SurFACTS in Biomaterials

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Thank You to Our Members!

From President Tim Bloomquist

I hope this message finds you all in good spirits after what I'm sure was an enriching experience at MD&M West 2024. As always, such gatherings offer invaluable opportunities for networking, learning, and

staying abreast of the latest developments in our dynamic field.

I want to take this moment to extend my gratitude to each of you for representing the Surfaces in Biomaterials Foundation (SIBF). Your engagement and enthusiasm truly reflect the spirit of our community, and I encourage you to continue spreading the word about SIBF to your industry contacts. Together, we can amplify our impact and foster even greater collaboration and innovation continuing into 2024.

On that note, I am thrilled to announce that registration is now open for this year's highly anticipated BioInterface Workshop & Symposium, scheduled to take place in Minneapolis, MN, from October 2nd to 4th. Hosted at the prestigious McNamara Alumni Center, this event promises to be a highlight of our calendar, featuring a lineup of sessions and discussions curated to inspire and inform. To register, please visit surfaces.org. I look forward to seeing everyone in October.

The planning for the BioInterface Workshop & Symposium is well underway, thanks to the dedication of our planning committee and the support of our members. I have every confidence that this year's program will exceed expectations and deliver valuable insights into the latest advancements and emerging trends in biomaterials and surface science.

I urge you all to mark your calendars and make plans to join us in Minneapolis for what is sure to be an unforgettable gathering. Whether you're a seasoned researcher, a budding entrepreneur, or a passionate advocate for innovation, the BioInterface Workshop & Symposium offers something for everyone.

As we embark on this exciting journey together, let us recommit ourselves to the mission of SIBF: to explore creative solutions to technical challenges at the BioInterface by fostering education and multidisciplinary cooperation among industrial, academic, clinical and regulatory communities. Your continued support and engagement are vital to our success, and I look forward to our continued collaboration in the months and years ahead.

Thank you for your unwavering dedication to SIBF, and I eagerly anticipate the opportunity to connect with each of you at the BioInterface Workshop & Symposium.

Welcoming Formacoat to Our Community!



The Formacoat Formula: What's behind the success of the innovator in coatings?

What makes a niche business like Formacoat work? The answer lies in its expertise, integrity, and methodology. Formacoat has a holistic approach that aims to address what customers want from their medical devices – and why. To learn more, we speak to Formacoat CEO Mark Gross and his two sons, Brecon and Brontë, who are both involved in company operations.

For a niche business to succeed, it must offer something that few other others can. And in the specialist field of medical device coatings, few can match what Formacoat offers.

When CEO Mark Gross founded the company over 20 years ago, the focus was a single type of hydrophilic coating, which can make devices more lubricious. The business now works with 90 different coating types, a comprehensive mix that covers many different device needs - but all of this added complexity has caused many other aspects of the business to grow with it.

The R&D department helps to take devices from concept to customer, and the manufacturing team keeps the large-scale coating devices running from dawn to dusk.

"One of the interesting things about us is that even after twenty years, we are the still the only ones in the niche. It's been carved out and inhabited by us. There's literally one else trying to do what we do when it comes to coating devices," says Brontë Gross, the company's marketing engineer. "When it comes to our flexibility and impartialness, we are utterly unique."

Formacoat does not limit itself to providing one type of coating. In fact, limitations and restrictions barely feature in the vocabulary at Formacoat. The specialist provider of coatings for medical devices is willing to take on almost any challenge when approached to provide a solution.

"We say 'yes' to a lot of things that are seemingly outside what most people would consider our core business. And that is in and of itself our core business," adds Brecon Gross, manager of manufacturing engineering at Formacoat.

Coating devices can be a tricky and difficult process. A common mistake made by medical device manufacturers is leaving the coating towards the end of the product development as more of a finishing touch. However, this can lead to issues with performance at a later stage if the coating has not been considered during early design and development.

What's behind...

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And when it comes to coatings, what a customer may want and what they actually need can be two different things. To determine this, Formacoat begins each project by asking the customer directly: "What do you want? And why?" They refer to these to seemingly easy questions as "The Formacoat Formula".

"We really strive to try and understand why the customer is coming to us, what needs they have, and what fit is going to be right," adds Brontë Gross. "The formula seems simple, but it's incredible how many customers we get saying something like 'No one else really understands what I need'. There's a lot of active energy on our part to make sure that everyone is on the same page throughout our design and scaling processes."

Methodology: understanding what a medical device needs

Customers are approaching the company with increasingly more novel devices, often requiring entirely new types of coating that Formacoat hasn't previously provided.

"Everybody's talking about how if you've got something to do that's unusual then you go to Formacoat, they will get you going," says Formacoat CEO Mark Gross of his company's reputation. To accommodate these increasing demands for coatings on devices, Formacoat has been hiring engineers and manufacturing personnel that build on the company's existing expertise.

"There's flexibility in how we approach each customer: if we feel that we have something in our experience and vast understanding of the coatings marketplace, we can find a combination of products or technologies to meet a customer's very unique need," says Mark Gross, CEO of Formacoat.

With so many different coating options, the company will compile a blinded survey and collect data for lubricity or pinch testing. "The customer needs to touch and feel the different coating products on their device. And they can do all that in one place," adds Mark Gross. He adds that Formacoat's ethos is very much in the physical application in the lab rather than sitting around a table discussing ideas for lengthy periods.

"We can sit around a whiteboard and throw up ideas left and right. Engineers do this all the time. But you're just postulating theories. Here, we can actually put all these different technologies onto devices and test them in the lab all very easily," says Mark Gross.

"On one matrix, I had nine different coatings, from seven different vendors. To orchestrate that is a huge amount of work. But to orchestrate that through one business offers an amazing savings of time and energy."

What's behind...

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A culture of integrity

Integrity is something that underpins all of Formacoat's business operations and company culture. The company's honest and direct approach to customers stays true to its roots as a family business. Formacoat aims to be as transparent with customers as possible and fair in all its pricing.

"We put in a lot of effort in making sure that we don't do unnecessary things and charge unnecessary costs," adds Brecon Gross.

Furthermore, the family explains that their company is not interested in making a quick buck at the expense of the customer. A fundamental part of the company's business model is in building long-term relationships with customers.

"The nature of being a family business does mean that we're in this for long-term relationships," explains Mark Gross. Proof of this is in the longevity of repeat customers. Their first customer continues to use their services after 20 years, with the average length of customer relationships being nine years.

"It's all about honest communication with the customer," says Brontë Gross. "If we make a mistake, we don't try and hide it behind layers of bureaucracy or anything. We've built that level of trust among everyone we work with by having those open lines of communication from the start and trying to maintain that throughout."

As the company moves from operations by hand to ones that are automated for large-scale manufacturing, those running the family business are keen to maintain the company's culture and unique identity as it expands, sticking with what has made the company a success in the first place and continue providing solutions and services others can't.

Elkem - A Leader in Biomedical Solutions



We are thrilled to highlight one of our esteemed members, Elkem! As one of the world's foremost fully integrated silicone companies, Elkem brings a wealth of expertise and innovation to our vibrant community.

About Elkem:

Elkem is a global leader in the silicone industry, renowned for its comprehensive range of medical-grade silicones. With a focus on biomedical solutions, Elkem delivers cutting-edge products tailored for long-term implantable and drug delivery applications. The Silbione® brand silicones, a hallmark of Elkem's commitment to quality, are manufactured in a state-of-the-art clean facility. Designed to meet the highest standards of biocompatibility and lot-to-lot consistency, Elkem's silicones are at the forefront of advancements in the medical field.

Elkem's inclusion in SurFACTS is a testament to their commitment to excellence and innovation in the field of surfactants. Their expertise in manufacturing medical-grade silicones aligns seamlessly with the diverse interests of our community. We believe their contributions will enrich the exchange of knowledge and foster collaboration among our members.



Registration is now open!

This year's BioInterface Workshop & Symposium will be held in Minneapolis, MN at the University of Minneapolis's McNamara Alumni Center. Visit <u>surfaces.org</u> to register.

Biomaterials in Vascular Devices and Applications

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Next Frontiers in Medical Fabrics, Fibers, and Films

Surface Modification Technologies

Alternative Sterilization Technologies

Anti-Microbial / Anti-Biofouling Technologies

Functional Surface Modifications and Characterizations

List of this year's sessions

Book your hotel - Space is limited

The hotel block is at <u>The Graduate - Minneapolis</u> for \$169 per night before taxes + fees. <u>Click here</u> to reserve a hotel room at the Graduate Minneapolis Hotel at the current rate.





<u>Mentorship</u> <u>Program</u>

Surfaces in Biomaterials is hosting a mentorship program. The goal is to build a professional relationship between mentor and mentees.

Once matched, mentors and mentees can create a timeline to meet virtually. The goal is to meet twice in the first month and then at least once a month for a total of six months.

Please sign up to start

your mentorship.

SurFACTS in Biomaterials is the official publication of the Foundation and is dedicated to serving industrial engineers, research scientists, and academicians working on the field of biomaterials, biomedial devices, or diagnostic research.

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