

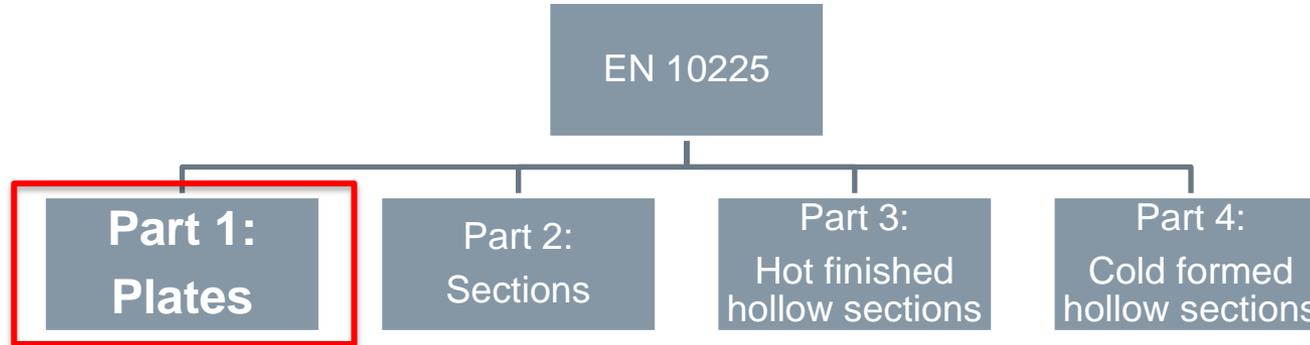
DILLINGER 

Insights EN 10225 Part 1, edition 2019

Perspective of a heavy plate manufacturer

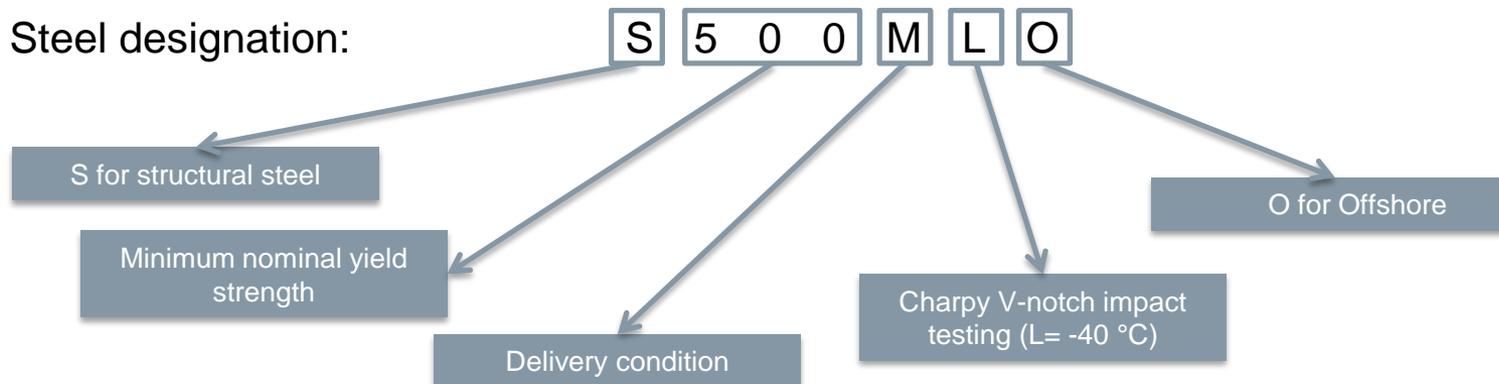
NOTE: The document should help the reader to gain insights into the new edition of the standard – it is not a complete and detailed overview. The document is purely descriptive and Dillinger therefore cannot accept any responsibility.

- Split of the standard in four parts:

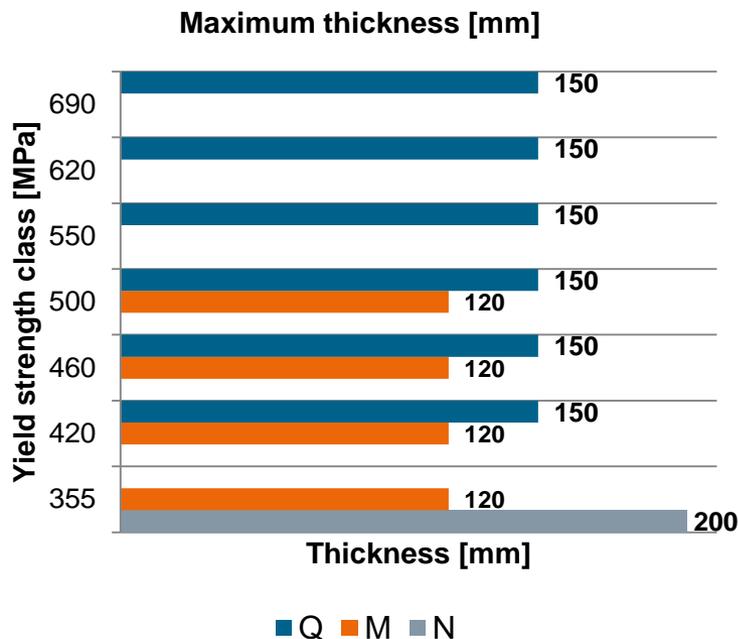


- Steels of group 1 and 3 were removed, for steels of former group 3 corresponding options exist.

- Steel designation:



- New regulations for the minimum rolling reduction ratio depending on plate thickness and product / process parameters.
- Thickness limits of EN 10225-1 depending on yield strength class and delivery condition*:



Peculiarities concerning mechanical properties:

- S620/690QLO:
Constant yield and tensile strength up to 150 mm
- All other grades:
Decreasing requirements with increasing thickness

Delivery condition:

- N: normalized / normalized rolled
- M: thermomechanical rolled
- Q: quenched and tempered

*: For the Dillinger delivery program please [contact us](#).

- Structure and numbering of options has changed, e.g.:
 - Strain ageing: 11 (in the former edition: 12)
 - Through thickness testing: 12 (in the former edition: 13)
 - Weldability data: 17 (in the former edition: 18)

- Remarks for option 17:
 - Weldability studies based on a former version of EN 10225 remain valid if chemical composition and mechanical properties are in line with the current version.
 - Testing in the PWHT condition for heat input 0.8 kJ/mm is no longer necessary.

- Structure of annexes has changed, e.g. mechanical testing of butt welds:
Annex B (in the former edition: Annex E)

- Definition of Arctic: Design temperature below -10 °C
- Arctic areas and test temperatures*:

Arctic area	LAST [°C]	Fracture mechanic test temperature [°C]	Charpy test temperature [°C]
1	-20	-20	-50
2	-30	-30	-60
3	-40	-40	-60

(LAST..Lowest anticipated service temperature)

- Agreements on the mechanical properties must be made between manufacturer and purchaser at the time of enquiry and order.
- Tensile tests at lower test temperatures only if required.

*: For the Dillinger delivery program please [contact us](#).