

- **A:** Standard quality (semi-killed/killed)
- **B:** Killed steel with room temp impact test
- **C:** Killed steel with -20°C impact test
- **D/E:** Micro-alloyed high-strength versions

Key Comparison Tables

1. Chemical Composition (Selected Grades)

Element	E165	E250B	E350	E450E
C (max)	0.25	0.22	0.20	0.22
Mn (min)	1.25	1.50	1.50	1.80
P (max)	0.045	0.045	0.045	0.045
S (max)	0.045	0.045	0.045	0.045
CE (max)	â??	0.41	0.42	0.48

Note: Quality C has stricter limits (P/S â??0.040%)

2. Mechanical Properties

Grade	Tensile (MPa)	Yield (MPa)	Elongation (%)	Impact Test
E165	290	165	23	Not required
E250B	410	250	23	27J @ RT
E350	490	350	22	â??
E450E	590	450	20	20J @ RT

Applications Guide

Grade	Best For	Form Available
E165	Light structures, roofing	Plates, bars
E250C	Welded bridges, cryogenic	Plates, sections
E350	Building frames, cranes	All forms
E450D/E	Heavy mining equipment	Plates, special sections

Why Choose Steelmet Industries?

We provide:

- Full range of IS 2062:2006 grades
- Custom processing (cutting, drilling, bending)
- Mill test certificates (MTC) per EN 10204 3.1
- Just-in-time delivery across India

Request samples of any IS 2062 grade for your project testing!

FAQ Section

Q: Can E250A be used for welded structures?

A: Yes, but E250C is recommended for critical welds due to its -20°C impact toughness.

Q: Difference between E450D and E450E?

A: E450E has higher manganese (1.80% vs 1.60%) for improved strength.

Conclusion

Understanding IS 2062:2006 grade differences ensures optimal material selection for structural integrity. **Steelmet Industries** stocks all grades from E165 to E650 • contact our technical team today for project-specific recommendations.

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1. Posts

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1. construction steel grades
2. E250 steel
3. E410 steel
4. Fe 490 steel
5. high tensile steel
6. IS 2062 steel
7. steel plates India
8. steel sections
9. Steelmet Industries
10. structural steel grades

Date

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admin
