

## Newsletter At-A-Glance:

- ElectroForce® Webinar - Characterization of Active Shape-Memory Polymers
- Promotion - WinTest® Upgrades
- Customer Research Highlight - Fatigue Resistance in Energy Storing Tendons
- Customer Research Highlight - Exploring the Properties of Magnetorheological Elastomers (MREs)

## CURRENT PROMOTIONS

### BUY ONE, GET ONE!



Get **FREE** accessories and **FREE** DMA software when you buy any 3200, 3300, or 3500 test frame.

Get a **FREE** DuraPulse Heart Valve Durability Test Instrument or 200N Single Motor Test Bench when you buy a new DuraPulse Stent-Graft Tester (SGT)

[More Info](#)

## Upcoming ElectroForce Webinar! Characterization of Active Shape-Memory Polymers

Join us next week for a new TA ElectroForce webinar! Dr. Chris Yakacki, Assistant Professor at the University of Colorado (CU) Denver, will introduce the basics of characterizing shape-memory polymers, utilizing test instruments such as the [Q800](#) and [ElectroForce 3200](#). In addition, Dr. Yakacki will include results from several studies that demonstrate how these materials can be investigated and explored. Following the presentation there will be time allocated to answer your questions.



Dynamic Mechanical Testing  
**WEBINAR**  
Live & Interactive  
**Register Now!**

Join us next week for a new TA ElectroForce webinar! Dr. Chris Yakacki, Assistant Professor at the University of Colorado (CU) Denver, will introduce the basics of characterizing shape-memory polymers, utilizing test instruments such as the [Q800](#) and [ElectroForce 3200](#). In addition, Dr. Yakacki will include results from several studies that demonstrate how these materials can be investigated and explored. Following the presentation there will be time allocated to answer your questions.

### Register for the webinar:

Thursday, November 3, 2016 at 11:00 AM EDT (UTC-4:00) | [REGISTER](#)

Friday, November 4, 2016 at 1:30 AM EDT (UTC-4:00) | [REGISTER](#)

\*both sessions will cover the same material

[Click here](#) to visit Dr. Yakacki's lab website.

## Promotion - WinTest® 7 Upgrade

*Extend the life of your test instrument with up-to-date software*

Is your ElectroForce test system running on obsolete controls or software? Now is the perfect time to upgrade with **30% off** WinTest 7 PC upgrades and **20% off** WinTest 7 controls upgrades (controls upgrade also comes with **FREE** onsite installation and calibration). [WinTest 7](#) includes features such as higher displacement accuracy,

## Academic Matching Grant Program

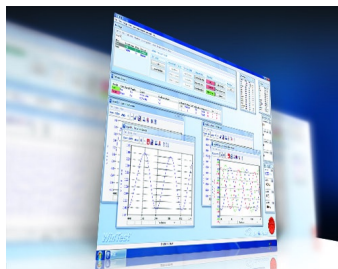


TA will add \$20,000 to the value of any grant for the purchase of a 3100, 3200, 3300, 5100, 5200, or Planar Biaxial System.

safe stop limits, and conditional branching. All upgrades include a brand new PC and HD monitor. Promotion ends December 31, 2016.

### [WinTest® Software Version Comparison](#)

[Click here](#) to request a quote to upgrade your test system software.



## Customer Research Highlight - Fatigue Resistance in Energy Storing Tendons

*Gaining insight to develop more effective preventative measures and treatments for tendon injuries*

Newly published research from Queen Mary University explores the hypothesis that the interfascicular matrix (IFM), which binds tendon fascicles together, is more fatigue-resistant in energy storing tendons than those found in positional tendons. An [ElectroForce 5500](#) test instrument equipped with a 22 N load cell was used to perform the fatigue testing.



To access the publication, [click here](#).

## Customer Research Highlight - Characterizing the Properties of Magnetorheological Elastomers (MREs)

*Understanding the influence of carbonyl iron particles coated with silica on MREs*

Combining a non-magnetic polymer matrix with a magnetically active filler, MREs are composite materials that are often used as active or semi-active shock absorbers or dampers. In a recently published paper in the journal Smart Materials and Structures, researchers from Wroclaw University of Technology and Johannes Kepler University Linz have collaborated to study the effects of coating iron particles with silica and the resulting impact on the material properties of magnetorheological elastomers utilizing the modular TestBench mounted onto a customized loading structure.



To access the publication, [click here](#).

[More Info](#)

## UPCOMING CONFERENCES

### MS&T 16

October 24 - 27  
Salt Lake City, UT

### Medtec China

October 26 - 28  
Shanghai, China  
Booth P101

### Biomaterials International

October 30 -  
November 3  
Kenting, Taiwan

### Biofabrication 2016

October 30 -  
November 3  
Winston-Salem, NC

### Chinese Orthopaedic Association

November 17 - 20  
Beijing, China

### Japanese Society for Biomaterials

November 21 - 22  
Fukuoka, Japan

### MRS Fall Meeting

November 27 -  
December 3  
Boston, MA

