Record Nr.	UNINA9910298580903321
Autore	Dwivedi Dheerendra Kumar
Titolo	Surface Engineering [[electronic resource]] : Enhancing Life of Tribological Components / / by Dheerendra Kumar Dwivedi
Pubbl/distr/stampa	New Delhi : , : Springer India : , : Imprint : Springer, , 2018
ISBN	81-322-3779-X
Edizione	[1st ed. 2018.]
Descrizione fisica	1 online resource (224 pages)
Disciplina	620.44
Soggetti	Tribology
	Corrosion and anti-corrosives
	Coatings
	Manufactures
	Materials—Surfaces
	I hin films
	Materials science
	Manufacturing Machines Tools Processes
	Surfaces and Interfaces. Thin Films
	Characterization and Evaluation of Materials
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di bibliografia	Includes bibliographical references and index.
Sommario/riassunto	This book is intended to help engineers analyze service condition and potential mechanisms of surface degradation. This will enable engineers select suitable materials for improved service-life and performance of engineering components. The book comprises 7 chapters, and is well illustrated with schematics, photographs, microstructure, XRD patterns, EDAX mapping, and technical data tables. The book focuses on the influence of materials and methods of surface engineering on structure, properties, and wear-performance of engineering components. It begins with the need to study the subject of surface engineering, scope of surface engineering, and classification of techniques of surface engineering. The book covers conventional

1.

material system (steel, cast iron, stellite, WC-Co, PCDs, etc.) and new materials like multilayer structures, functionally gradient materials (FGMs), intermetallic barrier coatings, and thermal barrier coating. The book covers most conventional as well as advanced surface engineering techniques, such as burnishing, shot peening, flame and induction hardening, laser and electron beam hardening, plasma and TIG melting, carburizing, nitriding, cyaniding, boronizing, vanadizing, ion implantation, laser alloying, chemical vapor deposition, PE chemical vapor deposition, physical vapor deposition, weld overlays, laser cladding, hot dip galvanizing, hot dip lead tin coating, hot dip aluminizing, hot dip chromizing, electroplating, electroless plating (Ni-P and Ni-B), mechanical plating, roll bonding, explosive bonding, and hot isostatic. The book also includes an introductory chapter on friction-stir processing of aluminum and titanium alloys. Further, it discusses studies on structure, mechanical and wear properties of weld surfacing, flame spray coating, HVOF sprayed coating, laser cladding of ferrous metals, nickel and cobalt based alloys and their composites in as-sprayed and heat-treated conditions. The book provides a comprehensive overview of various destructive and nondestructive techniques used for characterization of engineered surfaces. The materials in the book will be useful to undergraduate and graduate students. In addition, the contents of this book can also be used for professional development courses for practicing engineers. .

2.	Record Nr.	UNINA9910144547403321
	Titolo	Washington newsletters / / Washington County Chapter, the Ohio Genealogical Society
	Pubbl/distr/stampa	[Marietta, Ohio?], : The Chapter, 1990-1991
	Descrizione fisica	1 online resource
	Disciplina	929/.1/072077198
	Soggetti	Registers of births, etc - Ohio - Washington County
		Registers of births, etc
		Periodicals.
		Genealogy
		Washington County (Ohio) Genealogy
		Ohio Washington County
	Lingua di pubblicazione	Inglese
	Formato	Materiale a stampa
	Livello bibliografico	Periodico