33: Partial-Right topology, high load, selected using F_β -score with $\beta = 2$

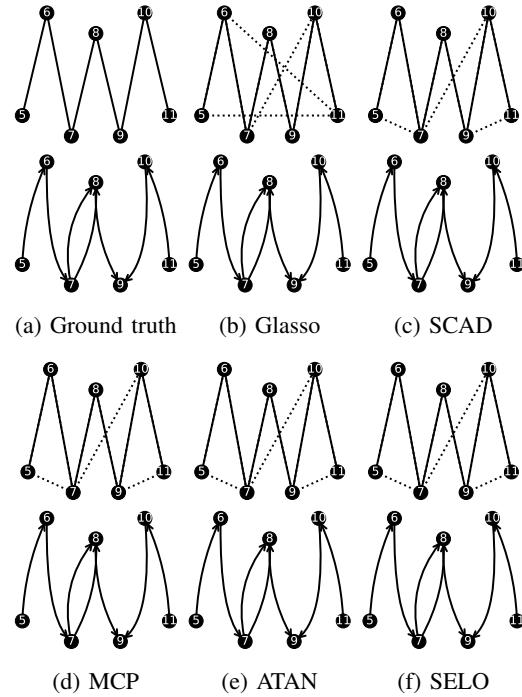


Fig. 35: Partial-Right topology, high load, selected using recall

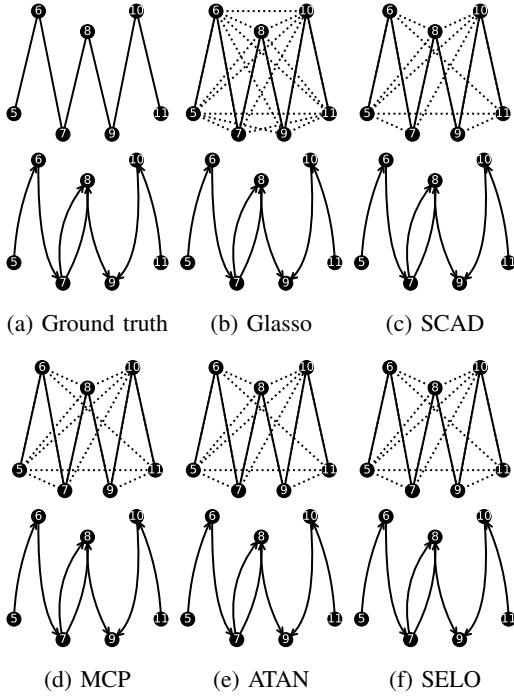


Fig. 34: Partial-Right topology, high load, selected using EBIC

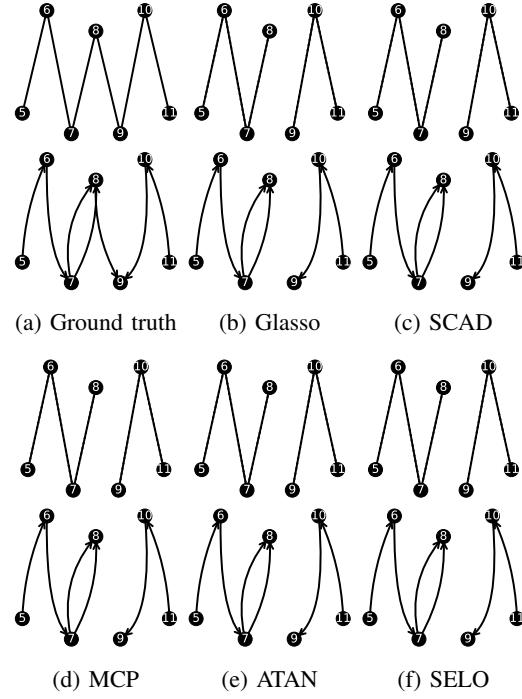


Fig. 36: Partial-Right topology, high load, selected using f-score

B. Medium Load

	lambda	gamma
LASSO	0.33	0.01
SCAD	0.23	3.70
MCP	1.00	2.00
ATAN	6.33	0.01
SELO	5.60	0.01

TABLE LV: Stage 1 Parameters: Partial-Right topology, medium load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.80	0.91	0.67	1.00	3.00	7415.07
SCAD	0.75	0.88	0.60	1.00	4.00	3380.07
MCP	0.91	0.86	1.00	0.83	1.00	4862.92
ATAN	0.75	0.88	0.60	1.00	4.00	3477.38
SELO	0.75	0.88	0.60	1.00	4.00	3462.52

TABLE LVI: Stage 1 Metrics: Partial-Right topology, medium load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	0.92	0.88	1.00	0.86	1
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE LVII: Stage 2 Metrics: Partial-Right topology, medium load, and selected using F_β -score with $\beta = 2$.

	lambda	gamma
LASSO	0.00	0.01
SCAD	0.11	3.70
MCP	0.16	2.00
ATAN	0.37	0.01
SELO	0.33	0.01

TABLE LVIII: Stage 1 Parameters: Partial-Right topology, medium load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.46	0.68	0.30	1.00	14.00	3229.18
SCAD	0.67	0.83	0.50	1.00	6.00	3198.23
MCP	0.57	0.77	0.40	1.00	9.00	3204.66
ATAN	0.63	0.81	0.46	1.00	7.00	3205.80
SELO	0.63	0.81	0.46	1.00	7.00	3204.76

TABLE LIX: Stage 1 Metrics: Partial-Right topology, medium load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE LX: Stage 2 Metrics: Partial-Right topology, medium load, and selected using EBIC.

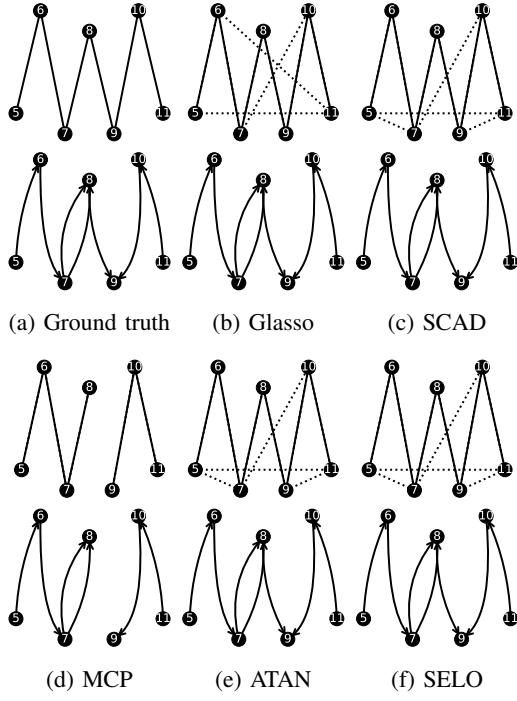


Fig. 37: Partial-Right topology, medium load, selected using F_β -score with $\beta = 2$

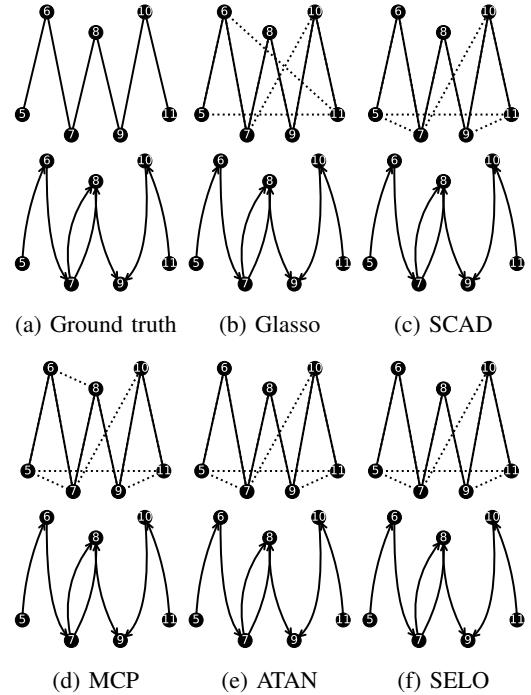


Fig. 39: Partial-Right topology, medium load, selected using recall

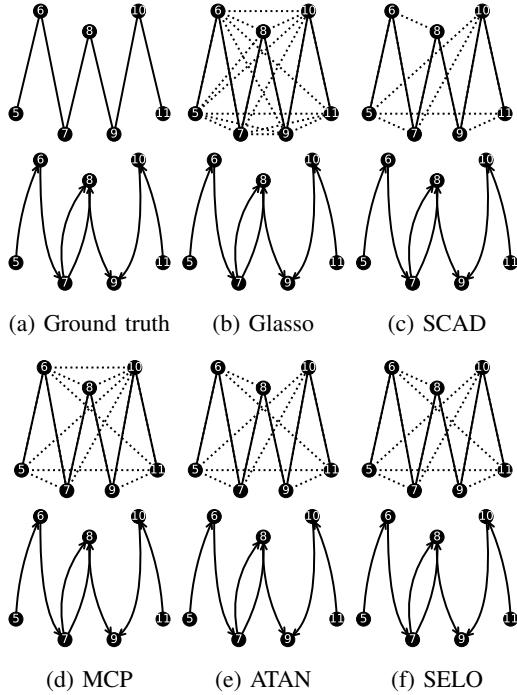


Fig. 38: Partial-Right topology, medium load, selected using EBIC

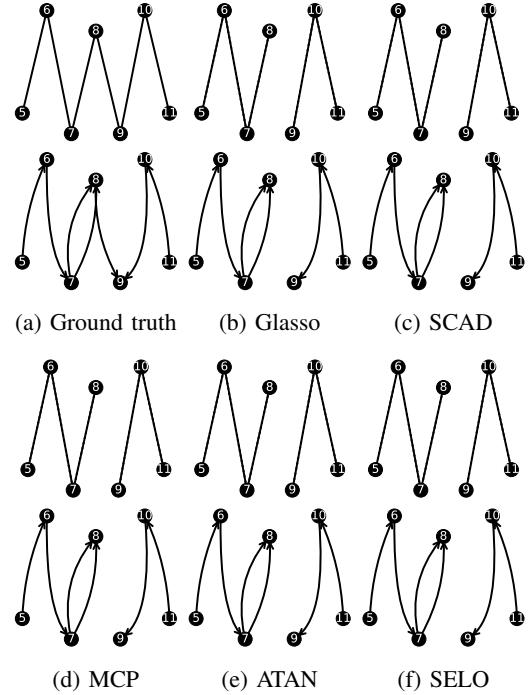


Fig. 40: Partial-Right topology, medium load, selected using f-score

C. Low Load

	lambda	gamma
LASSO	0.07	0.01
SCAD	0.20	3.70
MCP	0.33	2.00
ATAN	3.87	0.01
SELO	3.42	0.01

TABLE LXI: Stage 1 Parameters: Partial-Right topology, low load, and selected using F_β -score with $\beta = 2$.

	lambda	gamma
LASSO	0.00	0.01
SCAD	0.12	3.70
MCP	0.20	2.00
ATAN	0.07	0.01
SELO	0.07	0.01

TABLE LXIV: Stage 1 Parameters: Partial-Right topology, low load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.80	0.91	0.67	1.00	3.00	2857.06
SCAD	0.71	0.86	0.55	1.00	5.00	1422.40
MCP	0.71	0.86	0.55	1.00	5.00	1401.01
ATAN	0.75	0.88	0.60	1.00	4.00	1478.11
SELO	0.75	0.88	0.60	1.00	4.00	1472.08

TABLE LXII: Stage 1 Metrics: Partial-Right topology, low load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.44	0.67	0.29	1.00	15.00	1374.02
SCAD	0.63	0.81	0.46	1.00	7.00	1320.16
MCP	0.63	0.81	0.46	1.00	7.00	1320.13
ATAN	0.55	0.75	0.38	1.00	10.00	1328.21
SELO	0.55	0.75	0.38	1.00	10.00	1327.54

TABLE LXV: Stage 1 Metrics: Partial-Right topology, low load, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE LXIII: Stage 2 Metrics: Partial-Right topology, low load, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE LXVI: Stage 2 Metrics: Partial-Right topology, low load, and selected using EBIC.

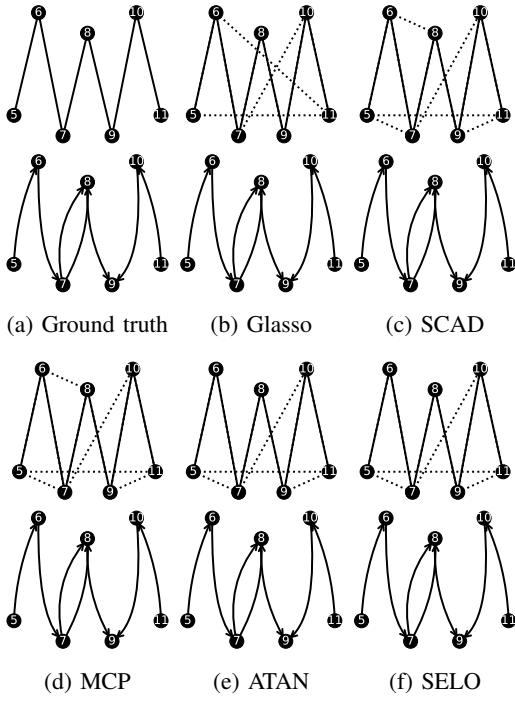


Fig. 41: Partial-Right topology, low load, selected using F_β -score with $\beta = 2$

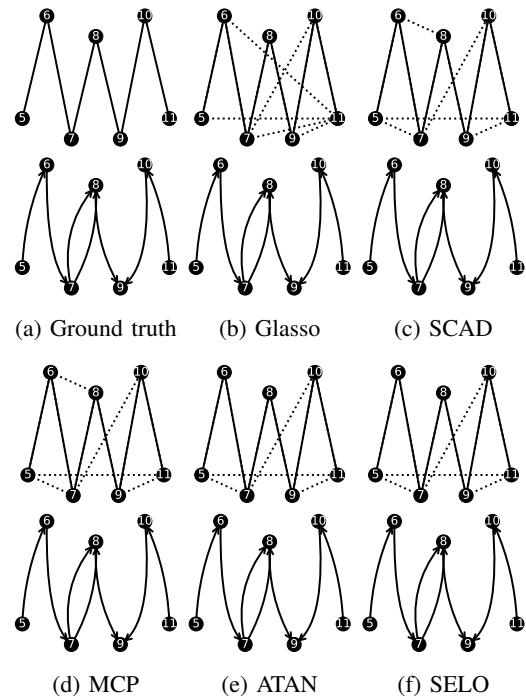


Fig. 43: Partial-Right topology, low load, selected using recall

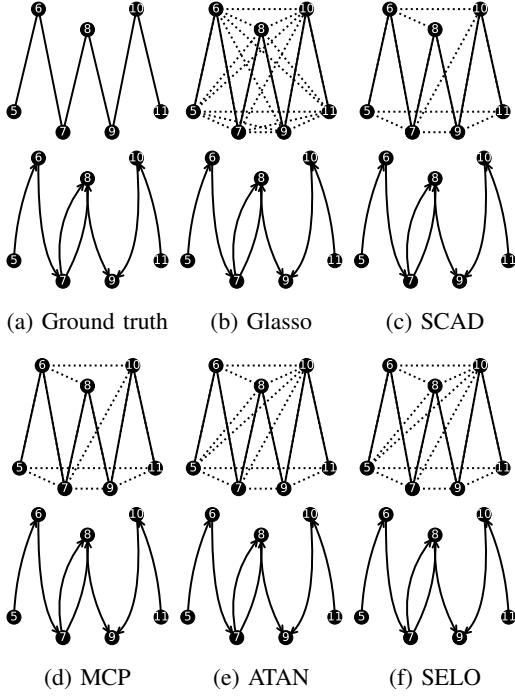


Fig. 42: Partial-Right topology, low load, selected using EBIC

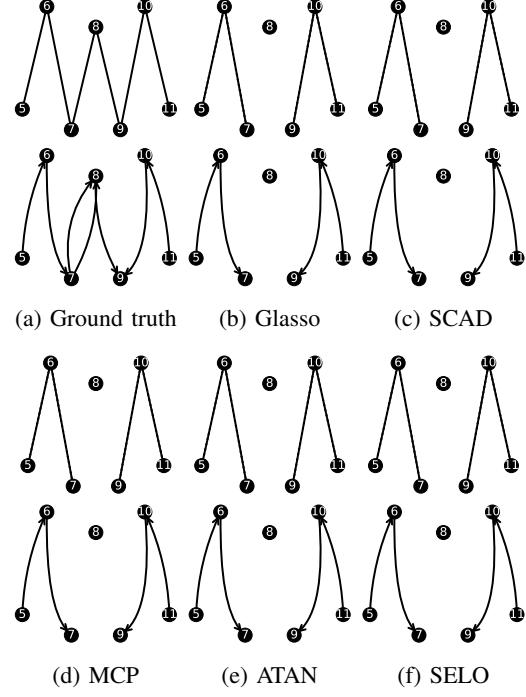


Fig. 44: Partial-Right topology, low load, selected using f-score

D. All Loads

	lambda	gamma
LASSO	0.16	0.01
SCAD	0.16	3.70
MCP	0.23	2.00
ATAN	0.48	0.01
SELO	0.48	0.01

TABLE LXVII: Stage 1 Parameters: Partial-Right topology, all loads, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.75	0.88	0.60	1.00	4.00	27839.02
SCAD	0.86	0.94	0.75	1.00	2.00	26383.64
MCP	0.80	0.91	0.67	1.00	3.00	26369.10
ATAN	0.80	0.91	0.67	1.00	3.00	26351.43
SELO	0.80	0.91	0.67	1.00	3.00	26361.21

TABLE LXVIII: Stage 1 Metrics: Partial-Right topology, all loads, and selected using F_β -score with $\beta = 2$.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE LXIX: Stage 2 Metrics: Partial-Right topology, all loads, and selected using F_β -score with $\beta = 2$.

	lambda	gamma
LASSO	0.01	0.01
SCAD	0.03	3.70
MCP	0.06	2.00
ATAN	0.02	0.01
SELO	0.02	0.01

TABLE LXX: Stage 1 Parameters: Partial-Right topology, all loads, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd	ic
LASSO	0.52	0.73	0.35	1.00	11.00	25870.13
SCAD	0.63	0.81	0.46	1.00	7.00	25814.02
MCP	0.67	0.83	0.50	1.00	6.00	25806.61
ATAN	0.67	0.83	0.50	1.00	6.00	25806.51
SELO	0.67	0.83	0.50	1.00	6.00	25807.94

TABLE LXXI: Stage 1 Metrics: Partial-Right topology, all loads, and selected using EBIC.

	f-score	F_β -score	precision	recall	hd
LASSO	1.00	1.00	1.00	1.00	0
SCAD	1.00	1.00	1.00	1.00	0
MCP	1.00	1.00	1.00	1.00	0
ATAN	1.00	1.00	1.00	1.00	0
SELO	1.00	1.00	1.00	1.00	0

TABLE LXXII: Stage 2 Metrics: Partial-Right topology, all loads, and selected using EBIC.

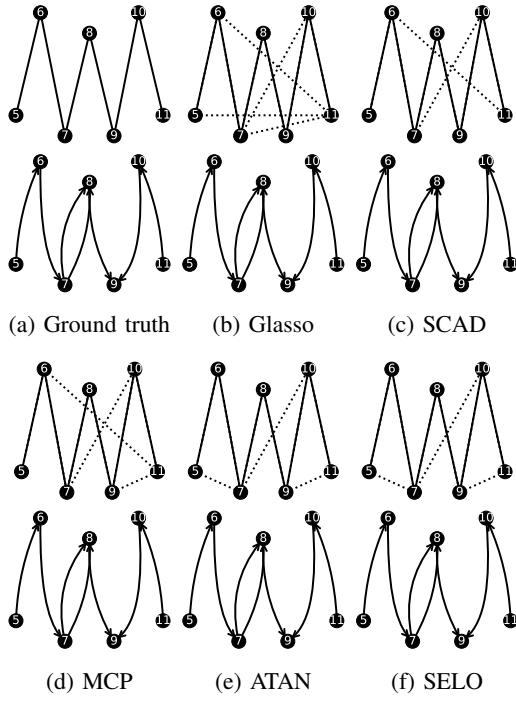


Fig. 45: Partial-Right topology, all loads, selected using F_β -score with $\beta = 2$

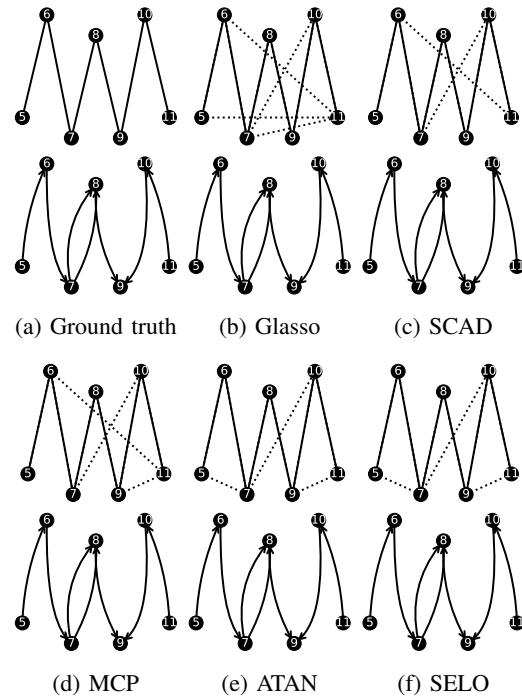


Fig. 47: Partial-Right topology, all loads, selected using recall

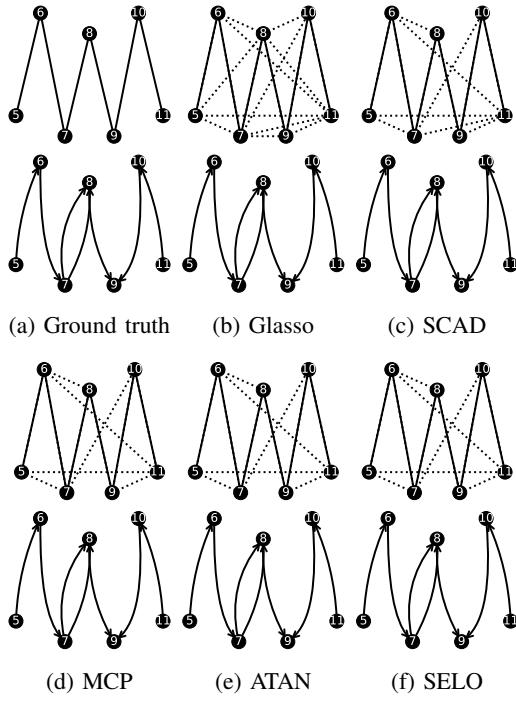


Fig. 46: Partial-Right topology, all loads, selected using EBIC

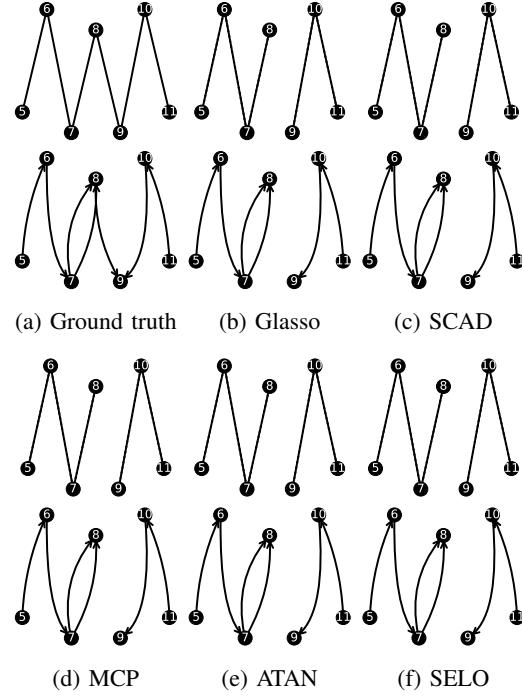


Fig. 48: Partial-Right topology, all loads, selected using f-score