Paris C Avgeriou

List of Publications by Year in Descending Order

176 papers	2,876 citations	26 h-index	46 g-index
194 ext. papers	3,686 ext. citations	1.8 avg, IF	5.67 L-index

#	Paper	IF	Citations
176	A mapping study on documentation in Continuous Software Development. *Information and Software Technology*, **2022**, 142, 106733	3.4	0
175	On the evolution and impact of architectural smells□an industrial case study. *Empirical Software Engineering*, **2022**, 27, 1	3.3	0
174	Does it matter who pays back Technical Debt? An empirical study of self-fixed TD. *Information and Software Technology*, **2021**, 106738	3.4	0
173	The Risk of Generating Technical Debt Interest: A Case Study. *SN Computer Science*, **2021**, 2, 1	2	2
172	Exploring the Relation Between Co-changes and Architectural Smells. *SN Computer Science*, **2021**, 2, 1	2	2
171	**2021**,		2
170	Evolution of the Unix System Architecture: An Exploratory Case Study. *IEEE Transactions on Software Engineering*, **2021**, 47, 1134-1163	3.5	4
169	An Overview and Comparison of Technical Debt Measurement Tools. *IEEE Software*, **2021**, 38, 61-71	1.5	18
168	Empirical studies on software traceability: A mapping study. *Journal of Software: Evolution and Process*, **2021**, 33, e2294	1	4
167	Architectural decision-making as a financial investment: An industrial case study. *Information and Software Technology*, **2021**, 129, 106412	3.4	2
166	Evolution of technical debt remediation in Python: A case study on the Apache Software Ecosystem. *Journal of Software: Evolution and Process*, **2021**, 33, e2319	1	3
165	The perception of Architectural Smells in industrial practice. *IEEE Software*, **2021**, 0-0	1.5	0
164	**2021**,		2
163	Architectural design decisions that incur technical debt □An industrial case study. *Information and Software Technology*, **2021**, 139, 106669	3.4	2
162	An Exploratory Study on Architectural Knowledge in Issue Tracking Systems. *Lecture Notes in Computer Science*, **2021**, 117-133	0.9	1
161	Can Clean New Code reduce Technical Debt Density. *IEEE Transactions on Software Engineering*, **2020**, 1-1	3.5	3
160	Uncertainty in Self-adaptive Systems: A Research Community Perspective. *ACM Transactions on Autonomous and Adaptive Systems*, **2020**, 15, 1-36	1.2	4

159	An empirical study on self-fixed technical debt **2020**,		4
158	Guidelines for Managing Threats to Validity of Secondary Studies in Software Engineering **2020**, 415-441		3
157	Quality attribute trade-offs in the embedded systems industry: an exploratory case study. *Software Quality Journal*, **2020**, 28, 505-534	1.2	3
156	On the Temporality of Introducing Code Technical Debt. *Communications in Computer and Information Science*, **2020**, 68-82	0.3	4
155	Exploring the Relation between Technical Debt Principal and Interest: An Empirical Approach. *Information and Software Technology*, **2020**, 128, 106391	3.4	2
154	Architecting systems of systems: A tertiary study. *Information and Software Technology*, **2020**, 118, 106202	3.4	9
153	Integrating Agile Practices into Architectural Assumption Management **2019**,		1
152	REI: An integrated measure for software reusability. *Journal of Software: Evolution and Process*, **2019**, 31, e2216	1	0
151	Investigating Instability Architectural Smells Evolution: An Exploratory Case Study **2019**,		4
150	What can violations of good practices tell about the relationship between GoF patterns and run-time quality attributes?. *Information and Software Technology*, **2019**, 105, 1-16	3.4	8
149	Identifying, categorizing and mitigating threats to validity in software engineering secondary studies. *Information and Software Technology*, **2019**, 106, 201-230	3.4	50
148	Correlating Pattern Grime and Quality Attributes. *IEEE Access*, **2018**, 6, 23065-23078	3.5	2
147	Assumptions and their management in software development: A systematic mapping study. *Information and Software Technology*, **2018**, 94, 82-110	3.4	7
146	Design Approaches for Critical Embedded Systems: A Systematic Mapping Study. *Communications in Computer and Information Science*, **2018**, 243-274	0.3	
145	Reusability Index: A Measure for Assessing Software Assets Reusability. *Lecture Notes in Computer Science*, **2018**, 43-58	0.9	4
144	How do developers fix issues and pay back technical debt in the Apache ecosystem? **2018**,		20
143	A framework for managing interest in technical debt **2018**,		11
142	Evaluation of a process for architectural assumption management in software development. *Science of Computer Programming*, **2018**, 168, 38-70	1.1	3

141	An exploratory case study on reusing architecture decisions in software-intensive system projects. *Journal of Systems and Software*, **2018**, 144, 60-83	3.3	2
140	A mapping study on design-time quality attributes and metrics. *Journal of Systems and Software*, **2017**, 127, 52-77	3.3	25
139	A systematic literature review on methods that handle multiple quality attributes in architecture-based self-adaptive systems. *Information and Software Technology*, **2017**, 90, 1-26	3.4	31
138	Investigating the effect of design patterns on energy consumption. *Journal of Software: Evolution and Process*, **2017**, 29, e1851	1	7
137	Identifying Extract Method Refactoring Opportunities Based on Functional Relevance. *IEEE Transactions on Software Engineering*, **2017**, 43, 954-974	3.5	12
136	**2017**,		3
135	Technical Debt in Agile Development. *Software Engineering Notes: an Informal Newsletter of the Special Interest Committee on Software Engineering / ACM*, **2017**, 42, 18-21	0.4	
134	An industrial case study on an architectural assumption documentation framework. *Journal of Systems and Software*, **2017**, 134, 190-210	3.3	9
133	Architectural Assumptions and Their Management in Industry An Exploratory Study. *Lecture Notes in Computer Science*, **2017**, 191-207	0.9	5
132	A Method for Assessing Class Change Proneness **2017**,		12
131	Quality attributes and quality models for ambient assisted living software systems: A systematic mapping. *Information and Software Technology*, **2017**, 82, 121-138	3.4	31
130	Assessing code smell interest probability **2017**,		6
129	The Evolution of Technical Debt in the Apache Ecosystem. *Lecture Notes in Computer Science*, **2017**, 51-66	0.9	18
128	The Evolution of Design Pattern Grime: An Industrial Case Study. *Lecture Notes in Computer Science*, **2017**, 165-181	0.9	4
127	10 years of software architecture knowledge management: Practice and future. *Journal of Systems and Software*, **2016**, 116, 191-205	3.3	60
126	Technical debt in MDE **2016**,		9
125	A survey on quality attributes in service-based systems. *Software Quality Journal*, **2016**, 24, 271-299	1.2	25
124	Empirical evaluation of a process to increase consensus in group architectural decision making. *Information and Software Technology*, **2016**, 72, 31-47	3.4	16

123	Software metrics fluctuation: a property for assisting the metric selection process. *Information and Software Technology*, **2016**, 72, 110-124	3.4	15
122	A survey on software architectural assumptions. *Journal of Systems and Software*, **2016**, 113, 362-380	3.3	9
121	. *IEEE Software*, **2016**, 33, 66-73	1.5	22
120	Decision architect A decision documentation tool for industry. *Journal of Systems and Software*, **2016**, 112, 181-198	3.3	6
119	A systematic mapping study on the combination of software architecture and agile development. *Journal of Systems and Software*, **2016**, 111, 157-184	3.3	56
118	A Financial Approach for Managing Interest in Technical Debt. *Lecture Notes in Business Information Processing*, **2016**, 117-133	0.6	6
117	Architecture viewpoints for documenting architectural technical debt **2016**, 85-132		8
116	A Decision Model for Cyber-Foraging Systems **2016**,		10
115	The Perception of Technical Debt in the Embedded Systems Domain: An Industrial Case Study **2016**,		14
114	Technical Debt. *Software Engineering Notes: an Informal Newsletter of the Special Interest Committee on Software Engineering / ACM*, **2016**, 41, 38-41	0.4	3
113	Investigating Quality Trade-offs in Open Source Critical Embedded Systems **2015**,		9
112	The Effect of GoF Design Patterns on Stability: A Case Study. *IEEE Transactions on Software Engineering*, **2015**, 41, 781-802	3.5	39
111	The financial aspect of managing technical debt: A systematic literature review. *Information and Software Technology*, **2015**, 64, 52-73	3.4	85
110	Toward Simpler, not Simplistic, Quantification of Software Architecture and Metrics. *Software Engineering Notes: an Informal Newsletter of the Special Interest Committee on Software Engineering / ACM*, **2015**, 40, 43-46	0.4	
109	Size and cohesion metrics as indicators of the long method bad smell **2015**,		11
108	Introducing a Ripple Effect Measure: A Theoretical and Empirical Validation **2015**,		14
107	**2015**,		2
106	Architectural Technical Debt Identification Based on Architecture Decisions and Change Scenarios **2015**,		19

105	An industrial case study on variability handling in large enterprise software systems. *Information and Software Technology*, **2015**, 60, 16-31	3.4	6
104	A systematic mapping study on technical debt and its management. *Journal of Systems and Software*, **2015**, 101, 193-220	3.3	284
103	. *IEEE Transactions on Software Engineering*, **2014**, 40, 282-306	3.5	111
102	Industrial Implementation of a Documentation Framework for Architectural Decisions **2014**,		13
101	Decision-Centric Architecture Reviews. *IEEE Software*, **2014**, 31, 69-76	1.5	24
100	SOA in Variability-Intensive Environments: Pitfalls and Best Practices. *IEEE Software*, **2014**, 31, 77-84	1.5	3
99	Past and future of software architectural decisions A systematic mapping study. *Information and Software Technology*, **2014**, 56, 850-872	3.4	50
98	Architectural Debt Management in Value-Oriented Architecting **2014**, 183-204		21
97	Validating and Improving a Knowledge Acquisition Approach for Architectural Decisions. *International Journal of Software Engineering and Knowledge Engineering*, **2014**, 24, 553-589	1	3
96	A Process Framework for Embedded Systems Engineering **2014**,		1
95	Variability in software architecture. *Software Engineering Notes: an Informal Newsletter of the Special Interest Committee on Software Engineering / ACM*, **2014**, 39, 33-34	0.4	3
94	Quantifying software architecture quality report on the first international workshop on software architecture metrics. *Software Engineering Notes: an Informal Newsletter of the Special Interest Committee on Software Engineering / ACM*, **2014**, 39, 32-34	0.4	6
93	Lightweight Evaluation of Software Architecture Decisions **2014**, 157-179		0
92	Key factors for adopting inner source. *ACM Transactions on Software Engineering and Methodology*, **2014**, 23, 1-35	3.3	32
91	Supporting Variability Through Agility to Achieve Adaptable Architectures **2014**, 139-159		4
90	Towards bridging the twin peaks of requirements and architecture. *Software Engineering Notes: an Informal Newsletter of the Special Interest Committee on Software Engineering / ACM*, **2014**, 39, 30-31	0.4	2
89	The use of pattern participants relationships for integrating patterns: a controlled experiment. *Software - Practice and Experience*, **2013**, 43, 807-833	2.5	2
88	Difficulty of Architectural Decisions A Survey with Professional Architects. *Lecture Notes in Computer Science*, **2013**, 192-199	0.9	23

87	Does decision documentation help junior designers rationalize their decisions? A comparative multiple-case study. *Journal of Systems and Software*, **2013**, 86, 1545-1565	3.3	25
86	Application of knowledge-based approaches in software architecture: A systematic mapping study. *Information and Software Technology*, **2013**, 55, 777-794	3.4	46
85	An Embedded Multiple-Case Study on OSS Design Quality Assessment across Domains **2013**,		13
84	Variability in quality attributes of service-based software systems: A systematic literature review. *Information and Software Technology*, **2013**, 55, 320-343	3.4	53
83	Constraints for the design of variability-intensive service-oriented reference architectures An industrial case study. *Information and Software Technology*, **2013**, 55, 428-441	3.4	18
82	Architecture Sustainability [Guest editors' introduction]. *IEEE Software*, **2013**, 30, 40-44	1.5	17
81	A top-down approach to construct execution views of a large software-intensive system. *Journal of Software: Evolution and Process*, **2013**, 25, 233-260	1	7
80	Variability in Web Services **2013**, 269-278		2
79	The Role of Quality Attributes in Service-Based Systems Architecting: A Survey. *Lecture Notes in Computer Science*, **2013**, 200-207	0.9	1
78	Using Pattern-Based Architecture Reviews to Detect Quality Attribute Issues - An Exploratory Study. *Lecture Notes in Computer Science*, **2013**, 168-194	0.9	
77	The supportive effect of patterns in architecture decision recovery A controlled experiment. *Science of Computer Programming*, **2012**, 77, 551-576	1.1	10
76	A documentation framework for architecture decisions. *Journal of Systems and Software*, **2012**, 85, 795-820	3.3	71
75	Qualitative Analysis of the Impact of SOA Patterns on Quality Attributes **2012**,		6
74	A Variability Viewpoint for Enterprise Software Systems **2012**,		5
73	Forces on Architecture Decisions - A Viewpoint **2012**,		19
72	Mature Architecting - A Survey about the Reasoning Process of Professional Architects **2011**,		15
71	Pattern-Based Architecture Reviews. *IEEE Software*, **2011**, 28, 66-71	1.5	14
70	A comparative study of challenges in integrating Open Source Software and Inner Source Software. *Information and Software Technology*, **2011**, 53, 1319-1336	3.4	37

69	A practice-driven systematic review of dependency analysis solutions. *Empirical Software Engineering*, **2011**, 16, 544-586	3.3	22
68	Variability in software architecture. *Software Engineering Notes: an Informal Newsletter of the Special Interest Committee on Software Engineering / ACM*, **2011**, 36, 30-32	0.4	15
67	Defining and documenting execution viewpoints for a large and complex software-intensive system. *Journal of Systems and Software*, **2011**, 84, 1447-1461	3.3	3
66	Advanced quality prediction model for software architectural knowledge sharing. *Journal of Systems and Software*, **2011**, 84, 786-802	3.3	9
65	A top-down strategy to reverse architecting execution views for a large and complex software-intensive system: An experience report. *Science of Computer Programming*, **2011**, 76, 1098-1112	1.1	6
64	The notion of variability in software architecture **2011**,		12
63	Capturing tacit architectural knowledge using the repertory grid technique (NIER track) **2011**,		10
62	Handling Variability in Software Architecture: Problems and Implications **2011**,		15
61	Empirically-grounded reference architectures **2011**,		38
60	Reducing Architectural Knowledge Vaporization by Applying the Repertory Grid Technique. *Lecture Notes in Computer Science*, **2011**, 244-251	0.9	2
59	An Enhanced Architectural Knowledge Metamodel Linking Architectural Design Decisions to other Artifacts in the Software Engineering Lifecycle. *Lecture Notes in Computer Science*, **2011**, 303-318	0.9	12
58	The Importance of Architectural Knowledge in Integrating Open Source Software. *International Federation for Information Processing*, **2011**, 142-158		6
57	Design and Evaluation of a Process for Identifying Architecture Patterns in Open Source Software. *Lecture Notes in Computer Science*, **2011**, 147-163	0.9	3
56	Rationale management challenges in requirements engineering **2010**,		6
55	From collective knowledge to intelligence **2010**,		8
54	. *IEEE Software*, **2010**, 27, 20-24	1.5	24
53	Organizing a software architecture body of knowledge. *Software Engineering Notes: an Informal Newsletter of the Special Interest Committee on Software Engineering / ACM*, **2010**, 35, 37-40	0.4	2
52	On the impact of fault tolerance tactics on architecture patterns **2010**,		12

51	How do architecture patterns and tactics interact? A model and annotation. *Journal of Systems and Software*, **2010**, 83, 1735-1758	3.3	60
50	A comparative study of architecture knowledge management tools. *Journal of Systems and Software*, **2010**, 83, 352-370	3.3	113
49	The GRIFFIN Collaborative Virtual Community for Architectural Knowledge Management **2010**, 195-217		5
48	Collaborative Software Architecting Through Knowledge Sharing **2010**, 343-367		8
47	Mining Relationships between the Participants of Architectural Patterns. *Lecture Notes in Computer Science*, **2010**, 401-408	0.9	1
46	Naive Architecting - Understanding the Reasoning Process of Students. *Lecture Notes in Computer Science*, **2010**, 24-37	0.9	4
45	Implementing Reliability: The Interaction of Requirements, Tactics and Architecture Patterns. *Lecture Notes in Computer Science*, **2010**, 97-122	0.9	7
44	Tools and Technologies for Architecture Knowledge Management **2009**, 91-111		9
43	Constructing a Resource Usage View of a Large and Complex Software-Intensive System **2009**,		2
42	Sharing architecture knowledge through models: quality and cost. *Knowledge Engineering Review*, **2009**, 24, 225-244	2.1	5
41	Towards using architectural knowledge. *Software Engineering Notes: an Informal Newsletter of the Special Interest Committee on Software Engineering / ACM*, **2009**, 34, 27-30	0.4	5
40	VxBPEL: Supporting variability for Web services in BPEL. *Information and Software Technology*, **2009** , 51, 258-269	3.4	82
39	Defining execution viewpoints for a large and complex software-intensive system **2009**,		3
38	An Overview of Software Engineering Approaches to Service Oriented Architectures in Various Fields **2009**,		10
37	Software service engineering: Tenets and challenges **2009**,		12
36	**2009**,		17
35	Enriching software architecture documentation. *Journal of Systems and Software*, **2009**, 82, 1232-1248	3.3	61
34	The GRIFFIN Project: Lessons Learned **2009**, 137-154		3

33	Modeling Architectural Patterns Behavior Using Architectural Primitives. *Lecture Notes in Computer Science*, **2008**, 164-179	0.9	3
32	Analyzing the Actual Execution of a Large Software-Intensive System for Determining Dependencies **2008**,		10
31	Selecting a High-Quality Central Model for Sharing Architectural Knowledge **2008**,		3
30	Wishes and Boundaries for a Software Architecture Knowledge Community **2008**,		13
29	Third international workshop on sharing and reusing architectural knowledge (SHARK 2008) **2008**,		4
28	Architecting as decision making with patterns and primitives **2008**,		11
27	Incorporating fault tolerance tactics in software architecture patterns **2008**,		12
26	Analysis of Architecture Pattern Usage in Legacy System Architecture Documentation **2008**,		13
25	Documenting after the fact: Recovering architectural design decisions. *Journal of Systems and Software*, **2008**, 81, 536-557	3.3	60
24	A catalog of architectural primitives for modeling architectural patterns. *Information and Software Technology*, **2008**, 50, 1003-1034	3.4	21
23	Sharing the Architectural Knowledge of Quantitative Analysis. *Lecture Notes in Computer Science*, **2008**, 220-234	0.9	12
22	Pattern-Driven Architectural Partitioning: Balancing Functional and Non-functional Requirements **2007**,		12
21	Tool Support for Architectural Decisions **2007**,		65
20	. *IEEE Software*, **2007**, 24, 38-45	1.5	98
19	Architectural knowledge and rationale. *Software Engineering Notes: an Informal Newsletter of the Special Interest Committee on Software Engineering / ACM*, **2007**, 32, 41-46	0.4	34
18	Sharing and Reusing Architectural Knowledge--Architecture, Rationale, and Design Intent **2007**,		9
17	Leveraging Architecture Patterns to Satisfy Quality Attributes. *Lecture Notes in Computer Science*, **2007**, 263-270	0.9	25
16	First workshop on sharing and reusing architectural knowledge. *Software Engineering Notes: an Informal Newsletter of the Special Interest Committee on Software Engineering / ACM*, **2006**, 31, 32-36	0.4	40

15	Architectural patterns for collaborative applications. *International Journal of Computer Applications in Technology*, **2006**, 25, 86	0.7	12
14	Modeling architectural patterns using architectural primitives. *ACM SIGPLAN Notices*, **2005**, 40, 133-146	0.2	4
13	Evolution Through Architectural Reconciliation. *Electronic Notes in Theoretical Computer Science*, **2005**, 127, 165-181	0.7	1
12	CRITON: A Hypermedia Design Tool. *Multimedia Tools and Applications*, **2005**, 27, 5-21	2.5	3
11	Modeling architectural patterns using architectural primitives **2005**,		33
10	Agilo: A Highly Flexible Groupware Framework. *Lecture Notes in Computer Science*, **2005**, 49-56	0.9	5
9	Hypermedia design for the mobile era. *International Journal of Mobile Communications*, **2004**, 2, 271	1.2	3
8	Modeling learning technology systems as business systems. *Software and Systems Modeling*, **2003**, 2, 120-133	1.9	1
7	An Architecture for Open Learning Management Systems. *Lecture Notes in Computer Science*, **2003**, 183-200	2.9	8
6	Web engineering: new discipline, new educational challenges. *Information Services and Use*, **2000**, 20, 95-108	0.5	1
5	Understanding software architecture erosion: A systematic mapping study. *Journal of Software: Evolution and Process*,	1	0
4	A metric for quantifying the ripple effects among requirements. *Software Quality Journal*,1	1.2	
3	The temporality of technical debt introduction on new code and confounding factors. *Software Quality Journal*,1	1.2	1
2	Modelling Web-Based Instructional Systems. *Journal of Information Technology Education:Research* ,1, 025-042		4
1	On the relation between architectural smells and source code changes. *Journal of Software: Evolution and Process*,e2398	1	