

Abstract Submitted
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Development of a turn-key cloud chamber in collaboration with non-academic science enthusiasts JESSICA MUENKEL, MEGHAN HARRINGTON, MATTHEW BELLIS¹, Siena College, ARIEL WALDMAN, NATHAN BERGEY, IVAN COOPER, JULIANE BOMBOSCH, Science Hack Day, CMS COLLABORATION², SCIENCE HACK DAY TEAM — Science Hack Day is an event that brings together scientists and science enthusiasts for 24 hours to “hack” a science project. These events serve two purposes. The first and most obvious is to provide a structured environment for science outreach. Academics and researchers have the opportunity for “boots-on-the-ground” interactions with the general public. The second purpose, though more challenging, is to enable science enthusiasts to donate their skills so that they are able to push back to educators and researchers in a fashion that that benefits their work. We discuss our experiences at the 2013 San Francisco Science Hack Day at the California Academy of Sciences. We worked with attendees of the conference to create a cloud chamber that worked with Peltier thermocoolers, rather than dry ice. In this fashion, we educated attendees about radiation and particle physics, while also benefitting from the experience and knowledge of the attendees in constructing the device. This “turn-key” cloud chamber is now in use at Siena College as an outreach and educational device. The properties of this device and the story of its construction will be presented.

¹Representing CMS.

²The Compact Muon Solenoid experiment.

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