September 2020

Society for the Advancement of

Material and Process Engineering

New Jersey Chapter



We are pleased to present the following speaker for our September 17 virtual meeting – Details to follow!

Evonik Silane Technology for Composite Applications

Jacob Shevrin

Evonik Corporation

jacob.shevrin@evonik.com

Abstract

It is well known that glass fiber is a common reinforcing material in many types of composites, as the additional strength imparted by the glass fiber reinforcement allows for higher performance systems. Organofunctional silanes are often used to covalently bond to the glass fiber surface, thus functionalizing the surface with an organic group that further couples into a polymeric matrix. For this reason, organofunctional silane coupling agents typically offer improved adhesion, mechanical protection, hydrophobicity, and chemical resistance to glass fiber reinforced systems. In this new work, we will analyze the wetting, surface tension, and other structural properties of glass fibers treated with a unique aminosilane in comparison to a commonly used aminosilane in the glass fiber industry.

Biography

Jacob Shevrin joined Evonik's Functional Silanes business line as an Applied

Technology Scientist in May of 2017. Since then, his research has focused on silanes for coatings, metal treatment, and glass fiber applications. Prior to joining Evonik, Jacob obtained an undergraduate degree in Physics from The Pennsylvania State University, and a masters degree in Materials Science & Engineering from Upenn.

MEETING DETAILS

This will be a virtual meeting utilizing Microsoft Teams. There is no charge for the meeting, which will begin at 12 noon on Thursday, Sept 17th.

Log-in details will follow with an email blast in a few days. Save the date/time

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A Sampe New Jersey

2020–2021 Meeting Schedule

September 17, 2020 – Jacob Shevrin,	February 4, 2021 - TBD	Golf at Picatinny Arsenal
Evonik Corp.	March 4, 2021 - TBD	Please join us for our 37 th Annual Golf Outing Thursday, October 15, 2020 Picatinny Arsenal Golf Club, Picatinny, NJ
September 21-24 – CAMX, On-Line Conference	April 1, 2021 - TBD	
October 1, 2020 – TBD	May 6, 20201 – TBD	Everyone is welcome!
October 15 Golf Outing, Picatinny Arsenal	May 2021 – SAMPE 2021, Long Beach CA	Contact Megan Casey at 610-427-3534 or <u>mbc872@gmail.com</u> to sign up RESERVATIONS WITH PAYMENT MUST BE
November 5, 2020– TBD	June, 2021 – 2 nd Annual NJ Additive Manufacturing Symposium, at Rutgers	RECEIVED BY OCTOBER 1, 2020
December 3, 2020 – TBD	Weeks Engineering Building – in planning stages now.	Walk-ups are subject to availability and an additional \$20 fee

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ISTC – 1981 (Mt. Pocono), 1989 (Atlantic City), 2006 (Dallas), 2009 (Wichita), 2012 (Charleston)

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POSITIONS WANTED Please keep your fellow NJ SAMPE Colleagues in mind while searching for your next great employee!

Phil Allen

Experienced formulator seeking Technical Service, Technical Sales, Technical Director, or Formulator position - Philadelphia area or remote.

- Vice President of Thermoset Resin Formulators Association.
- 2018-2020 Technical Service Chemist, Huntsman (acquired CVC Thermoset Specialties) Supported formulator customers of specialty epoxy resins and CTBN toughening agents.
- 2010-2018 R&D Chemist, ITW Performance Polymers Formulation and technical service of products in a variety of thermoset chemistries and applications.

Contact: (215) 620-7764 uc_phil@yahoo.com

Miles Petchler

I am a **chemist** who works developing resinous floor coatings for a building materials company. I am a **skilled formulator** who has created a diverse, easy to manufacture product line for my current employer based largely on feedstock materials for proactive cost optimization via sourcing.

I have also championed innovative ideas, such as using tile installation products to install wireless chargers for electric vehicles into floors. I presented this idea to the owner of the company. I am looking to expand my knowledge in coatings; cement products are my current employer's core competency, so R&D efforts with coatings are limited.

I take pride in my attention to detail, personal drive, and ability to solve problems outside of the skillset of a chemist. Please contact me if you would care to discuss the work I have done in more detail.

> Contact: (860)575-6768 miles.petchler@gmail.com