C14 An Overview of the ATF Fire Research Laboratory

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The goal of this presentation is to educate the forensic community about the fire testing and research capabilities that the ATF (Bureau of Alcohol, Tobacco and Firearms) FRL (Fire Research Laboratory) can provide to fire investigations.

The FRL is the first scientific research laboratory in the U.S. dedicated to supporting the unique needs of the fire investigation community. Research is crucial to understand the scientific principles associated with fire ignition, growth, and spread. This information is critical for accurate fire scene reconstruction and to develop reliable scientifically valid theories for effective criminal prosecutions. At the present time, there are no fire research facilities in the U.S., or elsewhere, dedicated to the specific needs of the fire investigation community. The FRL will provide the necessary facilities, equipment, and staff to work on important fire investigation issues such as fire scene reconstruction and modeling, flashover studies, validation of fire pattern analysis indicators, impact of accelerants on fire growth and spread, ignition studies, and electrical fire cause analysis. This presentation will focus on the capabilities of the FRL, the lab's state-of-the-art facilities and equipment, and the benefits that the FRL can provide to fire investigators and the forensic fire research community.

Fire Testing, ATF Research Lab, Fire Investigation

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