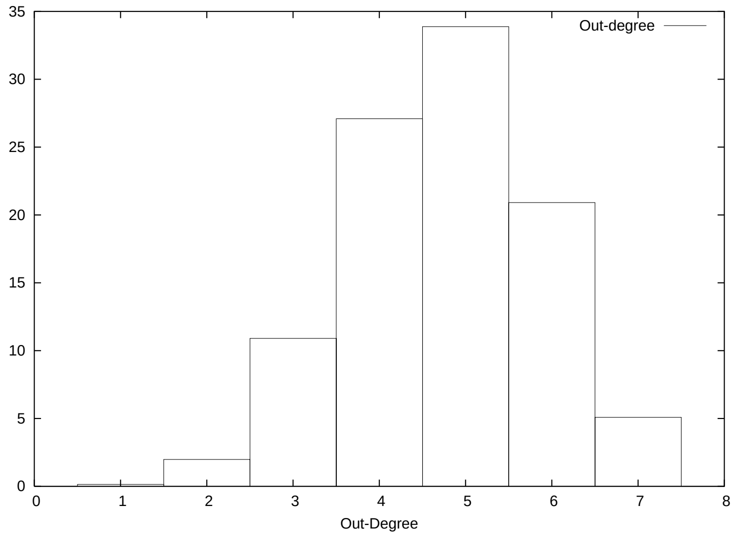
Graph: spin/sort

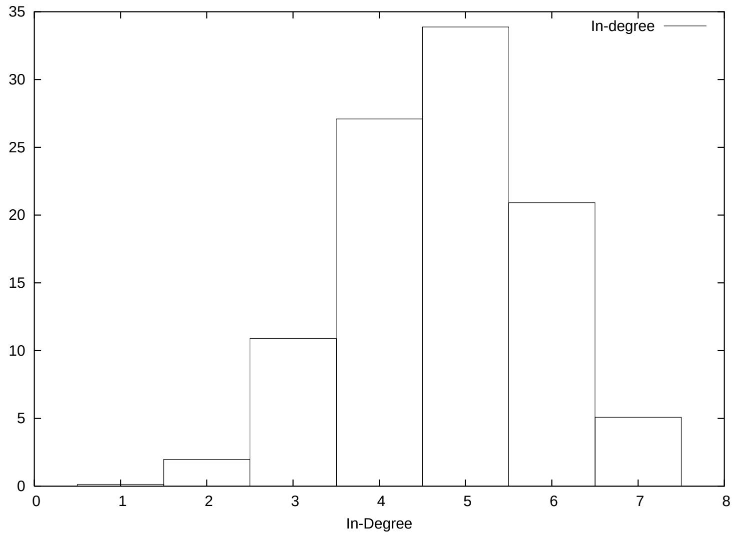
General Info

Example title	Concurrent sorting
Parameter	concurrent sort of N numbers, 60 lines of Promela
Reduction	7
Modification	
States	107,728
Edges	512,433
Average degree	4.7

Out-Degrees distribution:



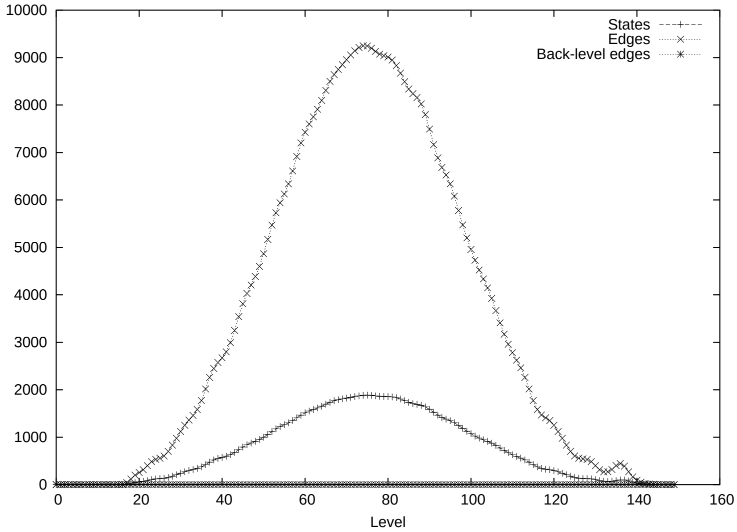
In-Degrees distribution:



BFS Info

BFS height	149
BFS width	1,886 (1.7%)
Back level edges	0 (0%)

BFS level info:



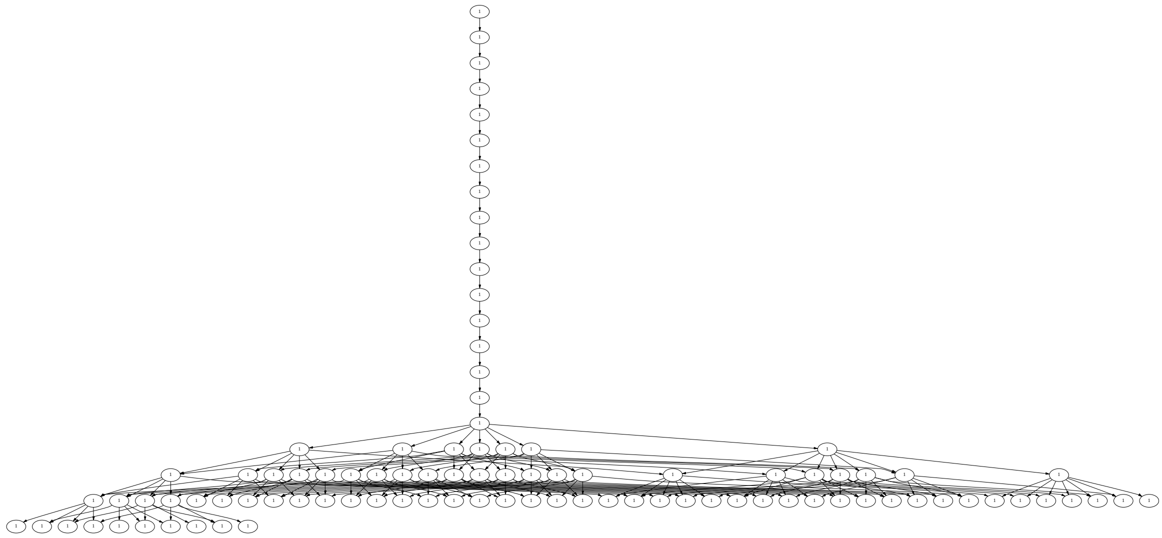
SCC Info

SCC components	107,728
SCC quetient height	149
SCC quetient nontrivial height	0
Number of terminal components	1
The largest component is	the only terminal

Statistics according to **sizes**:

Size	Number of components	Number of states here
1	107,728	100%

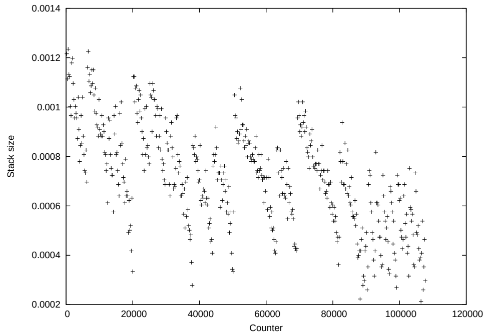
SCC component graph (part):



DFS Info

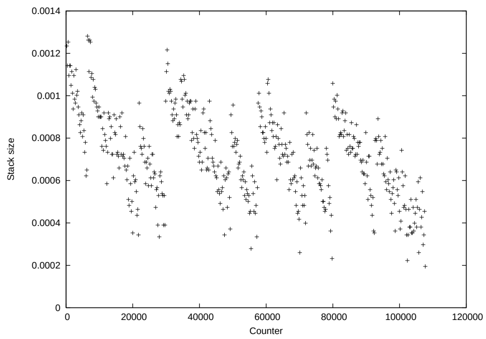
Run 0

front-edges : back-edges : cross-edges = 107,727 : 0 : 404,706 = 21%:0%:78.9%
Max. stack size: 150 (0.1%)
Shortest cycle detected: -1
Most often detected lengths of cycles: (), (), (), (), ()
Stack graph:



Run 1

front-edges : back-edges : cross-edges = 107,727 : 0 : 404,706 = 21%:0%:78.9%
Max. stack size: 150 (0.1%)
Shortest cycle detected: -1
Most often detected lengths of cycles: (), (), (), (), ()
Stack graph:



Local Structure

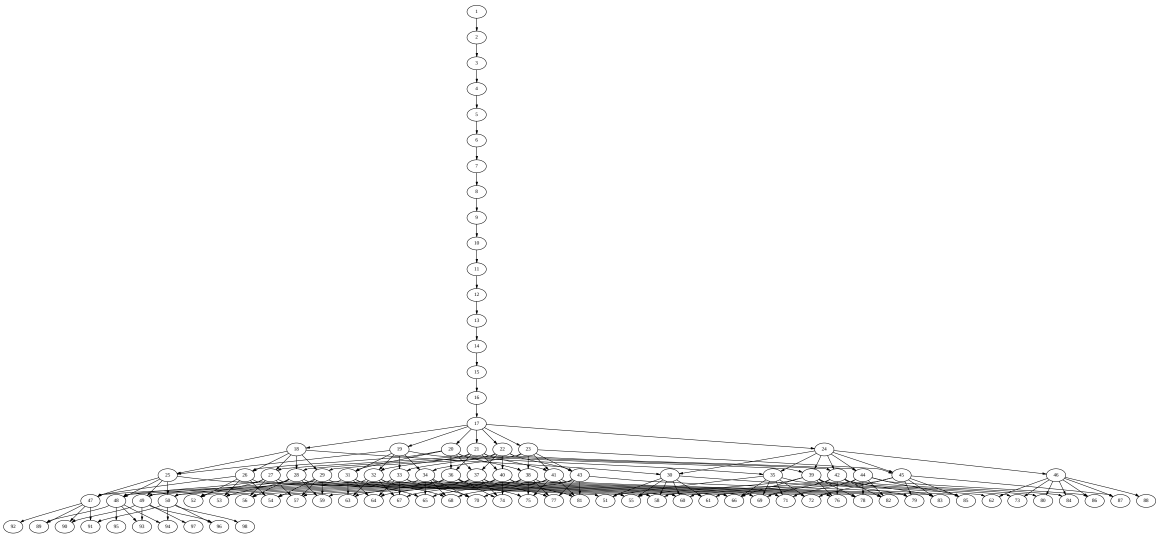
Short cycles(up to 6)
none
Diamonds

107,578 (99.8%)

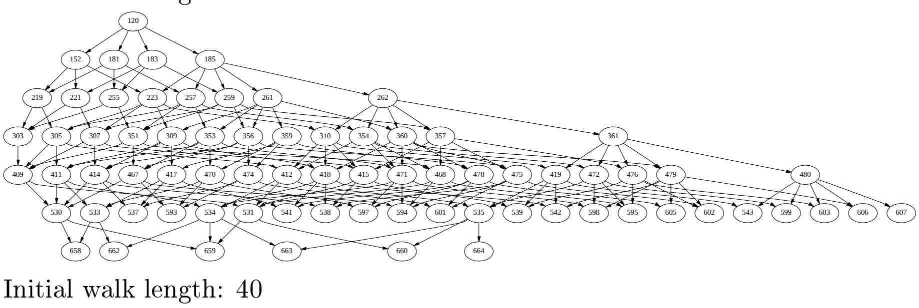
Neighborhoods

k	avg size	avg clustering
1	5.7	1
2	17.9	1.5
3	41.3	1.9
4	79	2.2

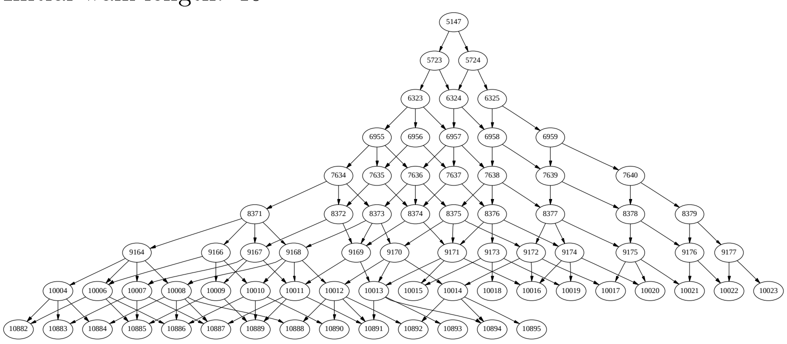
Visualization of some parts of the state state space:
Initial walk length: 0



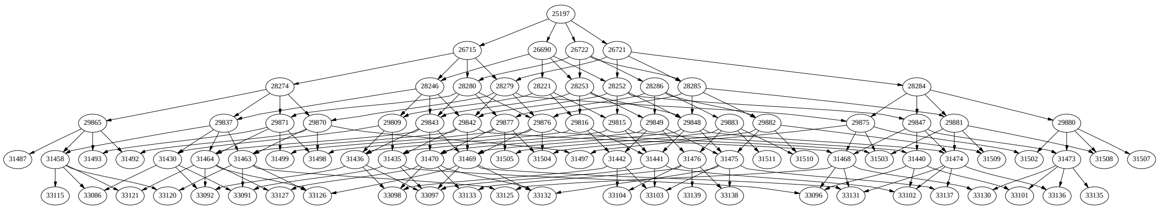
Initial walk length: 20



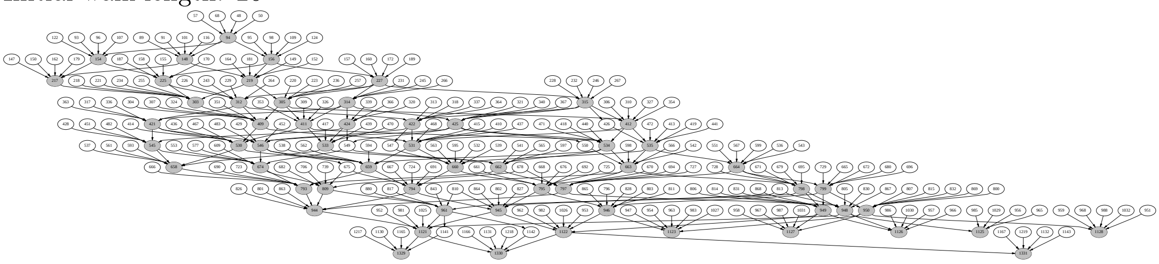
Initial walk length: 40



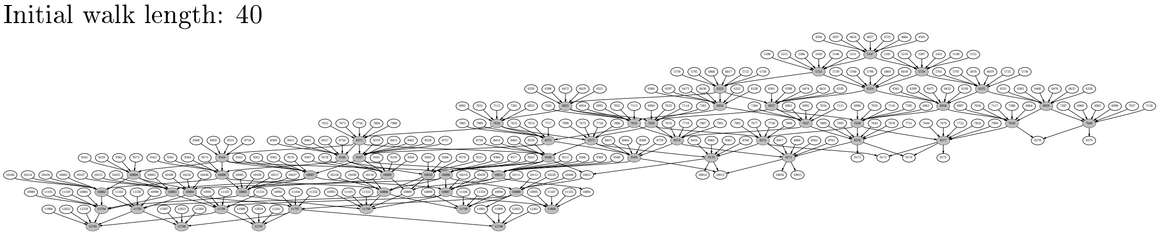
Initial walk length: 60



Initial walk length: 20



Initial walk length: 40



Initial walk length: 60