REFERENCES

1   G. Mazlami, J. Cito and P. Leitner, "Extraction of Microservices from Monolithic Software Architectures - IEEE Conference Publication", Ieeexplore.ieee.org, 2017. [Online]. Available: http://ieeexplore.ieee.org/document/8029803/.

2   P. Di Francesco, I. Malavolta and P. Lago, "Research on Architecting Microservices: Trends, Focus, and Potential for Industrial Adoption - IEEE Conference Publication", Ieeexplore.ieee.org, 2017. [Online]. Available: http://ieeexplore.ieee.org/document/7930195/.

3   Z. Bloom, "How We Deploy 300 Times a Day", product.hubspot.com, 2017. [Online]. Available: http://product.hubspot.com/blog/how-we-deploy-300-times-a-day.

4   "Microservices Pattern: Monolithic Architecture pattern", microservices.io, 2017. [Online]. Available: http://microservices.io/patterns/monolithic.html.

5   V. Heorhiadi, S. Rajagopalan, H. Jamjoom, M. Reiter and V. Sekar, "Gremlin: Systematic Resilience Testing of Microservices - IEEE Conference Publication", Ieeexplore.ieee.org, 2017. [Online]. Available: http://ieeexplore.ieee.org/document/7536505/.

6   M. Fowler and T. Clemson, "Testing Strategies in a Microservice Architecture", martinfowler.com, 2017. [Online]. Available: https://martinfowler.com/articles/microservice-testing.

7   "Pact Foundation", GitHub, 2017. [Online]. Available: https://github.com/pact-foundation.

8   S. Neuman, Building Microservices: Designing Fine-Grained Systems. O'Reilly Media, February 2015.

9   J. Humble and D. Farley, Continuous Delivery: Reliable Software Releases through Build, Test, and Deployment Automation, 1st ed. Addison-Wesley Professional, July 2010.

10   P. M. Duvall, S. Matyas, and A. Glover, Continuous Integration:Improving Software Quality and Reducing Risk, 1st ed. AddisonWesley Professional, June 2007.

11   J. Fields, Working effectively with unit tests, 1st ed. CreateSpace Independent Publishing Platform, 2014.

12   M. Noback, Microservices for everyone, 1st ed. Leanpub, 2017, pp. 48-71, 75-87, 119-141.

13   I. Nadareishvili, R. Mitra, M. McLarty and M. Amundsen, *Microservice Architecture Aligning Principles, Practices, and Culture*, 1st ed. O'Reilly, 2016, pp. 5-8, 13-20, 103-110. [Design architecture]

14   J. Bonér, Reactive Microservices Architecture Design Principles for Distributed Systems, 1st ed. O'Reilly, 2016, pp. 8-22, 32-38.

15   D. Taibi, V. Lenarduzzi and C. Pahl, "Architectural Patterns for Microservices: A Systematic Mapping Study.", in 8th International Conference on Cloud Computing and Services Science, Funchal, Madeira, Portugal, 2018, pp. 221-227.

16   M. Fowler, "bliki: TestDouble", martinfowler.com, 2017. [Online]. Available: https://martinfowler.com/bliki/TestDouble.html.

17   G. Meszaros, XUnit test patterns, 1st ed. Upper Saddle River, NJ: Addison-Wesley, 2012, pp. 256-341. For test doubles

18   Y. Park and S. Sharma, "Providing Service Using A Virtualization Infrastructure", Journal of Service Science (JSS), vol. 2, no. 2, pp. 17-22, 2009. Available: 10.19030/jss.v2i2.4283.

19   S. Upadhyay and A. Acharya, "Testing Service-Oriented Applications using Service Virtualization", pp. 1-3, 2015.

20   "WireMock",*WireMock*, 2018. [Online]. Available: http://wiremock.org/.

21   "What is Hoverfly? — Hoverfly v1.3.1 documentation",*Docs.hoverfly.io*, 2018. [Online]. Available: https://docs.hoverfly.io.

22   Day, P., 2014. n-Tiered Test Automation Architecture for Agile Software Systems. *Procedia Computer Science*, 28, pp.332-339.

23   F. Vera-Rivera, "A development process of enterprise applications with microservices", Journal of Physics: Conference Series, vol. 1126, p. 012017, 2018. Available: 10.1088/1742-6596/1126/1/012017.

24   C. Fetzer, "Building Critical Applications Using Microservices", *IEEE Security & Privacy*, vol. 14, no. 6, pp. 86-89, 2016. Available: 10.1109/msp.2016.129.

25   Taibi, Davide & Lenarduzzi, Valentina & Pahl, Claus & Janes, Andrea. (2017). Microservices in agile software development: a workshop-based study into issues, advantages, and disadvantages. 1-5. 10.1145/3120459.3120483.

26   A. Sundar, "AN INSIGHT INTO MICROSERVICES TESTING STRATEGIES", *Infosys.com*, 2018. [Online]. Available: https://www.infosys.com/services/it-services/validation-solution/white-papers/documents/microservices-testing-strategies.pdf.

27   Soldani, Jacopo & Tamburri, Damian & Heuvel, Willem-Jan. (2018). The Pains and Gains of Microservices: A Systematic Grey Literature Review. Journal of Systems and Software. 146. 10.1016/j.jss.2018.09.082.

28   A. Brogi, D. Neri and J. Soldani, "A microservice-based architecture for (customisable) analyses of Docker images", *Software: Practice and Experience*, vol. 48, no. 8, pp. 1461-1474, 2018. Available: 10.1002/spe.2583.

29   LI, Y., LI, Y. and WANG, D., 2018. Design of Reading Platform Based on Microservice Architecture. *DEStech Transactions on Computer Science and Engineering*, (iece).

30   Kholy, M. and Fatatry, A., 2019. Framework for Interaction Between Databases and Microservice Architecture. *IT Professional*, 21(5), pp.57-63.

31   P. Vincent, "Integration tests don't cut it for microservices. Here's what does. | TechBeacon", *TechBeacon*, 2019. [Online]. Availa-

ble:https://techbeacon.com/app-dev-testing/integration-tests-dont-cut-it-microservices-heres-what-does.

32 Hu, Y., de Laat, C. and Zhao, Z., 2019. Optimizing Service Placement for Microservice Architecture in Clouds. *Applied Sciences*, 9(21), p.4663.

33 D. Rajput and Rajesh R V, *Building microservices with Spring*, 1st ed. Packt, 2016, pp. 371-380.

34 GOU, L., CHEN, Q., LIANG, J. and LIAO, X., 2019. Technical Research and Application Analysis of Microservice Architecture. *DEStech Transactions on Computer Science and Engineering*, (iccis).

35 Barabanov, A. and Makrushin, D., 2020. Authentication and Authorization in Microservice-Based Systems: Survey of Architecture Patterns. *Voprosy kiberbezopasnosti*, (4(38), pp.32-43.

36 N. Raychev, "Test automation in microservice architecture", *Ieeesem.com*, 2020.   [Online].   Available: http://www.ieeesem.com/researchpaper/Test_automation_in_microservice_architecture.pdf.

37 R. Stein, "Message Pact - Contract testing in event-driven applications", *codecentric   AG   Blog*,   2020.   [Online].   Available: https://blog.codecentric.de/en/2019/11/message-pact-contract-testing-in-event-driven-applications.

38 F. Rosner, "Implementing a Pact workflow with Pact Broker and Gitlab CI", *codecentric   AG   Blog*,   2020.   [Online].   Available: https://blog.codecentric.de/en/2020/02/implementing-a-consumer-driven-contract-testing-workflow-with-pact-broker-and-gitlab-ci

39 "Home - OpenAPI Initiative", *OpenAPI Initiative*, 2017. [Online]. Available: https://www.openapis.org/.

40 T. Otwell, "Validation - Laravel - The PHP Framework For Web Artisans", *Laravel.com*,   2021.   [Online].   Available: https://laravel.com/docs/8.x/validation.

41 N. El Ioini, "S-Test: A Framework for Services Test-ing", *https://www.researchgate.net/*, 2015. [Online]. Available: https://www.researchgate.net/publication/300337281_S-Test_A_Framework_for_Services_Testing.

42 X. Bai, S. Lee, W. Tsai and Y. Chen, "Ontology-Based Test Modeling and Partition Testing of Web Services", *https://www.researchgate.net*, 2008. [Online]. Available: https://www.researchgate.net/publication/221587173_Ontology-Based_Test_Modeling_and_Partition_Testing_of_Web_Services.

43 Z. Zheng and M. Lyu, "Optimal Fault Tolerance Strategy Selection for Web Services", *International Journal of Web Services Research*, vol. 7, no. 4, pp. 21-40, 2010.

44 N. Dharmaji, "A Study of Containerization as a Micro service Deployment Model", *International Journal for Research in Applied Science and Engineering Technology*, vol. 8, no. 5, pp. 1365-1367, 2020.

45 C. K., "A Systematic Study of Micro Service Architecture Evolution and their Deployment Patterns", *International Journal of Computer Applications*, vol. 182, no. 29, pp. 18-24, 2018.

46 A. Balalaie, A. Heydarnoori, P. Jamshidi, D. Tamburri and T. Lynn, "Micro-services migration patterns", *Software: Practice and Experience*, 2018.

47 M. Bozkurt, M. Harman and Y. Hassoun, "Testing and verification in service-oriented architecture: a survey", *Software Testing, Verification and Reliability*, vol. 23, no. 4, pp. 261-313, 2012.

48 G. Beydoun, D. Xu and V. Sugumaran, "Service Oriented Architectures (SOA) Adoption Challenges", *International Journal of Intelligent Information Technologies*, vol. 9, no. 2, pp. 1-6, 2013.

49 R. Evans, N. Alshuqayran and N. Ali, "Towards Micro Service Architecture Recovery: An Empirical Study", *https://www.researchgate.net*, 2018. [Online]. Available: https://www.researchgate.net/publication/324503215_Towards_Micro_Service_Architecture_Recovery_An_Empirical_Study.

50 R. O'Connor, P. Elger and P. Clarke, "Continuous software engineering-A mi-
croservices architecture perspective", *Journal of Software: Evolution and Process*, vol. 29, no. 11, p. e1866, 2017.