

Webinar: Metallography & Etching of Magnesium Alloys

Buehler is offering a new webinar that will focus on metallography and etching for magnesium and its alloys which are prevalent in the automotive and aerospace manufacturing industries.

“Metallography & Etching of Magnesium Alloys” will be presented on Wednesday, December 1, 2021. This presentation will include the metallographic challenges of magnesium alloys. Registration is open at <https://register.gotowebinar.com/register/1997238001848170509>

Magnesium alloys tend to have a high strength-to-weight ratio, exceptional machinability, and low cost. Magnesium alloys are well-known for being the lightest structural alloys and when mixed with other metal elements to improve the physical properties. These elements include manganese, aluminum, zinc, silicon, copper, zirconium, and rare-earth metals. The material lends itself to a range of automotive, aerospace, industrial, electronic, and biomedical applications.

Etching enhances the contrast on surfaces to reveal the microstructure of material samples. Metallurgists in heat treat facilities, manufacturing, and research analyze light metals through etching to reveal microstructural details. This webinar is the final of the 2021 Etching and Microstructure series and will provide the foundation for understanding etching processes in metallography of Magnesium Alloys.

The webinar will be presented by George Vander Voort, renowned physical metallurgist and an exclusive consultant to Buehler. Vander Voort served as Buehler’s Director of Research and Technology for over a decade and has over 50 years of experience as a worldwide leading expert in microstructural analysis, interpretation, and measurement.

The Magnesium Alloys webinar will cover the core principles of etching for and magnesium alloy microstructural analysis in a metallographic setting and including:

- Review fundamental principles of preparation of these light alloys
- Share recommended preparation routes
- Advise on common preparation problems
- Provide recommendations on etch selection
- Demonstrate microstructures typical of this material group
- Highlight common problems in processing and analysis
- Discuss key techniques to ensure success
- Live Questions and Answers session

This webinar is ideal for metallurgists, metallographers, and metallurgical technicians, engineers, quality control, and laboratory personnel in any metallography facility preparing magnesium alloys. It will also benefit those working in adjacent fields such as mechanical testing, failure analysis, and engineering - where metallography is not necessarily an everyday need, but an understanding of what it is and how it can be used to characterize materials and properties.

Registration is complimentary, and a replay will also be available. Attendees will receive a Certificate of Participation after the Webinar. To register for Buehler’s monthly complimentary webinars visit the webinar registration page. If the Webinar interests you, but the date does not

suit you, simply register to receive the recording shortly after the event.

For additional information on Buehler's products for material analysis or hardness testing, please visit www.buehler.com. Buehler celebrates 85 years in 2021 and maintains an extensive network of laboratory, sales, distributors, and service teams that are available to meet virtually or in-person with customers worldwide. To reach one of the Buehler experts, visit www.buehler.com.