Steering Tests at Sea Trials

Amended Guidance

Guidance for the Survey and Construction of Steel Ships Part B

Reason for Amendment

SOLAS II-1/Reg.29 stipulates that it is to be verified through tests during sea trials that the main steering gear of a ship is capable at the ship's deepest seagoing draught of rudder action from 35° on one side of the ship to 35° on the opposite side. It is to also be verified, under the same conditions, that the ship is capable of rudder action from 35° on either side of the ship to 30° on the opposite side in not more than 28 seconds.

However, for some bulk carriers and large container carriers it may be difficult in practice to verify such rudder action under conditions equivalent to the deepest seagoing draught. Typically in such cases, compliance with Regulation 29 is verified through performance tests under conditions in which the rudder is immersed as deeply as possible subject to the confirmation of sufficient rated torque and hydraulic pump ability.

Since there is no specific mention in Regulation 29 regarding the above verification method for bulk carriers, etc., it was not clear as to whether said method was acceptable. In response, IACS developed a unified interpretation which clearly specifies that said verification method is equivalent to verification by testing under deepest seagoing draught conditions and, therefore, complies with SOLAS. This was adopted as IACS UI SC246 in June 2011. Furthermore, IACS revised IACS UR M42 in order to incorporate UI SC246 since UR M42 specifies requirements related to steering gears. This revision was adopted as M42(Rev.4) in June 2011.

After a debate at the 56th Session of the IMO Sub-Committee on Ship Design and Equipment (DE56) in February 2012, UI SC246 was finally approved at the 90th Session of the IMO Maritime Safety Committee (MSC90) in May 2012.

Accordingly, relative requirements have been amended in accordance with IACS UI SC246 and UR M42 (Rev.4).

Outline of Amendment

The test requirements for ships where it is difficult to carry out steering tests under conditions of deepest seagoing draught at sea trials have been amended.