

## Unit 8: Data Structures and Data Search in Practice

The reading this week focusses on the design of algorithms in Python.

### Required Reading

Philips, D. (2018) *Python 3 Object-Oriented programming*. 3rd ed. Packt Publishing.

- Chapters 6 and 12.

Kuk, K., Milic, P., Spalević, P. & Gocic, M. (2019) Algorithm design in Python for cybersecurity. Electrotechnical and Computer Science Conference.

Fortino, G., Guerrieri, A., Russo, W. & Savaglio, C. (2015) Towards a Development Methodology for Smart Object-Oriented IoT Systems: A Metamodel Approach. 2015 IEEE International Conference on Systems, Man, and Cybernetics. 1297-1302. DOI: 10.1109/SMC.2015.231.

Ramos, L. P. (2020) The Python return Statement: Usage and Best Practices. Real Python.

### Additional Reading

Anon (n.d) 8. Errors and Exceptions.

VanTol, A. (2018) Python Code Quality: Tools & Best Practices. Real Python.

Anon (n.d) pylint 2.12.2.