Leading in TM steel technology

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Dillinger,

Europe's leading heavy plate producer, is committed to achieving top-class performance in steel together with its customers.

On the solid foundation of our employees' skills and commitment, we continue to increase our strong performance on each site, in order to manufacture top-quality products in an economic way, while maintaining the necessary balance with our environment and safety.
Where do you find a heavy plate mill?

- Having a more than 300 year-long history
- Producing plates up to 5,200 mm wide and up to 450 mm thick
- Producing 150mm thick TM plates
- Using slabs up to 600 mm thick with high deformation ratio
- Melting more than 3,000 different chemical compositions
- At home in Europe and active on all five continents
- Investing for the future…..

November 15, 2017
Clair Ridge Platform, England

- **Plate thickness:**
  - up to 115 mm (Jackets)
  - up to 100 mm (Topsides)

- **Delivery:**
  - Jackets: 39,000 t
  - Topsides: 20,700 t

- **Steel grades:**
  - S460G1+M, S460G2+M (Topsides)
Dutch railway bridge Muiderberg, Netherlands

- Architect: Zwarts & Jansma Architects
- Length: 255 m
- Width: 17 m
- Height: 50 m
- Plate thickness: up to 120 mm
- Delivery: 8,250 t
- Steel grades: S355N/NL, S355K2+N, S460M/ML

November 15, 2017

Dillinger - leading in TM technology
DanTysk offshore wind farm, German North Sea

- **Area:** 70 km²
- **Power:** 80 pieces with 3.6 MW each, for a total output of 288 MW
- **Delivery:**
  - 65,000 t for monopile foundations (Plate thickness: 60 up to 126 mm)
  - 1,350 t for transformer substation (Plate thickness: 8 up to 65 mm)
- **Steel grades:** S355ML, S460ML, S355G10+M, S355G7+M
Standard delivery programme for different delivery conditions

Plate dimensions beyond the standard delivery programme are often possible after inquiry.

- **N, A** = normalized
- **TM** = thermomechanically rolled
- **Q, Q+A** = quenched, quenched and tempered

Max. plate length: 28 m
Max. plate weight: 42 t*

*52 t on request
TMCP production process is a highly controlled and difficult process

⇒ Goal: fine grain **reheating**

dissolution of precipitates and grain growth

deformed and recrystallized austenite grains

deformed austenite grains

water cooling

fine ferrite grain after transformation and water cooling
Dillinger - leading in TM technology

- Slabs up to 600 mm – basis for heavy TM plates

Dillinger - CC technology leader

- 3 vertical continuous caster
- Investment of more than 400 Mio. €, new purely vertical CC 6 caster
- Thickness: up to 600 mm
- High deformation ratio possible
- Dillinger leading European heavy plate producer

- Dillinger active in several TM relevant segments

- Leading in slab casting and TM rolling technology

- Investing for the future