

No. : TA195E

Date : 8 January 2019

PARTICULARS OF APPROVAL

Approval Conditions for Manufacturing Process of Rolled Steels for Hull

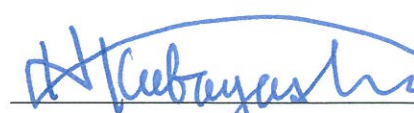

- 1. Manufacturer : Fine Besteel Co., Ltd.
- 2. Kind of Product : Shapes
- 3. Grade : KA, KB, KD, KE, KA32, KA36 and KD32
- 4. Deoxidation Practice : See Table
- 5. Grain Refining Elements : See Table
- 6. Max. Thickness : 18mm
- 7. Condition of Supply : See Table

Table Part of Approval Conditions

Grade	Deoxidation Practice	Grain Refining Elements	Condition of Supply	Note
KA KB KD	Killed	Not Applicable	AR	(1)
KE	Fine-grained Killed	Al		
KA32 KA36	Fine-grained Killed	Al-Nb		
KD32	Fine grained Killed	Al-V-Ti-Nb	TMCP(AcC)	(2)

Note: (1) Steel slabs and blooms manufactured by Daisan Steel Co., Ltd. and POSCO, Pohang Works are to be used.

(2) Steel slabs and blooms manufactured by POSCO, Pohang Works are to be used.

H. Kobayashi
General Manager

Material and Equipment Department

No. :19EW0031ROL

Date : 8 January 2019

Fine Besteel Co., Ltd.

259-33, Changmil-ro, Changnyeong-eup,
Changnyeong-gun, Gyeongsangnam-do,
Korea

Approval of Manufacturing Process of Rolled Steels
(Addition of material grade (KD32))

Dear Sirs,

This is to inform that the captioned manufacturing process has been approved.

Enclosed please find the certificate of approval, particulars of approval, test reports and invoice.

Due to issuing the attached certificate, you are kindly requested to return the previous certificate (Certificate No. TA181223E) and particulars (No. TA181224E) to NK Busan office.

We appreciate the opportunity to work with your company.

Yours faithfully,



H. Kobayashi
General Manager
Material and Equipment Department

Encl.:

- (1) Certificate of approval (TA194E)
- (2) Particulars of approval (TA195E)
- (3) Approved test reports
- (4) Invoice

Cc: NK Busan Office



Approval No. ST32RO

Certificate No. TA194E

APPROVAL OF MANUFACTURING PROCESS

This is to certify that

**Fine Besteel Co., Ltd.
Changyeong, Gyeongsangnam
Korea**

has been approved for the manufacturing process of undermentioned materials by the NIPPON KAIJI KYOKAI in accordance with the requirements of 1.2, Part K of the Society's "Rules for the Survey and Construction of Steel Ships" and Chapter 1, Part 1 of the Society's "Guidance for the Approval and Type Approval of Materials and Equipment for Marine Use".

**MATERIALS : Rolled Steels for Hull
Rolled Steels for Low Temperature Service**

The details of approval conditions are given in the PARTICULARS OF APPROVAL listed in the reverse of this certificate.

The products for the ships classed with the Society are to be manufactured, tested and inspected in compliance with the Rules.

This certificate is valid from 8 January 2019 until 29 April 2019.
Issued at Tokyo on 8 January 2019.

Renewal Date : 30 April 2014

H. Kobayashi
General Manager

Material and Equipment Department