1. Record Nr. UNINA9910508605203321

Titolo	Flammability and Sensitivity of Materials in Oxygen-Enriched Atmospheres . 15th Volume / / edited by Gwenael J. Chiffoleau, Theodore A. Steinberg
Pubbl/distr/stampa	West Conshohocken, PA : , : ASTM International, , 2021
ISBN	0-8031-7699-6
Descrizione fisica	1 online resource (xi, 380 pages)
Disciplina	628.922
Soggetti	Flammable materials
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di contenuto	Overview -- Theodore A. Steinberg, Gwenael J. Chiffoleau -- Assessment criteria to evaluate test results on compatibility of nonmetallic materials for oxygen service based on BAM's safety philosophy -- Thomas Kasch, Thomas Brock, Peter Hartwig, and O\af Hesse -- Oxygen compatibility and safe-use criteria for nonmetals -- Barry Newton, Gwenael J. Chiffoleau, and Elliot Forsyth -- Configurational oxygen compatibility testing of nonmetals -- Greg Odom, Kevin Smith, Rob Car\son, Gwenael J. Chiffo\eau, and Barry Newton -- Laser ignition of metallic rods and discs in gaseous oxygen: a complementary approach to the standard ASTM G124 test method -- Frederic Coste, Martina Ridlova, Khaled Ayfi, Morgan Dal, Bernard Labegorre, Nicolas Gallienne, Jacques Quintard, Remy Fabbro, and Alain Colson -- Evaluation of metals flammability using extinguishment thickness -- Jared D. Hooser, James White, Eric Thorn, Gwenael J. Chiffoleau, Elliot Forsyth, and Barry Newton -- Supersonic particle impact testing on electroless nickel-coated 304 stainless steel (SS304) to determine ignition performance compared to uncoated SS304 and Monel 405 -- Jonathan M. Tylka and Kenneth Johnson -- Determination of transmitted energy by combustion of known volume of metallic particles in pure oxygen pressurized atmosphere -- Frederic Coste, Nicolas Gallienne, Martina Ridlova, Jacques Quintard, Khaled Ayfi, Morgan Dal, Bernard Labegorre, Remy Fabbro, and Alain Colson -- A critical analysis of adiabatic compression test methods -- Barry

Newton, Theodore A. Steinberg, and Gwenael J. ChIffoleau -- Modeling the thermal condition of a nonmetal prior to ignition in gaseous oxygen -- Maria Ryan, Troy Farrell, Steven Psaltis, Bary Newton, Hollie Ryan, and Theodore A. Steinberg -- Nonmetal ignition due to rapid compression in oxygen systems -- Maria Ryan, Theodore A. Steinberg, Barry Newton, and Hollie Ryan -- Initiation of kindling chain from rapid compression -- Maria Ryan, Barry Newton, Hollie Ryan, and Theodore A. Ste\nberg -- Failure analysis of an oxygen transfer hose flash fire -- Anna K. Wehr-Aukland, James E. White, and Kevin M. Cook -- Investigation of an oxygen-enriched atmosphere combustion event within the cab of a moving passenger vehicle -- John Schumacher and Zachary Jason -- Analysis of fire and explosion in an oxygen pressure reducing station in a steel plant -- Argha Saha, Asha Sunil Kartha, and Kanchan Chowdhury -- Fallure analysis of a liquid oxygen valve: internal fire only -- Gwenael J. Chiffoleau, Derek Miller, Brad Forsyth, Barry Newton, and Elliot Forsyth -- Probability of fire during rapid opening of a stuck-close ball valve in gaseous oxygen system -- Argha Saha, Arghya Deb, and Kanchan Chowdhury -- Bagging material analysis for cleanliness preservation -- Travis Gwynne, Wallace Foster, Gwenael J. ChIffoleau, and Barry Newton -- New large-scale 750-bar oxygen pressure surge test facility -- Andreas Woitzek, Kai Kittler-Packmor, and Thomas Kasch -- Direct velocity measurement of particle impacts in flowing oxygen using photon doppler velocimetry -- Timothy D. Gallus, Daniel E. Archuleta, and Jonathan M. Tylka -- ASTM G86-17 determining ignition sensitivity of materials to mechanical impact in ambient liquid oxygen and pressurized liquid and gaseous oxygen environments: a modern day evaluation of input energy and calibration variations between ambient and pressurized testers for an improved test method -- Susana Tapia-Harper, Ilse A. Reyes, Alfredo Juarez, Alejandro Cuaron, and Brenton L. Woods.

Sommario/riassunto

THIS COMPILATION OF Selected Technical Papers, STP1626, Flammability and Sensitivity of Materials in Oxygen-Enriched Atmospheres: 15th Volume, contains peer-reviewed papers that were submitted for presentation at a symposium planned for April 27-28, 2022, in Seattle, Washington, USA. The symposium was sponsored by ASTM International Committee G04 on Compatibility and Sensitivity of Materials in Oxygen Enriched Atmospheres.