

## Acid to Alkaline Cleaning Agents: Where Do They Fit?

### Session Questions and Answers

**Q: What if I want to remove rust from my steel parts but do not want to phosphate my parts?**

**A:** In this case, you can try a different acid which does not create the iron phosphate salt. You can also use a chelating agent which will probably be slower to remove your rust and shorter bath life.

**Q: I am having a difficult time removing carbon. What product category would you choose from?**

**A:** I would try high alkaline cleaner for that or a product that is built up with chelators. Carbon is challenging to remove but there are products out there designed specifically to remove carbon.

**Q: I deal with multiple metals in my shop and I only have one washer. Do you have a recommendation for cleaning all my parts without having to change solution?**

**A:** For that, I would certainly recommend selecting a mild alkaline product. You should ask whether there are silicate builders and what content they are in. Depending on what your goals are, some are beefed up with silicates to provide oxidation protection from multiple substrates. Also, be sure to discuss with your chemical vendor.

**Q: You mentioned soap earlier in the presentation, what do you mean by "soap"?**

**A:** Soap is the byproduct of the reaction between soils and oils with activators (normally alkaline) to create water-soluble soap. This is known as saponification. For example, this is what you are doing when you wash your hands. The soap is what is created, and it is water soluble for easy and complete rinsing.