

## APPENDIX – MATLAB-FILES

Matlab-files developed in the analysis of the generic floating bridge are included electronically herein.

These are constructed in the development of the finite element formulation of the floating bridge.

Scripts for the modelling of one-dimensional and directional JONSWAP wave spectrums are included. Surface elevation scripts are developed to express different configurations of the sea surface.

The formulations for the structural properties and the incorporated hydrostatic and hydrodynamic interaction effects on the model are expressed. The connectivity and transformation matrices express the assembly of the complete bridge model.

Scripts for various tasks of the modelling are also included. These include the Eigenvalue analyses, the frequency response analyses, and the development of the hydrodynamic transfer functions and response functions and functions for development of the corresponding coherence and phase plots.