### RULES FOR THE SURVEY AND CONSTRUCTION OF STEEL SHIPS

Part M

Welding

# RULES

#### 2014 AMENDMENT NO.1

Rule No.7819th December 2014Resolved by Technical Committee on 29th July 2014Approved by Board of Directors on 16th September 2014

Rule No.78 19th December 2014 AMENDMENT TO THE RULES FOR THE SURVEY AND CONSTRUCTION OF STEEL SHIPS

"Rules for the survey and construction of steel ships" has been partly amended as follows:

#### Part M WELDING

#### Chapter 2 WELDING WORKS

#### 2.2 Work Scheme

#### 2.2.2 Welding Procedure and related specification

Sub-paragraph -2 has been amended as follows.

2 At least the following welding conditions are to be included in the welding procedure specification specified in preceding -1.

((1) to (8) are omitted.)

(9) Applicable member (only in cases where brittle fracture tests and technical documents related to such brittle fracture tests are omitted in **4.2.7-7**)

(910) Other conditions necessary for the welding procedure

#### Chapter 4 WELDING PROCEDURE AND RELATED SPECIFICATIONS

#### 4.2 Tests for Butt Welded Joints

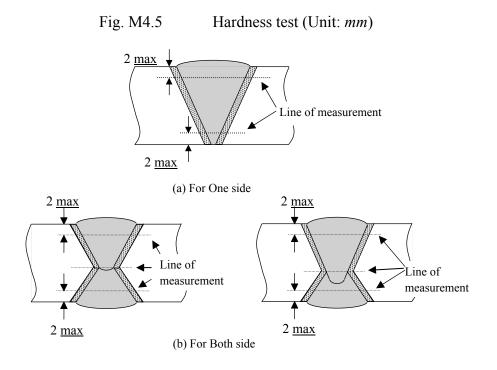
#### 4.2.7 Impact Tests

Sub-paragraph -7 has been amended as follows.

7 In cases where maximum thickness to be approved is more than 50mm but not exceeding 70mm, *CTOD* tests or deep notch tests (hereinafter referred to as "brittle fracture tests"), or technical documents related to such brittle fracture tests may be required in addition to impact tests; in cases where such maximum thickness to be approved exceeds 70mm, brittle fracture tests are to be carried out in addition to impact tests or technical documents related to such brittle fracture tests are to be submitted to the Society. Also, brittle fracture tests described above are to be carried out at the maximum thickness to be approved. However, both brittle fracture tests and the technical documents related to such brittle fracture tests by the Society.

#### 4.2.9 Hardness Test

Fig. M4.5 has been amended as follows.

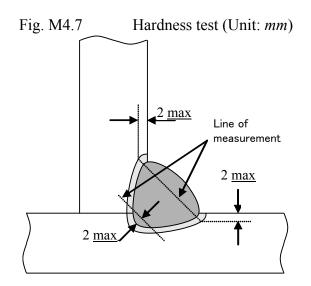


Notes:

- (1) For each row of indentations there shall be a minimum of 3 individual indentations in the world metal, the heat affected zones (both side) and the base metal (both sides).
- (2) Measuring intervals are to be 1mm on the basis of the bond.
- (3) Measuring load is to be 10kg Viekers. Test force is to be 98.07 N.
- (4) For *KE*47, measurement at mid thickness line of is to be added.

#### 4.3.6 Hardness Test

Fig. M4.7 has been amended as follows.

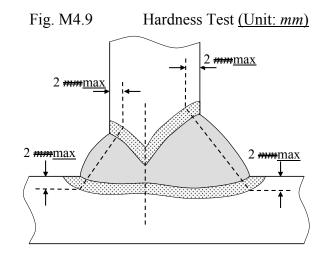


Notes:

- (1) For each row of indentations there shall be a minimum of 3 individual indentations in the world metal, the heat affected zones (both side) and the base metal (both sides).
- (2) Measuring intervals are to be 1mm on the basis of the bond.
- (3) Measuring load is to be 10kg Viekers. Test force is to be 98.07 N.

#### 4.4.6 Hardness Test

Fig. M4.9 has been amended as follows.



Notes:

- (1) For each row of indentations there is to be a minimum of 3 individual indentations in the world metal, the heat affected zones (both side) and the base metal (both sides).
- (2) Measuring intervals are to be 1mm on the basis of the bond.
- (3) Measuring load is to be 10kg Viekers. Test force is to be 98.07 N.

#### EFFECTIVE DATE AND APPLICATION

- 1. The effective date of the amendments is 19 December 2014.
- 2. Notwithstanding the amendments to the Rules, the current requirements may apply to welding procedure other than those for which the application for approval is submitted to the Society on or after the effective date.

## **GUIDANCE FOR THE SURVEY AND CONSTRUCTION OF STEEL SHIPS**

Part M

Welding

#### 2014 AMENDMENT NO.1

Notice No.6819th December 2014Resolved by Technical Committee on 29th July 2014

Notice No.68 19th December 2014

AMENDMENT TO THE GUIDANCE FOR THE SURVEY AND CONSTRUCTION OF STEEL SHIPS

"Guidance for the survey and construction of steel ships" has been partly amended as follows:

#### Part M WELDING

#### M4 WELDING PROCEDURE AND RELATED SPECIFICATIONS

#### M4.2 Tests for Butt Welded Joints

Paragraph M4.2.7 has been amended as follows.

#### M4.2.7 Impact Tests

 $\underline{1}$  With respect to **Table4.7 Notes (1), Part M of the Rules**, the wording "impact test requirements deemed appropriate by the Society" refers to the followings.

- (1) Where the thickness of test assemblies is more than 50*mm* and not exceeding 70*mm*, values in **Table M4.2.7-1**.
- (2) Where the thickness of test assemblies is exceeding 70*mm*, values deemed appropriate by the Society.

2 The wording "where deemed appropriate by the Society" in **4.2.7-7**, **Part M of the Rules** means the member to be welded by the welding procedure in question is considered to have a low risk of brittle fracture, such as engine seats, stern frames and crane posts, etc.

#### EFFECTIVE DATE AND APPLICATION

- 1. The effective date of the amendments is 19 December 2014.
- 2. Notwithstanding the amendments to the Guidance, the current requirements may apply to welding procedure other than those for which the application for approval is submitted to the Society on or after the effective date.