Kai Salomaa

List of Publications by Year
in descending order

86 papers	**1,203** citations	516710 **16** h-index	414414 **32** g-index
96 all docs	**96** docs citations	**96** times ranked	**154** citing authors

#	Article	IF	Citations
1	The state complexities of some basic operations on regular languages. Theoretical Computer Science, 1994, 125, 315-328.	0.9	281
2	State complexity of combined operations. Theoretical Computer Science, 2007, 383, 140-152.	0.9	73
3	A FORMAL STUDY OF PRACTICAL REGULAR EXPRESSIONS. International Journal of Foundations of Computer Science, 2003, 14, 1007-1018.	1.1	70
4	State complexity of basic operations on suffix-free regular languages. Theoretical Computer Science, 2009, 410, 2537-2548.	0.9	56
5	Deterministic tree pushdown automata and monadic tree rewriting systems. Journal of Computer and System Sciences, 1988, 37, 367-394.	1.2	55
6	State Complexity of Basic Operations on Finite Languages. Lecture Notes in Computer Science, 2001, , 60-70.	1.3	51
7	Pattern languages with and without erasing. International Journal of Computer Mathematics, 1994, 50, 147-163.	1.8	49
8	Complexity of input-driven pushdown automata. ACM SIGACT News, 2014, 45, 47-67.	0.1	46
9	Nondeterministic State Complexity of Basic Operations for Prefix-Free Regular Languages. Fundamenta Informaticae, 2009, 90, 93-106.	0.4	34
10	ON THE STATE COMPLEXITY OF COMBINED OPERATIONS AND THEIR ESTIMATION. International Journal of Foundations of Computer Science, 2007, 18, 683-698.	1.1	26
11	STATE COMPLEXITY OF UNION AND INTERSECTION OF FINITE LANGUAGES. International Journal of Foundations of Computer Science, 2008, 19, 581-595.	1.1	26
12	Operational state complexity of nested word automata. Theoretical Computer Science, 2009, 410, 3290-3302.	0.9	26
13	Nondeterministic state complexity of nested word automata. Theoretical Computer Science, 2009, 410, 2961-2971.	0.9	21
14	THE EDIT-DISTANCE BETWEEN A REGULAR LANGUAGE AND A CONTEXT-FREE LANGUAGE. International Journal of Foundations of Computer Science, 2013, 24, 1067-1082.	1.1	21
15	STATE COMPLEXITY OF ADDITIVE WEIGHTED FINITE AUTOMATA. International Journal of Foundations of Computer Science, 2007, 18, 1407-1416.	1.1	16
16	State complexity of operations on input-driven pushdown automata. Journal of Computer and System Sciences, 2017, 86, 207-228.	1.2	16
17	Transition Complexity of Incomplete DFAs. Fundamenta Informaticae, 2011, 110, 143-158.	0.4	15
18	On the existence of prime decompositions. Theoretical Computer Science, 2007, 376, 60-69.	0.9	14

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19	Decidability of trajectory-based equations. Theoretical Computer Science, 2005, 345, 304-330.	0.9	13
20	Limitations of lower bound methods for deterministic nested word automata. Information and Computation, 2011, 209, 580-589.	0.7	13
21	Transition complexity of language operations. Theoretical Computer Science, 2007, 387, 147-154.	0.9	12
22	Descriptional complexity of unambiguous input-driven pushdown automata. Theoretical Computer Science, 2015, 566, 1-11.	0.9	12
23	Approximate matching between a context-free grammar and a finite-state automaton. Information and Computation, 2016, 247, 278-289.	0.7	11
24	Ambiguity, Nondeterminism and State Complexity of Finite Automata. Acta Cybernetica, 2017, 23, 141-157.	0.6	11
25	Transformations Between Different Models of Unranked Bottom-Up Tree Automata. Fundamenta Informaticae, 2011, 109, 405-424.	0.4	9
26	State complexity of the concatenation of regular tree languages. Theoretical Computer Science, 2012, 429, 273-281.	0.9	9
27	State Complexity of Neighbourhoods and Approximate Pattern Matching. International Journal of Foundations of Computer Science, 2018, 29, 315-329.	1.1	9
28	Descriptional Complexity of Nondeterministic Finite Automata. Lecture Notes in Computer Science, 2007, , 31-35.	1.3	8
29	State Complexity of Insertion. International Journal of Foundations of Computer Science, 2016, 27, 863-878.	1.1	8
30	State complexity of deletion and bipolar deletion. Acta Informatica, 2016, 53, 67-85.	0.5	8
31	State complexity of permutation on finite languages over a binary alphabet. Theoretical Computer Science, 2017, 682, 67-78.	0.9	8
32	Lower bounds for the transition complexity of NFAs. Journal of Computer and System Sciences, 2008, 74, 1116-1130.	1.2	7
33	State Complexity of Neighbourhoods and Approximate Pattern Matching. Lecture Notes in Computer Science, 2015, , 389-400.	1.3	7
34	Worst Case Branching and Other Measures of Nondeterminism. International Journal of Foundations of Computer Science, 2017, 28, 195-210.	1.1	6
35	RESTRICTED SETS OF TRAJECTORIES AND DECIDABILITY OF SHUFFLE DECOMPOSITIONS. International Journal of Foundations of Computer Science, 2005, 16, 897-912.	1.1	5
36	State Complexity of Operations on Input-Driven Pushdown Automata. Lecture Notes in Computer Science, 2011, , 485-496.	1.3	5

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37	Descriptional Complexity of Unambiguous Nested Word Automata. Lecture Notes in Computer Science, 2011, , 414-426.	1.3	5
38	STATE-SIZE HIERARCHY FOR FINITE-STATE COMPLEXITY. International Journal of Foundations of Computer Science, 2012, 23, 37-50.	1.1	5
39	State Complexity of Combined Operations for Prefix-Free Regular Languages. Lecture Notes in Computer Science, 2009, , 398-409.	1.3	5
40	State Complexity of Kleene-Star Operations on Trees. Lecture Notes in Computer Science, 2012, , 388-402.	1.3	5
41	Hierarchy of k-context-free languages part 1. International Journal of Computer Mathematics, 1989, 26, 69-90.	1.8	4
42	Hierarchy ofk-context-free languages. International Journal of Computer Mathematics, 1989, 26, 193-205.	1.8	4
43	Variants of codes and indecomposable languages. Information and Computation, 2009, 207, 1340-1349.	0.7	4
44	OVERLAP-FREE LANGUAGES AND SOLID CODES. International Journal of Foundations of Computer Science, 2011, 22, 1197-1209.	1.1	4
45	Undecidability of state complexity. International Journal of Computer Mathematics, 2013, 90, 1310-1320.	1.8	4
46	Edit distance neighbourhoods of input-driven pushdown automata. Theoretical Computer Science, 2019, 777, 417-430.	0.9	4
47	Decidability of confluence and termination of monadic term rewriting systems. Lecture Notes in Computer Science, 1991, , 275-286.	1.3	4
48	Nondeterminism Growth and State Complexity. Lecture Notes in Computer Science, 2019, , 210-222.	1.3	4
49	Input-Driven Pushdown Automata with Limited Nondeterminism. Lecture Notes in Computer Science, 2014, , 84-102.	1.3	4
50	Descriptional Complexity of Error Detection. Emergence, Complexity and Computation, 2017, , 101-119.	0.3	4
51	The Quotient Operation on Input-Driven Pushdown Automata. Lecture Notes in Computer Science, 2017, , 299-310.	1.3	4
52	Descriptional Complexity of Input-Driven Pushdown Automata. Lecture Notes in Computer Science, 2012, , 186-206.	1.3	4
53	On the Size of Stack and Synchronization Alphabets of Tree Automata. Fundamenta Informaticae, 1998, 36, 57-69.	0.4	3
54	NONDETERMINISTIC STATE COMPLEXITY OF PROPORTIONAL REMOVALS. International Journal of Foundations of Computer Science, 2014, 25, 823-835.	1.1	3

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55	State complexity of prefix distance. Theoretical Computer Science, 2017, 679, 107-117.	0.9	3
56	Site-Directed Insertion: Decision Problems, Maximality and Minimality. Lecture Notes in Computer Science, 2018, , 49-61.	1.3	3
57	A pumping result for 2-context-free languages. Theoretical Computer Science, 1988, 62, 267-287.	0.9	2
58	Decidability of EDT0L structural equivalence. Theoretical Computer Science, 2002, 276, 245-259.	0.9	2
59	State Complexity of k-Union and k-Intersection for Prefix-Free Regular Languages. International Journal of Foundations of Computer Science, 2015, 26, 211-227.	1.1	2
60	State complexity of inversion operations. Theoretical Computer Science, 2016, 610, 2-12.	0.9	2
61	Site-directed insertion: Language equations and decision problems. Theoretical Computer Science, 2019, 798, 40-51.	0.9	2
62	Generalizations of Code Languages with Marginal Errors. International Journal of Foundations of Computer Science, 2021, 32, 509-529.	1.1	2
63	Structural properties of NFAs and growth rates of nondeterminism measures. Information and Computation, 2022, 284, 104690.	0.7	2
64	The State Complexity of Permutations on Finite Languages over Binary Alphabets. Lecture Notes in Computer Science, 2015, , 220-230.	1.3	2
65	Consensus String Problem for Multiple Regular Languages. Lecture Notes in Computer Science, 2017, , 196-207.	1.3	2
66	Transformations Between Different Types of Unranked Bottom-Up Tree Automata. Electronic Proceedings in Theoretical Computer Science, EPTCS, 0, 31, 159-168.	0.8	2
67	Cycle Height of Finite Automata. Lecture Notes in Computer Science, 2018, , 200-211.	1.3	2
68	Language Decompositions, Primality, and Trajectory-Based Operations. Lecture Notes in Computer Science, 2008, , 17-22.	1.3	2
69	Lower bounds for the size of deterministic unranked tree automata. Theoretical Computer Science, 2012, 454, 231-239.	0.9	1
70	Pseudo-inversion: closure properties and decidability. Natural Computing, 2016, 15, 31-39.	3.0	1
71	State Complexity of the Quotient Operation on Input-Driven Pushdown Automata. International Journal of Foundations of Computer Science, 2019, 30, 1217-1235.	1.1	1
72	State Complexity of Suffix Distance. International Journal of Foundations of Computer Science, 2019, 30, 1197-1216.	1.1	1

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73	Branching Measures and Nearly Acyclic NFAs. International Journal of Foundations of Computer Science, 2019, 30, 1135-1155.	1.1	1
74	Top-down tree edit-distance of regular tree languages. International Journal of Advances in Engineering Sciences and Applied Mathematics, 2019, 11, 2-10.	1.1	1
75	Consensus string problem for multiple regular languages. Information and Computation, 2021, 279, 104615.	0.7	1
76	State Complexity of Inversion Operations. Lecture Notes in Computer Science, 2014, , 102-113.	1.3	1
77	Further Closure Properties of Input-Driven Pushdown Automata. Lecture Notes in Computer Science, 2018, , 224-236.	1.3	1
78	On Language Decompositions and Primality. Lecture Notes in Computer Science, 2011, , 63-75.	1.3	1
79	State Complexity of Nested Word Automata. Lecture Notes in Computer Science, 2009, , 59-70.	1.3	1
80	State Complexity of Projection and Quotient on Unranked Trees. Lecture Notes in Computer Science, 2012, , 280-293.	1.3	1
81	State Complexity of k-Parallel Tree Concatenation. Fundamenta Informaticae, 2017, 154, 185-199.	0.4	0
82	Further closure properties of input-driven pushdown automata. Theoretical Computer Science, 2019, 798, 65-77.	0.9	0
83	Closest substring problems for regular languages. Theoretical Computer Science, 2021, 862, 144-154.	0.9	0
84	In Memoriam Sheng Yu. Lecture Notes in Computer Science, 2012, , 1-4.	1.3	0
85	Relative Prefix Distance Between Languages. Lecture Notes in Computer Science, 2017, , 284-295.	1.3	0
86	State Complexity of Suffix Distance. Lecture Notes in Computer Science, 2017, , 287-298.	1.3	0