Coding Style Guidelines

As we develop our codebase within the NLP-TLP Group, it is important to maintain a high standard of code quality such that our source code is written with a consistent style and a high coding standard. This ensures that our code is maintainable, easily understood and interpreted for seamless collaboration with team members, as well as readily adopted by industry partners. This document outlines the recommended coding style and includes a link to a "linter" for each programming language.

Python

Recommended coding style for **Python** is based on the Google Python Style Guide, derived from PEP-8. Available at:
https://google.github.io/styleguide/pyguide.html

Linting tool for **Python** is pylint. Available at:
https://pypi.org/project/pylint/

- To configure pylint to adhere to the Google Python Style Guide, download the pylintrc file from https://google.github.io/styleguide/pylintrc, and place it in the root directory of your project.

JavaScript

Recommended coding style for **JavaScript** is based on the JavaScript Standard Style. Available at:
https://standardjs.com/

Linting tool for **JavaScript** is standard.

- Installation instructions: https://standardjs.com/#install
- Usage instructions: https://standardjs.com/#usage

R

Recommended coding style for **R** is based on the Google's R Style Guide. Available at:
https://google.github.io/styleguide/Rguide.html

Linting tool for **R** is lintr. Available at:
https://github.com/jimhester/lintr

MATLAB

Recommended coding style for **MATLAB** is based on the MATLAB Style Guidelines 2.0. Available at:
https://www.mathworks.com/matlabcentral/fileexchange/46056-matlab-style-guidelines-2-0

Linter for **MATLAB** is mlint. Available at:
https://www.mathworks.com/help/matlab/ref/mlint.html

Coding Style Guidelines

Julia

Recommended coding style for **Julia** is based on the Julia Style Guide.
Available at: https://docs.julialang.org/en/v1/manual/style-guide/

Linter for **Julia** is linter-julia. Available at: https://atom.io/packages/linter-julia

Summary

The table below summarises the preferred coding style guides and linters for each language.

Language	Style Guide	Linter
Python	Google Python Style Guide	pylint
JavaScript	JavaScript Standard Style	standard
R	Google's R Style Guide	lintr
MATLAB	MATLAB Style Guidelines 2.0	mlint
Julia	Julia Style Guide	linter-julia

If you have any difficulty using the linters mentioned above or are using a language that is not listed, please feel free to contact Michael Stewart (michael.stewart@uwa.edu.au).

The coding style guidelines in this document were adapted from those of the Centre for Transforming Maintenance through Data Science (CTMTDS).