

BISALLOY® WEAR 320 STEEL

Introduction

BISALLOY® WEAR 320 steel is a through hardened, abrasion resistant steel plate. While being a wear plate, BISALLOY® WEAR 320 steel offers the optimum combination of hardness, impact resistance and formability for wear applications requiring extensive forming/drilling or fabrication in abrasive applications.

Applications

With a nominal hardness of 340 HBW, BISALLOY® WEAR 320 steel is an ideal choice for applications that require a balance of hardness and toughness, including:

- Deflector Plates
- Demolition Tools
- Rippers and Lifting Tynes
- Chutes
- Storage Bins
- Dump Truck Liners
- Civil and Earthmoving Buckets

Mechanical properties

Properties	Specification	Typical
0.2% Proof Stress	-	970 MPa
Tensile Strength	-	1070 MPa
Elongation in 50 mm G.L.	-	16%
Charpy Impact (Longitudinal) -40°C (10 mm x 10 mm)	-	35 J
Hardness	320 - 360 HB	340 HB

Chemical composition

Thickness (mm)	Weight %	C	P	Mn	Si	S	Cr	Mo	B	CE(IIW)*	CET*
5 - <30	Maximum	0.18	0.025	1.2	0.60	0.008	1.00	0.25	0.002	0.44	0.26
≥30 - 80	Maximum	0.18	0.025	1.3	0.60	0.008	1.00	0.25	0.002	0.54	0.32
>80 - 100	Maximum	0.18	0.025	1.5	0.60	0.008	1.20	0.25	0.002	0.58	0.34

*Typical average

PLEASE NOTE: Every care has been taken to ensure the accuracy of information contained in this manual which supersedes earlier publications, however Bisalloy Steels shall not be liable for any loss or damage whatsoever caused from the application of such information. Typical values are provided for reference information only and no guarantee is given that a specific plate will provide these properties. Information is subject to change without notice. **Published August 2020**