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Alternative Grades of Stainless Stems? What's The Difference?

For iron butterfly valves, Milwaukee Valve provides two options of stem materials. 416SS (ASTM A582 Type 416) is the standard stem material, which is used with all discs except stainless steel. 316SS (ASTM A276 Type 316) stems are the standard option for stainless discs, and are available as an option with other disc materials.

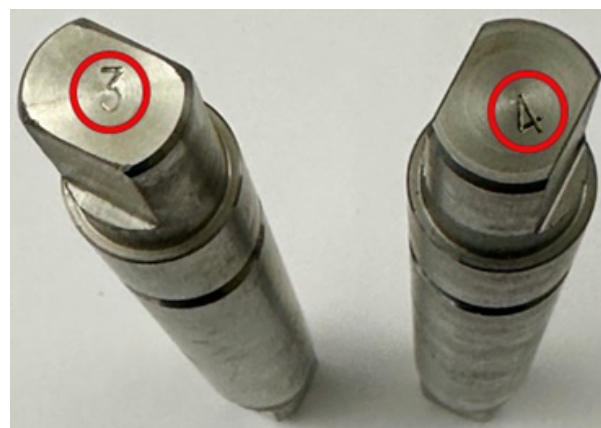


So, what's the difference and why choose one over the other?

For both, the primary element is iron. Yes, that's right, stainless steel is just another iron alloy. 416SS is considered a free-machining stainless,

meaning that it's easier to machine. Depending on the treatment methods and size of the bar, 416SS can have a yield strength almost double that of 316SS, and is an excellent choice for the rigors of a valve stem.

The most notable difference between 316SS and 416SS is the **nickel** content. 416SS has practically none, while 316SS contains somewhere between 10-14% nickel. The nickel in 316SS is what gives the material its superior



316SS and 416SS valve stems are cleverly distinguished with a "3" or "4"

corrosion resistance over 416SS. It is also what makes 316SS more expensive.

As always, material selection is crucial to valve longevity and total cost of ownership over time.

For more information on Milwaukee Valve butterfly valves, click [HERE](#). For pricing and delivery information, contact your Milwaukee Valve customer service rep today. A complete listing, by territory, can be searched at our website, at www.MilwaukeeValve.com/Find-Sales-Rep/.



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