# METHOD FOR SIMULATING FUEL CONSUMPTION USING HORSEPOWER INCREASE RATE OBTAINED IN CONSIDERATION OF FRICTIONAL RESISTANCE OF HULL, AND PROGRAM AND SYSTEM FOR EXECUTING THE SAME


## ABSTRACT

Provided is a simulation method that is improved from a conventional method and can estimate a fuel consumption and/or CII rating of a vessel at an arbitrary time point and a change in fuel consumption and/or CII rating of the vessel in an arbitrary period.

A simulation method including a step of estimating a fuel consumption and/or CII rating of a vessel in consideration of a horsepower increase rate ($PIR_r$) due to hull roughness and a horsepower increase rate ($PIR_f$) due to hull fouling at an arbitrary time point or in an arbitrary period, the simulation method including: summing the separately determined $PIR_r$ and $PIR_f$ to obtain a total horsepower increase rate ($PIR_a$), and then finally estimating the fuel consumption and/or CII rating based on the total horsepower increase rate ($PIR_a$)


Fig. 3