

Move forward
Go for a better steel



UDDEHOLM HIGH PERFORMANCE STEEL
FOR THE STEEL AND MINING INDUSTRIES

Solve problems before they arise

Downtime costs money. A lot of money. Machines and components in the steel and mining industries often operate in the harshest possible conditions. Reducing downtime can mean massive savings. The key is to take the smart approach and solve problems before they arise.

Uddeholm High Performance Steel offers more advanced steels that last longer and produce better results. They are more expensive than standard engineering steels, but they pay for themselves – through higher quality, better availability, less downtime, more efficient production and components you can rely on.

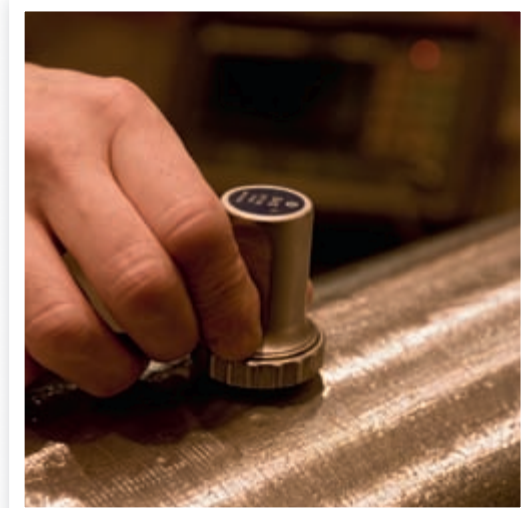
Go for a better steel

Success comes from taking a different approach, not from doing what you've always done. Uddeholm High Performance Steel is a new concept in the world of steel, with new areas of application for Uddeholm's quality steels.

Uddeholm High Performance Steel is a concept whereby the superior properties of tool steel are harnessed and used in contexts other than pure tool applications. Thanks to improved strength and durability, the steels have a longer life span. That means a better overall economy for you, your company and your customers. Go for a better steel. It pays.

A better steel reduces maintenance costs

Unplanned production downtime in the steel and mining industries can lead to extremely high costs. Those costs can be reduced significantly by performing preventive maintenance and choosing better solutions from the start. High-alloy steels from Uddeholm High Performance Steel put you in a better position from the word go. This creates new potential for improving and streamlining production, reducing maintenance costs and reducing downtime.



INCREASE AVAILABILITY WITH FEWER, SHORTER PRODUCTION STOPPAGES

For many years Uddeholm Tooling has been making spare parts from its own steel for its own production – with excellent results. The outcome has been a longer life span, less wear and less unplanned downtime.

Care is key. Materials subject to great stress and strain must be manufactured with care using special technology, which is why Uddeholm High Performance Steel's extensive product and dimension programme is characterised by:

- High-alloy materials
- Production through ESR, powder and spray forming processes
- Adapted heat treatment
- Meticulous quality control throughout the process, such as ultrasonic testing

The Uddeholm High Performance Steel range includes steels that have unique properties. High strength, durability and corrosion resistance, along with good heat treatment properties, are some of the benefits that add value to most applications.



UDDEHOLM IMPAX SUPREME

SHAFTS THAT LIVE LONG IN TOUGH ENVIRONMENTS

Tough environments place tremendous strain on materials. A shaft transfers momentum and carries loads, so whatever the environment it is vital that the shaft lasts. Uddeholm High Performance Steel is a wide programme of materials for the very toughest conditions.

HIGHER STRENGTH

UDDEHOLM DIEVAR

Ø 25.4-712 mm
Delivery condition: Rough turned
Delivery hardness: 160 HB
Working hardness: 48-52 HRC

UDDEHOLM ORVAR SUPREME

Ø 10-550 mm
Delivery condition: Rough turned
Delivery hardness: 180 HB
Working hardness: 48-52 HRC

UDDEHOLM THG 2000 HT

Ø 16.2-110 mm
Delivery condition: Rough turned
Prehardened to: 39-43 HRC
Tempered

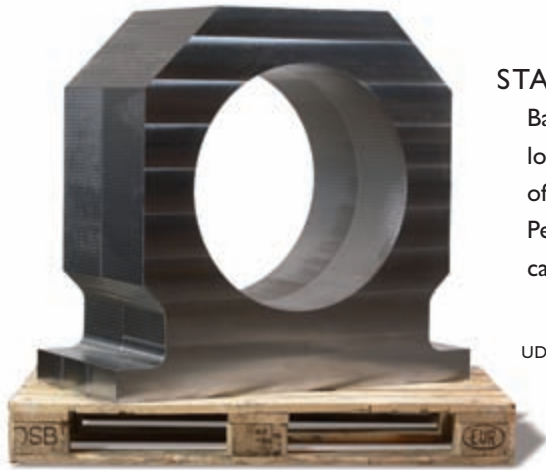
UDDEHOLM NIMAX

Ø 35-670 mm
Delivery condition: Rough turned
Prehardened to: 360-400 HB
Tempered

UDDEHOLM IMPAX SUPREME

Ø 12.7-800 mm
Delivery condition: Rough turned
Prehardened to: 300-330 HB
Tempered

Uddeholm Impax Supreme, Uddeholm Nimax and Uddeholm THG 2000 HT are tempered and ready for machining. The finished component can therefore go straight into production with no intermediate heat treatment.



STABLE BEARING HOUSINGS

Ball bearings in rolling mills have to withstand some serious loads. The housings for the bearings must therefore be made of extremely stable high strength steel. The Uddeholm High Performance Steel range includes large-scale materials that can cope with this kind of extreme load.

UDDEHOLM IMPAX SUPREME

FEED ROLLERS OF UNMATCHED STRENGTH

Feeding rods into a peeling machine calls for extremely hardwearing feed rollers. Uddeholm High Performance Steel includes steels that can meet these demands thanks to good heat treatment properties.

UDDEHOLM SVERKER 21



EXTRA LONG-LASTING BACKING ROLLER

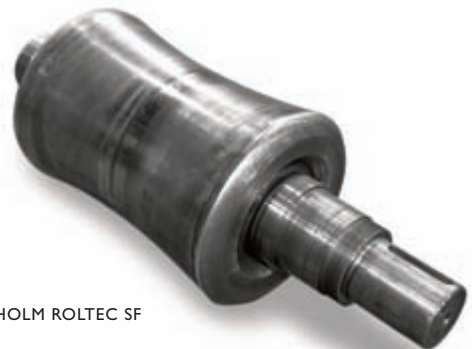
Production processes often need reliable, sturdy support that can stay the distance without weakening. A backing roller in high-alloy powder steel from Uddeholm High Performance Steel strongly increases the life of the component.

UDDEHOLM VANADIS 4 EXTRA

DIRECTION ROLLER FOR TOUGH CONDITIONS

Direction or straightening rollers need to retain their shape and withstand high loads at high temperatures. Rollers made from spray-formed Uddeholm Roltec SF show three times the life span of conventionally produced rollers.

UDDEHOLM ROLTEC SF



SAFE, RELIABLE ATTACHMENT

A lathe chuck has to keep the workpiece in an extremely firm hold. Uddeholm Unimax is a new quality steel from Uddeholm with a unique combination of hardness and toughness, which means it can take extremely high stresses and strains.

UDDEHOLM UNIMAX

Uddeholm is the world's leading supplier of tooling materials. This is a position we have reached by improving our customers' everyday business. Long tradition combined with research and product development equips Uddeholm to solve any tooling problem that may arise. It is a challenging process, but the goal is clear – to be your number one partner and tool steel provider.

Our presence on every continent guarantees you the same high quality wherever you are. Assab is our wholly-owned subsidiary and exclusive sales channel, representing Uddeholm in various parts of the world. Together we secure our position as the world's leading supplier of tooling materials. We act worldwide, so there is always an Uddeholm or Assab representative close at hand to give local advice and support. For us it is all a matter of trust – in long-term partnerships as well as in developing new products. Trust is something you earn, every day.

For more information, please visit www.uddeholm.com or www.assab.com