Record Nr. UNINA9910809078603321 **Titolo** Advances in surface treatments. Volume 5: technology-applicationseffects: proceedings of the AST World Conference Advances in Surface Treatments and Surface Finishing, Paris, 3-4 December 1986 / / A. Niku-Lari, editor Pubbl/distr/stampa Oxford, England:,: Pergamon Press,, 1987 ©1987 **ISBN** 1-4831-6251-6 Edizione [First edition.] 1 online resource (539 p.) Descrizione fisica Disciplina 620.112 Soggetti Surfaces (Technology) Surfaces (Physics) Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Note generali Description based upon print version of record. Nota di bibliografia Includes bibliographical references. Nota di contenuto Front Cover; Advances in Surface Treatments; Copyright Page; INTERNATIONAL EDITORIAL ADVISORY COMMITTEE FOR THIS VOLUME: EDITORIAL; MAIN AREAS COVERED IN THE SERIES; INDUSTRIAL COMMITTEE AND SUPPORT GROUP; INSTRUCTIONS TO CONTRIBUTORS; Table of Contents: CONVERSION UNITS: Part I: Thermal and Thermochemical Surface Treatments; CHAPTER 1. SURFACE LAYER CHARACTERISTICS AND CORROSION RESISTANCE OF NITRIDE AND NITROCARBURIZED CARBON STEELS; ABSTRACT; KEYWORDS; INTRODUCTION; EXPERIMENTAL PROCEDURES; RESULTS AND DISCUSSION; ELECTROCHEMICAL AND CORROSION PROPERTIES; **CONCLUSIONS: REFERENCES** CHAPTER 2. NON-LINEAR THERMAL PROBLEMS IN PROGRESSIVE INDUCTION HARDENINGABSTRACT; KEYWORDS; INTRODUCTION; THE MAGNETIC MODEL; THE THERMAL MODEL; RESULTS AND DISCUSSION; CONCLUSIONS; ACKNOWLEDGEMENTS; REFERENCES; APPENDIX - HINTS ON FINITE ELEMENT METHOD; LIST OF SYMBOLS; CHAPTER 3. RESIDUAL STRESSES CAUSED BY THERMAL AND THERMOCHEMICAL SURFACE TREATMENT; ABSTRACT; KEYWORDS; CHAPTER 4. SOME EXPERIENCES GAINED WITH PLASMA AND GAS NITRIDED 42Cr Mo4 STEEL

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Advances in Surface Treatments provides information on technologies, applications, and effects of surface treatment processes on different materials. The text is composed of papers that are presented at the AST World Conference, """"Advances in Surface Treatments and Surface Finishing"""", held in Paris in December 1986. The book is divided into six parts; each of which discusses a different topic in the field of surface treatment. These topics include thermal and thermochemical surface treatments; mechanical surface treatments and their effects; quality control of surface treated materials; s