



High plasticity and martensitic structure on 8.8 and 10.9 grades for cold heading

APPLICATION

- Pre-treated steel replacing Q&T steels for cold forged parts.
- Long parts with slight head upsetting (bolts, shock-absorber piston...).
- **DUCTIL 80**: 8.8 grade for cold heading.
- **DUCTIL 100**: 10.9 grade for cold heading.



ADVANTAGES

Removal of one heat treatment

Time saving in fastener manufacturing.
It avoids problems in long parts straightening and soft annealing

No quenching distortions

Avoiding quenching and tempering treatments,
no deformations appear after bolt forming

Easier manufacturing process

Overall savings in final component $\geq 15\%$

