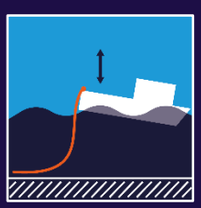
MO4 Module overview

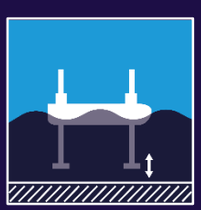
Vessel Motion Module | VM-01

The basic MO4 module enabling the user to obtain motion forecasts of all 6 degrees of freedom (surge, sway, heave, roll, pitch & yaw). Each MO4 system is equipped with the VM-01 module and the Siri motion sensor to allow for both forecasting & monitoring. Standard output includes motions and criteria checks.



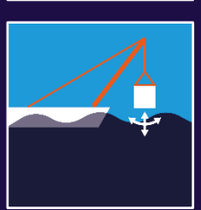
Cable Lay Modules | CL-01 & CL-02

The CL01 & CL-02 modules allows the user to optimise their array cable and export cable laying operations. The inter array cable module provides an overlay of all the links, enabling the user to conveniently select the links planned for installation. The export cable enables forecasting along a route. Both modules have proven to reduce cable lay weather downtime.



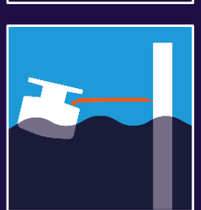
Jack-up Module | JU-01

The JU-01 module enables the user to assess the impact velocity of the legs during jacking operations. In many cases the seabed contact moment has the governing wave criteria and therefore have significant impact on workability. Enabling the user to accurately assess the forecasted impact will increase jack-up unit utilisation.



Heavy Lift Modules | HL-01 & (HL-02)

The HL-01 and HL-02 modules enable the user to forecast vessel and suspended cargo motions. Crane hook load as well as the loads on a set of tugger lines and side-lead angles are part of the output. This module works with a 12 degree of freedom (3 translations and 3 rotations of the vessel and the cargo). The HL-02 may include a heave compensation system and can be adjusted to client needs.

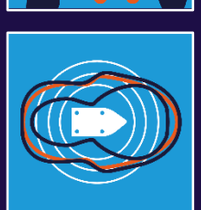


Personnel Transfer Modules | PT-01 & (PT-02) – *under development*

The PT-01 and PT-02 modules have been developed to analyse the motions of a gangway (or manipulated articulated arm for the PT-02) on a vessel during transfer operations. It enables a significant increase in workability and present clear forecast of gangway motion amplitudes and power requirements

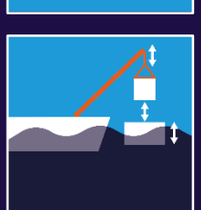
Routing & Transit Modules | RT-01 & (RT-02)

The RT-01 module enables the user to define a route along which the vessel will sail. It will present the vessel motions along the route. The RT-02 module also enables to plot the utilisation of cargo and it's sea fastening. Based on pre-defined criteria is will assess the stress utilisation based on motions, gravity and wind loads.



Dynamic Positioning | DP-01 & (DP-02) – *under development*

The DP-01 module will assess the utilisation of each individual DP thruster over the coming days as a function of the vessel heading. It calculates based on the wave loads, wave drift forces, current loads and wind loads the mean station keeping thrust requirements and compares it to the maximum sustained thrust capability. DP-02 will assess offset but is still under development.



Relative Motion | RM-01 – *under development*

The relative motion unit presents the relative vertical motions between a heavy lift crane hook and a point on a barge floating next to it. It is based on a full multibody hydrodynamics code that accounts for diffracted waves of the 2 vessel influencing each other. A powerful tool to support the strongly weather governed lifting from barge operation.

Other Modules | ?

Please let us know which operation you would like us to review for a new module development. We strive to offer a high level of service and hope to be able to prepare a user specific module for your operation.

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