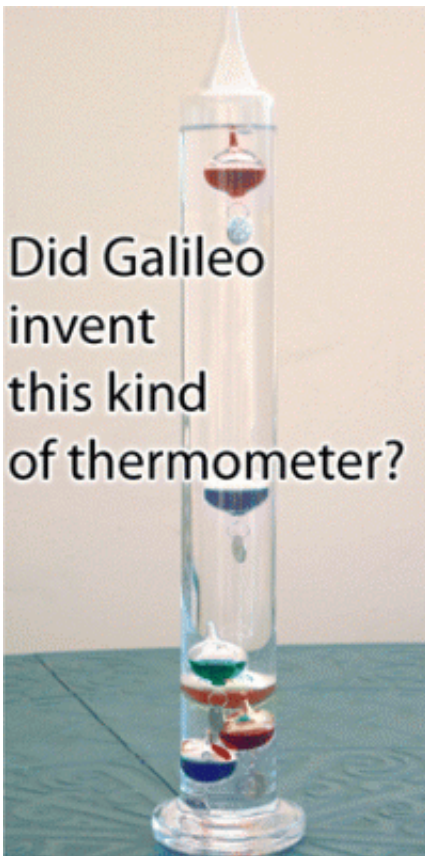


Galileo didn't invent thermometer that bears his name

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The great Italian scientist Galileo may have been the first person to use a telescope to observe the heavens, helping spark the scientific revolution of the 16th century, but Galileo definitely did not invent the famous thermometer and captivating curiosity that bears his name. That's the

message of an article in *ACS' Journal of Chemical Education*.

Peter Loyson explains that a number of companies sell so-called "Galilean thermometers," sealed tubes of liquid in which [glass spheres](#) float and sink with changes in ambient temperature. Modern versions have morphed into elegant [curiosity](#) pieces with multi-colored spheres and gold-plated temperature tags. The instruments rely on a liquid, like water or alcohol, whose [density](#) increases as temperature falls. The glass spheres each are made to a precise density that matches that of the suspension liquid at a specific temperature. When a sphere floats midway up the tube, it represents the temperature of the room.

Although Galileo may have originated the idea in a 1638 book, the Accademia del Cimento, an early scientific society founded in Florence in 1657 by Galileo's students, actually deserves the credit, Loyson says. The Accademia del Cimento—"the Academy of Experiment"—developed other instruments, as well. Loyson suggests "Florentine [thermometer](#)" as a more appropriate name for these colorful marvels.

More information: "Galilean Thermometer Not So Galilean" *J. Chem. Educ.*, 2012, 89 (9), pp 1095–1096. [DOI: 10.1021/ed200793g](https://doi.org/10.1021/ed200793g)

Abstract

A Galilean thermometer is a device for measuring the temperature of a liquid based on the density variation with temperature. It is named after Galileo Galilei, the famous Italian physicist, who apparently invented it. This article examines whether he did invent this Galilean thermometer and shows that he invented another type of thermometer, called a thermoscope or air thermometer, which is something completely different. The credit for developing the "Galilean thermometer" must go to the Accademia del Cimento, a research organization active in Florence from 1657 to 1667 under the leadership of Ferdinand II, Grand

Duke of Tuscany. It is suggested that the "Galilean thermometer" should instead be called a "Florentine thermometer" after the place where it was developed.

Provided by American Chemical Society

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