



## Analysis and prevention of component and equipment failures /

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<https://isni.org/isni/0000000044503188>

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Handbook

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Monografía

"Provides information and insights on the factors that determine the useful service life of engineering components and the likely timing and mode of failure. It addresses nearly every stage of the product lifecycle from materials selection and design to manufacturing, operation, maintenance, and repair. It explains how to use life assessment methods to evaluate the effect of corrosion, fatigue, brittle fracture, elevated temperature, and other forms of damage. It also includes a section that examines the effects of casting, forming, welding, heat treating, and other manufacturing processes on component lifetime and performance. The final and by far largest section in the volume presents and analyzes the failure of metal shafts, fasteners, bearings, springs, and gears as well as pressure vessels, boilers, heat exchangers, pipelines, bridges, cranes, rail equipment, and medical devices."--

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**Título:** Analysis and prevention of component and equipment failures edited by Brett A. Miller, Roch J. Shipley, Ronald J. Parrington, Daniel P. Dennies

**Editorial:** Materials Park, OH ASM International [2021] 2021

**Descripción física:** 1 online resource illustrations (some color)

**Mención de serie:** ASM handbook volume 11A

**Nota general:** "Volume 11A is intended to be used in conjunction with ASM handbook, volume 11, 'Failure analysis and prevention'"--Preface page, viewed online on April 28, 2022 "Selected articles were published digital first in advance of the full volume release. The volume was prepared under the direction of the ASM International Handbook Committee."--Publication history page, viewed online on April 28, 2022 Some online versions include index Includes glossary of terms

**Bibliografía:** Includes bibliographical references

**Contenido:** Engineering aspects of failure and prevention:) Materials selection for failure prevention Brett A. Miller. -- Engineering design process investigation in a failure analysis Steven Kushnick. -- The role of the engineering expert in product liability litigation Farheen S. Khan. -- Reliability-centered maintenance Dana Netherton Structural life assessment methods:) Failure prevention through life assessment of structural components and equipment Daniel J. Benac. -- Brittle fracture assessment and failure assessment diagrams Brian Macejko. -- Analysis methods for probabilistic life assessment Robert Kurth, Cédric Sallaberry. -- Fatigue-life assessment Phillip E. Prueter. -- Assessment of damage to structures and equipment resulting from explosion, fire, and heat events Adrian Pierorazio, Nicholas E. Cherolis, Michael Lowak, Daniel J. Benac, Matthew T. Edel. -- Elevated-temperature life assessment Arun Sreeranganathan, Douglas L. Marriott. -- Corrosion and remaining life assessment Carlos R. Corleto, Michael Hoerner Metal manufacturing aspects of failure:) Failures related to castings George M. Goodrich, Richard B Gundlach, Robert B. Tuttle, Charles V. White. -- Analysis of sheet forming failures Daniel J. Schaeffler. -- Failures related to hot forming processes Dick Douglas, Charles V. White, Tim McHenry. -- Prevention of machining-related failures Michael E. Finn, John M. Tartaglia. -- Failures related to metal additive manufacturing Daniel P. Dennies, S. Lampman. -- Failures related to welding Jorge J. Perdomo, Luis A. Ganhaio. -- Problems associated with heat treated parts Jon L. Dossett. -- Failures in soldering Qiming Zhang, Babak Kondori, Xing Qiu, Jeffery C.C. Lo, S.W. Ricky Lee. -- Failures of brazed joints Brett A. Miller, Daniel P. Dennies Failure analysis of metallic components:) Failures of shafts Brett A. Miller, Phillip Swartzentruber. -- Failures of mechanical fasteners Michael B. Connelly. -- Failures of mechanical springs Dana J. Medlin. -- Failures of cranes and lifting equipment Burak Akyuz, Nicholas Steinhoff. -- Failures of sliding bearings Harish Hirani. -- Failures of rolling-element bearings and their prevention Pierre Dupont. -- Failure analysis of gears and reducers Neville Sachs, Neville W. Sachs. -- Failures of turbine components Kevin Wiens. -- Failures of pipelines A. Hudgins, C. Roepke, B. James, B. Kondori, B. Whitley. -- Failures of bridge components Joe Epperson, Roch J. Shipley. -- Failures of pressure vessels and process piping Luis A. Ganhaio, Jorge J. Perdomo, James McVay, Antonio Seijas. -- Failure analysis of heat exchangers Dusan P. Sekulic. -- Failure of boilers and related equipment Paresh Haribhakti, P.B. Joshi. -- Failure analysis of welded structures Duane K. Miller, Curtis L. Decker. -- Failures of tools and dies George F. Vander Voort. -- Failure analysis of medical devices Matthew Bowers, Gabriel Ganot, Louis Malito, Babak Kondori, Anyanwu Ezechukwu, Felicia Svedlund, Brad James. -- Failure analysis of railroad components Hans Iwand, Joel Hassebrock. -- An overview of aircraft accident investigation and component failures Ellen E. Wright, Suzanne F. Uchneat

**ISBN:** 9781627083294 electronic book) 1627083294 electronic book) 9781627083270 hardcover) 1627083278 hardcover)

**Materia:** Metals- Fracture- Handbooks, manuals, etc. Metals- Analysis- Handbooks, manuals, etc. Machine parts- Failures- Handbooks, manuals, etc. Machine parts- Analysis- Handbooks, manuals, etc. Failure analysis (Engineering)- Handbooks, manuals, etc. Métaux- Rupture- Guides, manuels, etc. Métaux- Analyse- Guides, manuels, etc. Machines- Pièces- Défaillances- Guides, manuels, etc. Machines- Pièces- Analyse- Guides, manuels, etc. Analyse des défaillances (Ingénierie)- Guides, manuels, etc. Failure analysis (Engineering) Machine parts- Failures Metals- Analysis Metals- Fracture

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**Entidades:** ASM International. Handbook Committee issuing body ASM International publisher

**Enlace a formato físico adicional:** Print version Analysis and prevention of component and equipment failures. Materials Park, Ohio : ASM International, [2021] 9781627083270 (OCoLC)1285698130

**Punto acceso adicional serie-Título:** ASM Handbook v. 11A

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