

Full Included Literature in MLR

White Literature			
Paper ID	Paper Title	Author(s)	Year
S1_ACM_01	Software security activities that support incident management in secure DevOps	Jaatun	2018
S1_ACM_02	Putting the sec in DevSecOps: using social practice theory to improve secure software development	Ashenden & Ollis	2020
S1_ACM_03	DevOps for better software security in the cloud: invited paper	Jaatun, Cruzes & Luna	2017
S1_ACM_04	A systems-of-systems security framework for requirements definition in cloud environment	Carturan & Goya	2019
S1_ACM_05	Towards a hypothetical framework to secure DevOps adoption: grounded theory approach	Rafi, Yu & Akbar	2020
S1_ACM_06	Security smells in Ansible and Chef scripts: a replication study	Rahman et al.	2021
S1_ACM_07	Implementing DevOps practices in highly regulated environments	Morales, Yasar & Volkman	2018
S1_ACM_08	A continuous certification methodology for DevOps	Anisetti et al.	2019
S1_ACM_09	Security impacts of sub-optimal DevSecOps implementations in a highly regulated environment	Morales et al.	2020
S1_ACM_15	A DevOps framework for quality-driven self-protection in web software systems	Beigi-Mohammadi et al.	2018
S1_ACM_30	Challenges in adopting continuous delivery and DevOps in a globally distributed product team: a case study of a healthcare organization	Gupta et al.	2019
S1_ACM_45	“Hopefully we are mostly secure”: views on secure code in professional practice	Lopez et al.	2019
S1_ACM_49	Keeping continuous deliveries safe	Vost & Wagner	2017
S1_ACM_50	Closing the feedback loop between UX design, software development, security engineering, and operations	Nguyen & Dupuis	2019
S1_ACM_52	Secure container orchestration in the cloud-policies and implementation	Fernandez & Brito	2019
S1_ACM_53	Continuous development and testing of access and usage control: a systematic literature review	Daoudagh, Lonetti & Marchetti	2020
S1_ACM_59	Self-healing multi-cloud application modeling	Rios, Iturbe & Palacios	2017
S1_ACM_64	Aligning security objectives with agile software development	Rindell, Hyrynsalmi & Leppänen	2018
S1_ACM_66	Integrating continuous security assessments in microservices and cloud native applications	Torkura, Sukmana & Meinel	2017
S1_ACM_68	Rule-based security management system for data-intensive applications	Rouf et al.	2019
S1_ACM_69	Inspection guidelines to identify security design flaws	Tuma et al.	2019
S1_ACM_71	Towards Omnia: a monitoring factory for quality-aware DevOps	Miglierina & Tamburri	2017
S1_ACM_72	Monitoring-aware IDEs	Winter et al.	2019
S1_ACM_76	UML-driven automated software deployment	Rivera, Villegas & Tamura	2018
S1_ACM_81	Research for practice: the DevOps phenomenon	Wiedemann et al.	2019
S1_ACM_89	Architecture interoperability and repeatability with microservices: an industry perspective	Yuan	2019
S1_ACM_95	Trade-offs in continuous integration-assurance, security, and flexibility	Hilton, Nelson & Tunnell	2017
S1_ACM_99	Continuous integration and delivery for HPC: using Singularity and Jenkins	Sampedro, Holt & Hauser	2018
S1_IEEE_01	SecDevOps: Is it a marketing buzzword?-Mapping research on security in DevOps	Mohan & Othmane	2016

S1_IEEE_02	Rethinking secure DevOps threat modeling: the need for a dual velocity approach	Valani	2018
S1_IEEE_03	A new project management tool based on DevSecOps	Duclervil & Zunnurhain	2019
S1_IEEE_04	Preliminary findings about DevSecOps from grey literature	Mao et al.	2020
S1_IEEE_05	Integrating security with DevSecOps: techniques and challenges	Ahmed & Francis	2019
S1_IEEE_06	An empirical study on culture, automation, measurement and sharing of DevSecOps	Tomas, Li & Huang	2019
S1_IEEE_07	Compliance at velocity within a DevOps environment	Abrahams & Langerman	2018
S1_IEEE_08	Prioritization based taxonomy of DevOps security challenges Using PROMETHEE	Rafi et al.	2020
S1_IEEE_09	Continuously integrating security	Williams	2018
S1_IEEE_10	Continuous security testing: a case study on integrating dynamic security testing Tools in CI/CD pipelines	Rangnau et al.	2020
S1_IEEE_11	Mitigating an oxymoron: compliance in a DevOps environments	Michener & Clager	2016
S1_IEEE_12	Software security in DevOps: synthesizing practitioners' perceptions and practices	Ur Rahman & Williams	2016
S1_IEEE_13	Exploiting DevOps practices for dependable and secure continuous delivery pipelines	Düllmann, Paule & Hoorn	2018
S1_IEEE_15	BP: security concerns and best practices for automation of software deployment processes an industrial case study	Mohan, Othmane & Kres	2018
S1_IEEE_16	Dynamic security assurance in multi-cloud DevOps	Rios et al.	2017
S1_IEEE_17	Challenges and approaches for the assessment of micro-service architecture deployment alternatives in DevOps: a tutorial presented at ICSA 2020	Avritzer	2020
S1_IEEE_18	XI commandments of Kubernetes security: a systematization of knowledge related to Kubernetes security practices	Shamim, Bhuiyan & Rahman	2020
S1_IEEE_20	Characteristics of defective infrastructure as code scripts in DevOps	Rahman	2018
S1_IEEE_21	Major challenges of systems-of-systems with cloud and DevOps: a financial experience report	Caraturan & Goya	2019
S1_IEEE_22	Usability testing within a DevSecOps environment	Burkard	2020
S1_IEEE_24	Francois Raynaud on DevSecOps	Carter	2017
S1_IEEE_25	Cloud ecosystems support for Internet of Things and DevOps using patterns	Syed & Fernandez	2016
S1_IEEE_26	Self-service cybersecurity monitoring as enabler for DevSecOps	Diaz et al.	2019
S1_IEEE_28	The seven sins: security smells in infrastructure as code scripts	Rahman, Parnin & Williams	2019
S1_IEEE_29	Reframing security in contemporary software development life cycle	Frijns, Bierwolf & Zijderhand	2018
S1_IEEE_30	Towards automated security design flaw detection	Sion et al.	2019
S1_IEEE_31	Enhancing security of Docker using Linux hardening techniques	Raj MP et al.	2016
S1_IEEE_33	Continuous compliance model for hybrid multi-cloud through self-service orchestrator	Rompicharla & Reddy P.V	2020
S1_IEEE_34	Towards model-based continuous deployment of secure IoT systems	Ferry & Nguyen	2019
S1_IEEE_36	Design as code: facilitating collaboration between usability and security engineers using CAIRIS	Faily & Iacob	2017
S1_IEEE_38	A framework for managing mission needs, compliance, and trust in the DevOps environment	B.S. Farroha & D.L. Farroha	2014
S1_IEEE_39	Architectural risk analysis in agile development of cloud software	Jaatun	2019
S1_IEEE_40	MUSA deployer: deployment of multi-cloud applications	Casola et al.	2017
S1_IEEE_41	Test automation process improvement in a DevOps team: experience report	Wang, Pyhajarvi & Mantyla	2020

S1_IEEE_42	Embedding security and privacy into the development and operation of cloud applications and services	Thanh et al.	2016
S1_IEEE_43	Modeling and analysis of dependencies between microservices in DevSecOps	McZara, Kafle & Shin	2020
S1_IEEE_44	Leveraging SecDevOps to tackle the technical debt associated with cybersecurity attack tactics	Izurrieta & Prouty	2019
S1_IEEE_52	Insights from SONATA: implementing and integrating a microservice-based NFV service platform with a DevOps methodology	Soenen et al.	2018
S1_IEEE_54	Continuous testing and deployment for urban air mobility	Johnson et al.	2020
S1_IEEE_55	A tale of two systems: using containers to deploy HPC applications on supercomputers and clouds	Younge et al.	2017
S1_IEEE_57	Metrics to meet security & privacy requirements with agile software development methods in a regulated environment	Wagner & Ford	2020
S1_IEEE_61	The never-ending story: on the need for continuous privacy impact assessment	Sion, Landuyt & Joosen	2020
S1_IEEE_67	Towards multi-party policy-based access control in federations of cloud and edge microservices	Preuveneers & Joosen	2019
S1_IEEE_71	Vulnerabilities in continuous delivery pipelines: a case study	Paule, Dullmann & Hoorn	2019
S1_IEEE_84	Microservices in industry: insights into technologies, characteristics and software quality	Bogner et al.	2019
S1_IEEE_86	Highly-distributed systems based on microservices and their construction paradigms	Luntovskyy & Shubyn	2020
S1_SC_01	DevOps, DevSecOps, AIOps: paradigms to IT operations	Sen	2021
S1_SC_02	DevSecOps: a multivocal literature review	Myrbakken & Colomo-Palacios	2017
S1_SC_03	DevSecOps metrics	Prates et al.	2019
S1_SC_04	Security as culture: a systematic literature review of DevSecOps	Sánchez-Gordón & Colomo-Palacios	2020
S1_SC_05	DevOps for better software security in the cloud	Jaatun, Cruzes & Luna	2017
S1_SC_06	Security assurance in DevOps methodologies and related environments	Siewruk, Mazurczyk & Kapiński	2019
S1_SC_07	A cloud SecDevOps methodology: from design to testing	Casola et al.	2020
S1_SC_08	Modeling continuous security: a conceptual model for automated DevSecOps using open-source software over cloud (ADOC)	Kumar & Goyal	2020
S1_SC_09	Performance analysis of automation monitoring system shifting from DevOps to DevSecOps	Kiran & Raju	2020
S1_SC_10	Integration of security standards in DevOps pipelines: an industry case study	Moyon et al.	2020
S1_SC_11	Dealing with security in a real DevOps environment	Larrucea, Berreteaga & Santamaria	2019
S1_SC_12	AWS infrastructure automation and security prevention using DevOps	Vignesh & Kanna	2020
S1_SC_14	A secure cloud service deployment framework for DevOps	Rao & Sucharita	2020
S1_SC_15	Emerging trends, challenges, and experiences in DevOps and microservice APIs	Zdun, Wittern & Leitner	2020
S1_SC_17	The software architect and DevOps	Bass	2017
S1_SC_18	Building a virtually air-gapped secure environment in AWS with principles of devops security program and secure software delivery	Zheng, Gates-Idem & Lavin	2017
S1_SC_19	Building an open-source cross-cloud DevOps stack for a CRM enterprise	Schork et al.	2019

	application: a case study		
S1_SC_20	Creating it from SCRATCH: a practical approach for enhancing the security of IoT-systems in a DevOps-enabled software development environment	Anton et al.	2020
S1_SC_21	Identification and prioritization of DevOps success factors using fuzzy-AHP approach	Akbar et al.	2020
S1_SC_22	A novel security-by-design methodology: modeling and assessing security by SLAs with a quantitative approach	Casola et al.	2020
S1_SC_25	A security and privacy-preserving path for enhancing information systems that manage cross-cloud applications	Verginadis et al.	2020
S1_SC_26	Security controls in infrastructure as code	Almuairfi & Alenezi	2020
S1_SC_27	Maintaining a balance between agility and security in the cloud	Dyess	2019
S1_SC_28	Software product quality in DevOps contexts: a systematic literature review	Céspedes et al.	2020
S1_SC_29	Developing self-adaptive microservice systems: challenges and directions	Mendonça et al.	2021
S1_SC_31	Continuous software engineering and beyond: trends and challenges	Fitzgerald & Stol	2014
S1_SC_32	Recent progress in software security	Amoroso	2017
S1_SC_33	A systematic mapping study of infrastructure as code research	Rahman, Mahdavi-Hezaveh & Williams	2019
S1_SC_34	Docker ecosystem: vulnerability analysis	Martin et al.	2018
S1_SC_36	Architecture-based automated updates of distributed microservices	Boyer et al.	2018
S1_SC_38	Micro-segmentation: securing complex cloud environments	Klein	2019
S1_SC_40	Development and operation of trustworthy smart IoT systems: the ENACT framework	Ferry et al.	2020
S1_SC_41	The agile RAMSS lifecycle for the future	Myklebust et al.	2019
S1_SC_42	Latest image recommendation method for automatic base image update in dockerfile	Kitajima & Sekiguchi	2020
S1_SC_44	Towards model-driven infrastructure provisioning for multiple clouds	Sandobalin, Insfran & Abrahao	2019
S1_SC_45	Forensic analysis of Docker swarm cluster using Grr rapid response framework	Sunardi, Riadi & Sugandi	2019
S1_SC_48	Use of containers for high-performance computing	Medrano-Jaimes et al.	2019
S1_SC_49	Threat analysis of software systems: a systematic literature review	Tuma, Calikli & Scandariato	2018
S2_ACM_04	Challenges in adopting continuous delivery and DevOps in a globally distributed product team-a case study of a healthcare organization	Gupta et al.	2019
S2_ACM_05	Understanding similarities and differences in software development practices across domains	Vigiato et al.	2019

Grey Literature

Paper ID	Source Track	Author(s)	Year
S1_GL_01	https://www.scaledagileframework.com/devops/	NA	NA
S1_GL_02	https://pvs-studio.com/en/blog/posts/0710/	Ekaterina Nikiforova	2020
S1_GL_03	https://www.openshift.com/blog/devops-vs-devsecops-heres-how-they-fit-together	Michael Foster	2021
S1_GL_04	https://www.redhat.com/en/topics/devops/what-is-devsecops	NA	NA
S1_GL_05	https://securityboulevard.com/2020/08/devops-vs-devsecops-what-is-the-difference/	Ayush Singh	2020
S1_GL_06	https://www.microsoft.com/en-us/securityengineering/devsecops	NA	NA
S1_GL_07	https://www.pmi.org/disciplined-agile/process/security	NA	NA

S1_GL_08	https://www.apdynamics.com/blog/product/devops-vs-devsecops/	Christy Maerz	2021
S1_GL_09	https://www.invensislearning.com/blog/devops-vs-devsecops/#What_is_DevSecOps	Ethan Miller	2019
S1_GL_10	https://snyk.io/devsecops/	NA	NA
S1_GL_11	https://www.csoonline.com/article/3245748/what-is-devsecops-developing-more-secure-applications.html	Lucian Constantin	2020
S1_GL_12	https://www.bmc.com/blogs/devops-devsecops/	Kirstie Magowan	2020
S1_GL_13	https://www.clouddefense.ai/blog/devops-vs-devsecops-the-differences	Mark Preston	2020
S1_GL_14	https://www.ibm.com/cloud/architecture/architectures/secure-devops-arch/	Mike Spisak & James Darwin	NA
S1_GL_15	https://www.imperva.com/learn/application-security/devsecops-devops-security/	NA	NA
S1_GL_16	https://www.lassian.com/devops/devops-tools/devsecops-tools	Kev Zettler	2021
S1_GL_17	https://www.cyberark.com/what-is/devops-security/	NA	NA
S1_GL_18	https://cloud.google.com/architecture/devops/devops-tech-shifting-left-on-security	NA	2021
S1_GL_19	https://hdivsecurity.com/bornsecure/devsecops-the-7-key-factors-to-secure-your-devops-practice/	Roberto Velasco	2020
S1_GL_20	https://www.veritis.com/blog/devops-security-an-overview-of-challenges-and-best-practices/	NA	NA
S1_GL_21	https://newrelic.com/blog/best-practices/what-is-secdevops	Isaac Eldridge	2018
S1_GL_22	https://www.infoq.com/articles/evolve-devops-devsecops/	Sam Bocetta	2019
S1_GL_23	https://blog.pentesteracademy.com/devsecops-learning-path-integrating-security-with-devops-1cc0367052f	Pentester Academy	2021
S1_GL_24	https://phoenixnap.com/blog/devops-security-best-practices	Bojana Dobran	2019
S1_GL_25	https://codedx.com/blog/how-to-join-devops-and-security-best-practices-in-devsecops/	NA	NA
S1_GL_26	https://www.sumologic.com/insight/devsecops-rugged-devops/	Sumo Logic	2019
S1_GL_27	https://www.forcepoint.com/cyber-edu/devsecops	NA	NA
S1_GL_28	https://www.ccsinet.com/blog/devops-security-challenges/	Gilad Maayan	NA
S1_GL_29	https://snyk.io/learn/devops-security	Anna Uss	2021
S1_GL_30	https://www.scalyr.com/blog/devopssec-challenges/	NA	2019
S1_GL_31	https://6point6.co.uk/insights/why-security-testing-should-be-a-part-of-the-devops-process/	NA	NA
S1_GL_32	https://www.threatstack.com/blog/how-to-integrate-security-into-a-devops-world	Pete Cheslock	NA
S1_GL_33	https://www.padok.fr/en/blog/devsecops-security	Lucas Terquem	2020
S1_GL_34	https://www.anitian.com/closer-than-you-think-bridging-the-devops-security-gap/	Chris Brimhall	2019
S1_GL_35	https://blog.cherryservers.com/from-devops-to-devsecops-securing-the-cicd-pipeline	Marius Rimkus	2020
S1_GL_36	https://www.securityroundtable.org/to-improve-devops-and-security-the-time-has-come-to-shift-left/	Fred Reimer	NA
S1_GL_37	https://www.dataversity.net/why-is-it-such-a-challenge-to-integrate-security-into-devops/#	Anastasios Arampatzis	2021
S1_GL_38	https://datafloq.com/read/from-devops-devsecops-security-challenges/6745	Ilai Bavati	2019
S1_GL_39	https://www.devopsdigest.com/overcoming-the-top-3-devops-security-challenges	Ramachandra Annadi	2020
S1_GL_40	https://www.exabeam.com/information-security/devsecops-and-the-security-challenge	Shahar Ben-Hador	2019

	ges-of-devops/		
S1_GL_41	https://victorops.com/blog/devsecops-the-intersection-of-devops-and-security	Marlo Vernon	2019
S1_GL_42	https://levelup.gitconnected.com/top-15-devsecops-tools-for-an-enterprise-ci-cd-pipeline-bd865b47ed5f	Tj Blogumas	2020