

sensor & calibration tips

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Greetings!

Welcome to Issue #63
 The year is winding down, and with the holidays upon us, it gives us time to reflect. During this period of contemplation, don't forget to check out when you last calibrated your system. Control and confidence are the cornerstone of a sound metrology program.

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Tip of the Month: Plot a Daily Verification Control Chart

Run and record the results from a known, controlled verification sensor each time you use your calibration system. Plotting the result in a control chart will allow you to watch for drifting bias anomalies like inexperienced operators (incorrect/inconsistent mounting torque), environmental control bounds or reference drift, as well as high deviation special causes, like ground loops or other drastic measurement errors.

Technical Exchanges

[Power Gen International](#)
 December 11-13
 Orlando, FL

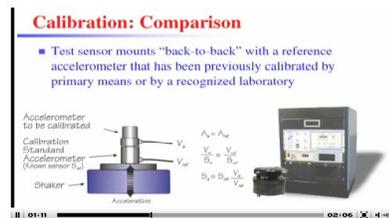
[IMAC XXXI Conference](#)
 February 11-13
 Garden Grove, CA

Quick Links

[PTB](#)

Accelerometer Calibration Tutorial Video

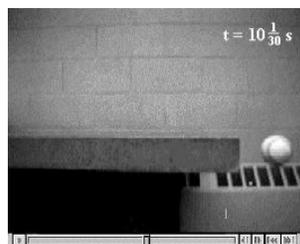
This video offers a short presentation on dynamic accelerometer frequency response and the basic operation of the model 9155 automated accelerometer calibration system.



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How To Explain Accuracy, Precision & Uncertainty



I found this nice narrative from the University of Utah Department of Physics & Astronomy while searching for a reference on uncertainty:

How tall are you? How old are you? When you answered these everyday questions, you probably did it in round numbers such as "five foot, six inches" or "nineteen years, three months." But how true are these answers?...

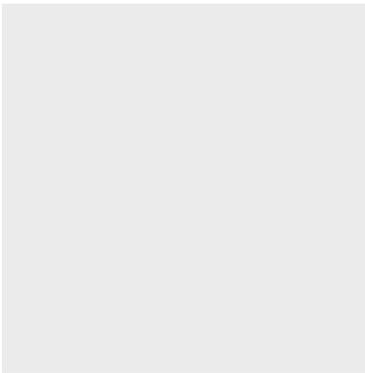
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Blast from the Past: Why Calibrate?

A good friend of mine always says, "Calibration is like getting a teenage boy to brush his teeth... They are always looking in mirrors and may comb their hair a hundred times a day, but never want to take the time in the morning to brush their teeth."

From my observations,



[NIST](#)
[ISO TC 108](#) - Mechanical vibration, shock and condition monitoring
[ISO TC 108/SC 3](#) - Use and calibration of vibration and shock measuring instruments
[ISO TC 108/SC 6](#) - Vibration and shock generating systems
[SAVE \(Formerly SAVIAC\)](#)
[Vibration Institute](#)
[Equipment Reliability Institute \(ERI\)](#)
[TMS Video Vault](#)
[Learn More Calibration](#)

Previous Newsletters

[Sensor & Calibration Tips #62](#) - Temperature Effects in Calibration; Shock & Vibration Calibration of Accelerometers

[Sensor & Calibration Tips #61](#) - Tackling Tire Testing; Calibration Videos

Select Newsletter Articles by Topic

[Function and Structure of Accelerometers](#)

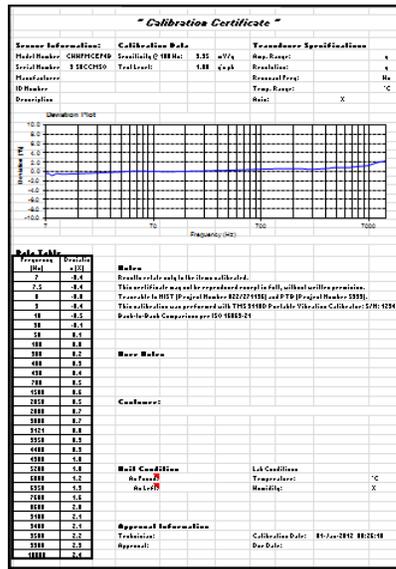
[Similarities Between Charge and ICP Operation](#)

[Selecting Accelerometers for Mechanical Shock](#)

[Master List of Topics \(T.O.C.\)](#)

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even in the business of test and measurement, it seems that appearances get all the attention and the sound

practices of calibration, verification and maintenance are often an afterthought...

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www.modalshop.com/calibration.asp?ID=240

Thanks for joining us for another issue of Sensor & Calibration Tips. As always, please, speak up and [let us know what you like](#). We appreciate all feedback: positive, critical or otherwise. Take care!

Sincerely,

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