

Automotive Engine Repair Rebuilding Today's Technician 2 Volume Set

Includes chapter outlines and answer keys for each chapter. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.

The 5th edition of BASIC AUTOMOTIVE SERVICE & SYSTEMS is a comprehensive Classroom Manual/Shop Manual set provides an accessible overview of automotive systems to prepare you for all aspects of work in the field. The Classroom Manual explores the basic theories of operation behind each automotive system, while the Shop Manual covers the hands-on diagnostic, testing, and repair procedures that relate to them. Assuming no prior knowledge of automotive technology, this clear and engaging book addresses fundamental skills and maintenance and the application of key theories. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.

Keeping pace with industry trends and needs across the country, TODAY'S TECHNICIAN: AUTOMATIC TRANSMISSIONS AND TRANSAXLES, 6e consists of a Classroom Manual that provides easy-to-understand, well-illustrated coverage of theory and a Shop Manual that focuses on practical, NATEF task-oriented service procedures. Taking a technician-oriented focus, the book helps students master the design, construction, troubleshooting techniques, and procedures necessary for industry careers and provides hands-on practice in using scanners and oscilloscopes to help students develop critical thinking skills, diagnose problems, and make effective repairs. The Sixth Edition offers up-to-date coverage of continuously variable transmissions (CVT), drivelines for front-wheel drive (FWD) and four-wheel drive (4WD) vehicles, and provides the latest information on today's high-tech electronic controls and automatic shifting devices. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version. Instructors edition contains a variety of instructional support in the margins of each page to supplement your instruction. Includes answers to end-of-chapter review questions and ASE-type questions.

Today's Technician: Automotive Electricity and Electronics, Classroom and Shop Manual Pack

Today's Technician: Automotive Engine Repair & Rebuilding, Classroom Manual and Shop Manual, Spiral bound Version

Upgrade Your Engine to Increase Horsepower

Today's Technician: Advanced Engine Performance Classroom Manual and Shop Manual

Auto Repair For Dummies

This revised and updated color edition of How to Rebuild the Small-Block Ford walks you step by step through a rebuild, including: planning your rebuild, disassembly and inspection, choosing the right parts, machine work, assembling your engine, and first firing and break-in.

TODAY'S TECHNICIAN: AUTOMOTIVE BRAKE SYSTEMS, CLASSROOM AND SHOP MANUAL PRE-PACK, Seventh Edition, is a comprehensive resource that equips readers to understand, diagnose, and repair today's brake systems with confidence. Using a unique two-volume approach, the text covers the theory and application of the total brake system, subsystem, and components in the first volume (Classroom Manual), while the second (Shop Manual) explores real-world symptoms, diagnostics, and repairs. Known for its comprehensive coverage, accurate and up-to-date details, and abundant illustrations, the text is an ideal resource to prepare for success as an automotive technician or pursue ASE certification. Now updated with extensive information on new and emerging technology and techniques--including hybrid vehicles, brake by wire, and electric brakes--the Seventh Edition also aligns with the ASE Education Foundation 2017 accreditation model and includes job sheets correlated to specific MLR, AST and MAST tasks. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.

This newly up-to-date edition of the best-selling DIY reference Small Engines and Outdoor Power Equipment offers them same great comprehensive and illustrated instruction but with new and improved content for today's motorized equipment.

Fully updated and in line with latest specifications, this textbook integrates vehicle maintenance procedures, making it the indispensable first classroom and workshop text for all students of motor vehicle engineering, apprentices and keen amateurs. Its clear, logical approach, excellent illustrations and step-by-step development of theory and practice make this an accessible text for students of all abilities. With this book, students have information that they can trust because it is written by an experienced practitioner and lecturer in this area. This book will provide not only the information required to understand automotive engines but also background information that allows readers to put this information into context. The book contains flowcharts, diagnostic case studies, detailed diagrams of how systems operate and overview descriptions of how systems work. All this on top of step-by-step instructions and quick reference tables. Readers won't get bored when working through this book with questions and answers that aid learning and revision included.

Automobile Mechanical and Electrical Systems

Today's Technician: Automotive Heating & Air Conditioning Classroom Manual and Shop Manual, Spiral bound Version

Chevrolet Engine Overhaul Manual

Engine Service

Zen and the Art of Motorcycle Maintenance

Engine Repair, published as part of the CDX Master Automotive Technician Series, provides students with the technical background, diagnostic strategies, and repair procedures they need to successfully repair engines in the shop. Focused on a "strategy-based diagnostics" approach, this book helps students master diagnosis in order to properly resolve the customer concern on the first attempt.

For courses in Automotive Principles (Automotive Technology) and Engine Repair and Rebuilding (A1) (Automotive Technology) in automotive departments of vocational and trade schools, as well as community colleges. This text is part of the Pearson Automotive Series. Preparing today's automotive students for career success! Market-leading Automotive Electrical and Engine Performance has been fully updated and expanded to address the latest technology and automotive systems. Written to current ASE tasks and standards, the text covers all tasks of the A6 (Automotive Electricity and Electronics) and A8 (Automotive Engine Performance) ASE certification areas. Each chapter includes practical examples and step-by-step photo sequences covering terminology, best practices, and on-the-job procedures. The 8th edition has been revised with more concise chapters and with new chapters on air management systems, security and immobilizer systems, and safety, comfort, and convenience accessories. Contact your Pearson representative to ask about bundling this text with the ASE Test Prep and Study Guide and ASE Correlated Task Sheets workbook.

TODAY'S TECHNICIAN: AUTOMOTIVE ENGINE REPAIR & REBUILDING, 5th Edition delivers the theoretical and practical knowledge you need to repair and service modern automotive engines and prepare for the Automotive Service Excellence (ASE) certification exam. Designed around National Automotive Technicians Education Foundation (NATEF) standards, this system-specific text addresses engine construction, engine operation, intake and exhaust systems, and engine repair, as well as the basics in engine rebuilding. Move your career forward with discussions about advancements in hybrid technology, factors affecting engine performance, and the designs and functions of modern component parts. Long known for its technical accuracy and concise writing style, TODAY'S TECHNICIAN: AUTOMOTIVE ENGINE REPAIR & REBUILDING, 5th Edition revs up your reading experience with realistic line drawings, detailed photos, critical thinking questions, and much more! Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.

THE CLASSIC BOOK THAT HAS INSPIRED MILLIONS A penetrating examination of how we live and how to live better Few books transform a generation and then establish themselves as touchstones for the generations that follow. Zen and the Art of Motorcycle Maintenance is one such book. This modern epic of a man's search for meaning became an instant bestseller on publication in 1974, acclaimed as one of the most exciting books in the history of American letters. It continues to inspire millions. A narration of a summer motorcycle trip undertaken by a father and his son, Zen and the Art of Motorcycle Maintenance becomes a personal and philosophical odyssey into fundamental questions on how to live. The narrator's relationship with his son leads to a powerful self-reckoning; the craft of motorcycle maintenance leads to an austere beautiful process for reconciling science, religion, and humanism. Resonant with the confusions of existence, this classic is a touching and transcendent book of life. This new edition contains an interview with Pirsig and letters and documents detailing how this extraordinary book came to be.

Automotive Machining and Engine Repair

Shop Manual for Automotive Engine Repair and Rebuilding

A Care & Repair Guide For: Lawn Mowers, Snowblowers & Small Gas-Powered Imple

Automotive Electricity and Electronics Shop Manual

A Practical Approach to Motor Vehicle Engineering and Maintenance

Unsurpassed in coverage of the theory and procedures for automotive electricity and electronics, the newest edition of this highly successful classroom and shop manual is guaranteed to instill both the knowledge and skills critical to success in the industry. TODAY'S TECHNICIAN: AUTOMOTIVE ELECTRICITY & ELECTRONICS, 5TH EDITION has been updated to offer a more streamlined presentation of diagnostic and service procedures, as well as additional attention to data bus networks, including the CAN, LIN, ISO, and other common systems. The book also features expanded coverage of vehicle accessory systems, including the new multi-stage air bag systems, weight classification systems, side air bag systems, and laser-guided cruise control systems. An all-new chapter on hybrid and high voltage systems rounds out the up-to-date content, ensuring readers gain a strong working knowledge that of the latest industry trends and technologies. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.

Understanding fuel injection and engine management systems is the key to extracting higher performance from today's automobiles in a safe, reliable, and driveable fashion. Turbochargers, superchargers, nitrous oxide, high compression ratios, radical camshafts: all are known to make horsepower, but without proper understanding and control of fuel injection and other electronic engine management systems, these popular power-adders will never live up to their potential and, at worst, can cause expensive engine damage. Drawing on a wealth of knowledge and experience and a background of more than 1,000 magazine articles on the subject, engine-control expert Jeff Hartman explains everything from the basics of fuel injection to the building of complex project cars. Hartman covers the latest developments in fuel-injection and engine management technology applied by both foreign and domestic manufacturers, including popular aftermarket systems. No other book in the market covers the subject of engine management systems from as many angles and as comprehensively as this book. Through his continuous magazine writing, author Jeff Hartman is always up-to-date with the newest fuel-injection and engine management products and systems.

A complete, step-by-step guide to the entire engine rebuilding process. Every step is fully illustrated. Covers the most popular engines. Everything you'll need to know to do-it-yourself. In a clear, easy-to-follow format. What you can learn: Includes 262, 265, 267, 283, 302, 305, 307, 327, 350, 396, 400, 402, 427 and 454 cubic inch V8 engines: • Diagnosis • Overhaul • Performance • Economy modifications Book Summary: • Engine identification • Tools and equipment • Diagnosis • Cylinder head servicing • Engine removal and installation • Step-by-step procedures • Fully illustrated with over 300 photos • Tips from professionals • Machine shop repairs • Performance and economy modifications Table of Contents: Chapter 1: Introduction Chapter 2: Tools and equipment Chapter 3: Diagnosing engine problems Chapter 4: Preparing for an overhaul Chapter 5: Overhauling the cylinder heads Chapter 6: Overhauling the engine

block Chapter 7: Reassembling and installing the engine Chapter 8: Related repairs Chapter 9: Improving performance and economy

TODAY'S TECHNICIAN: AUTOMOTIVE ENGINE REPAIR & REBUILDING, CLASSROOM MANUAL AND SHOP MANUAL, Sixth Edition, delivers the theoretical and practical knowledge technicians need to repair and service modern automotive engines and prepare for the Automotive Service Excellence (ASE) Engine Repair certification exam. Designed to address all ASE Education Foundation standards for Engine Repair, this system-specific text addresses engine construction, engine operation, intake and exhaust systems, and engine repair, as well as the basics of engine rebuilding. Forward-looking discussions include advances in hybrid technology, factors affecting engine performance, and the design and function of modern engine components. Long known for its technical accuracy and concise writing style, the Sixth Edition of this reader-friendly text includes extensive updates to reflect the latest ASE Education Foundation standards, new information on current industry trends and developments, additional drawings and photos, and a variety of electronic tools for instructors. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.

Automotive Automatic Transmission and Transaxles

How to Rebuild Any Automotive Engine

How to Tune and Modify Automotive Engine Management Systems - All New Edition

Automotive Engines: Theory and Servicing, 5/e (With CD)

The second edition of Automobile Mechanical and Electrical Systems concentrates on core technologies to provide the essential information required to understand how different vehicle systems work. It gives a complete overview of the components and workings of a vehicle from the engine through to the chassis and electronics. It also explains the necessary tools and equipment needed in effective car maintenance and repair, and relevant safety procedures are included throughout. Designed to make learning easier, this book contains: Photographs, flow charts and quick reference tables Detailed diagrams and clear descriptions that simplify the more complicated topics and aid revision Useful features throughout, including definitions, key facts and 'safety first' considerations. In full colour and with support materials from the author's website (www.automotive-technology.org), this is the guide no student enrolled on an automotive maintenance and repair course should be without.

This complete textbook provides detailed content on the theory of operation, diagnosis, repair, and rebuilding of automotive engines. In addition to essential technical expertise, the text helps users develop the skills and knowledge they need for professional success, including critical thinking and awareness of key industry trends and practices. The text emphasizes universal repair techniques and case histories based on real-world scenarios to prepare users for careers in the field. Instructor resources include lesson plans, customizable lab sheets that address NATEF Standards, a customizable test bank with questions based on chapter content, presentations in PowerPoint, and more. Now updated with new, full-color images and information on the latest trends, tools, and technology—including hybrid engines and high-performance components—AUTOMOTIVE ENGINES: DIAGNOSIS, REPAIR, REBUILDING, Seventh Edition, is the ideal resource for automotive programs who want a complete teaching package for their Engines course. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.

The photos in this edition are black and white. There comes a time in every automobile's life when the engine just doesn't perform as it should anymore. It may be burning oil, it may be leaking, the compression may be so low that it only starts on cold days, or maybe it just isn't very efficient anymore. When all of this happens, you have to decide whether to just dump the car and replace it, or add some new life to your old car by rebuilding the engine. Rebuilding the engine in any used car, much less a classic, seems like a much more attractive option when you can save a lot of money by doing it yourself. Sometimes the savings are the difference between keeping your car or letting it go. If you want to keep your car running strong and lasting for years, this is the book for you. A part of CarTech's Workbench Series, "How to Rebuild Any Automotive Engine" covers the basics of any engine rebuild in more than 400 photos of step-by-step instruction. Subjects covered include preparation and tool requirements, engine removal, engine disassembly, machine work and clean-up, short-block assembly, final engine assembly, installation, start-up, and break in. Also visited are the options of purchasing crate engines, remanufactured engines, and performance upgrades. This book applies to all cars on the road that feature an internal combustion engine. Spend a little on this book and save hundreds of dollars down the road.

Ford was unique in that it had two very different big-block engine designs during the height of the muscle car era. The original FE engine design was pioneered in the late 1950s, primarily as a more powerful replacement for the dated Y-block design. What began as torquey engines meant to move heavyweight sedans morphed into screaming high-performance mills that won Le Mans and drag racing championships throughout the 1960s. By the late 1960s, the FE design was dated, so Ford replaced it with the 385 series, also known as the Lima design, in displacements of 429 and 460 ci, which was similar to the canted-valve Cleveland design being pioneered at the same time. It didn't share the FE pedigree of racing success, mostly due to timing, but the new design was better in almost every way; it exists via Ford Motorsports' offerings to this day. Beginning in 1971, the 429 found its way between the fenders of Mustangs and Torinos in high-compression 4-barrel versions called the Cobra Jet and Super Cobra Jet, and they were some of the most powerful passenger car engines Ford had ever built. If the muscle car era had not died out shortly after the release of these powerful engines, without a doubt the 429 performance variants would be ranked with the legendary big-blocks of all time. In this revised edition of How to Rebuild Big-Block Ford Engines, now titled Ford 429/460 Engines: How to Rebuild, Ford expert Charles Morris covers all the procedures, processes, and techniques for rebuilding your 385 Series big-block. Step-by-step text provides details for determining whether your engine actually needs a rebuild, preparation and removal,

disassembly, inspection, cleaning, machining and parts selection, reassembly, start-up, and tuning. Also included is a chapter in building the special Boss 429 engines, as well as a bonus chapter on the Ford 351 Cleveland, Ford's little brother to the big-block.

Automotive Engines: Diagnosis, Repair, and Rebuilding

Automotive Engine Performance, Classroom and Shop Manuals, Loose-Leaf Version

Automotive Engine Performance

Today's Technician: Automotive Engine Repair & Rebuilding, Classroom Manual and Shop Manual, Spiral bound Version

Auto Engine Repair

This second edition has been updated throughout to provide the theory and hands-on experience in engine performance. Students and technicians will find coverage of engine design operations, ignition systems, emission controls, and OBDII systems in the Classroom Manual. Located in the Shop Manual at the end of each chapter are two new features: Job Sheets and ASE Challenge questions, providing a format for students to perform the tasks covered in each chapter, and questions reflecting the actual content of ASE certification tests.

Teaches students to diagnose, service, and repair all makes and models of gasoline and diesel engines.

Nichols' Chilton Labor Guide Manual provides estimated repair times for nearly every automotive repair procedure imaginable. Packed with all new labor time estimates, the 2002 edition has been created to realistically reflect today's repair industry standards. This manual features accounting for vehicle age and wear and tear, transaxles/transmissions service and repair, and wide acceptance by extended warranty companies, and more.

The theory and service of modern automotive engines is at the heart of this new edition. It includes practical information on variable valve timing systems, hybrid and other advanced technology vehicles, plus more engine performance diagnostic information and current NATEF content.

Occupational Outlook Handbook

An Inquiry Into Values

Today's Technician: Automotive Electricity and Electronics

Today's Technician: Automatic Transmissions and Transaxles Classroom Manual and Shop Manual

Today's Technician: Basic Automotive Service and Systems, Classroom Manual and Shop Manual

Ford FE engines, which were manufactured from the late 1950s all the way through the mid-1970s, were designated as the large-displacement engines in the Ford lineup. FE means Ford Edsel, and reflects an era when Ford sought to promote the Edsel name. The design of these engines was implemented to increase displacement over its predecessor, the Y-Block engines of the previous decade. Early models were fairly modest in displacement, as were most big-blocks of the era, but they grew quickly to fill the needs of rapidly changing chassis requirements and consumer demand for larger vehicles. As it grew, the FE engine performed admirably as a heavy passenger car and light truck engine. It also became quite accomplished in performance circles, winning the 24 Hours of Le Mans, as well as powering Ford's muscle car and drag racing programs in the mid- to late 1960s. In this book, you will learn everything you need to know to rebuild one of these legendary engines. CarTech's unique Workbench series format takes you step-by-step through the entire rebuilding process. Covered are engine identification and selection, disassembly, cleaning, parts analysis and assessment, machine shop processes, replacement parts selection, re-assembly and start-up/break-in techniques. Along the way you find helpful tips on performance upgrades, trouble spots to look for, special tools required, and professional builder's tips. FE master, owner of Survival Motorsports, and veteran author Barry Raboutnick shares all of his tricks and secrets on building a durable and reliable FE engine. Whether you are simply rebuilding an old truck for reliable service use, restoring a 100-point show car, or building the foundation for a high-performance street and strip machine, this book will be an irreplaceable resource for all your future FE engine projects.

The 6th Edition of TODAY'S TECHNICIAN: AUTOMOTIVE BRAKE SYSTEMS is a comprehensive text that equips readers to confidently understand, diagnose, and repair today's brake systems. Using a unique two-volume approach, the first volume (Classroom Manual) details the theory and application of the total brake system, subsystem, and components, while the second (Shop Manual) covers real-world symptoms, diagnostics, and repair information. Known for its comprehensive coverage, accurate and up-to-date details, and abundant illustrations, the text is an ideal resource to prepare for success as an automotive technician or pursue ASE certification. Now updated with extensive information on new and emerging technology and techniques—including hybrid vehicles, brake by wire, and electric brakes—the Sixth Edition also aligns with the NATEF 2012 accreditation model, including job sheets correlated to specific AST and MAST tasks. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.

Automotive Automatic Transmission and Transaxles, published as part of the CDX Master Automotive Technician Series, provides students with an in-depth introduction to diagnosing, repairing, and rebuilding transmissions of all types. Utilizing a "strategy-based diagnostics" approach, this book helps students master technical trouble-shooting in order to address the problem correctly on the first attempt.

Auto Repair For Dummies, 2nd Edition (9781119543619) was previously published as Auto Repair For Dummies, 2nd Edition (9780764599026). While this version features a new Dummies cover and design, the content is the same as the prior release and should not be considered a new or updated product. The top-selling auto repair guide--400,000 copies sold--now extensively reorganized and updated Forty-eight percent of U.S. households perform at least some automobile maintenance on their own, with women now accounting for one third of this \$34 billion automotive do-it-yourself market. For new or would-be do-it-yourself mechanics, this illustrated how-to guide has long been a must and now it's even better. A complete reorganization now puts relevant repair and maintenance information directly after each automotive system overview, making it much easier to find hands-on fix-it instructions. Author Deanna Sclar has updated systems and repair information throughout, eliminating discussions of carburetors and adding coverage of hybrid and alternative fuel vehicles. She's also revised schedules for tune-ups and oil changes, included driving tips that can save on maintenance and repair costs, and added new advice on troubleshooting problems and determining when to call in a professional mechanic. For anyone who wants to save money on car repairs and maintenance, this book is the place to start. Deanna Sclar (Long Beach, CA), an acclaimed auto repair expert and consumer advocate, has contributed to the Los Angeles Times and has been interviewed on the Today show, NBC Nightly News, and other television programs.

Automotive Engine Repair and Rebuilding
Small Engines and Outdoor Power Equipment, Updated 2nd Edition
Automotive Engine Repair
Inspection, Maintenance, Repair
Ford 429/460 Engines

Updated to reflect the latest trends, technology, and relevant ASE Education Foundation standards, this integrated, two-book set covers theory and hands-on content in separate Classroom and Shop Manual. The innovative approach allows students to learn fundamental climate control theory, including basic physics related to heat transfer, before applying their knowledge through practical, hands-on shop activities. Cross-references in each manual link related material, making it easy to connect classroom learning to lab and shop activity. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.

This outstanding text offers comprehensive understanding of automotive engine repair and rebuilding. The student learns about the theory of engine operations and systems, safety, diagnosis, shop safety, engine machinery, engine removal and disassembly, manifolds and cylinder heads, valve train, cylinder block assembly, engine reassembly and installation. The unique two-book format cross-references the theory presented in the classroom manual and practical procedures and diagnosis offered through the shop. Key terms are identified with first use, cautions and warnings are offered throughout to further the student's understanding. The unique two-book format offers a classroom manual which presents theory, parts and system identification, and the shop manual which addresses diagnostic procedures inspection and repair. The material is organized around ASE task areas for engine repair -- photo sequences aid in comprehension of the material presented -- classroom and shop manuals are cross-reference theory and practical procedures to increase retention -- glossary of terms, case studies, review questions and ASE task tables for each chapter enhance understanding.

Ideal for aspiring and active automotive professionals, TODAY'S TECHNICIAN: AUTOMOTIVE ELECTRICITY & ELECTRONICS, Sixth Edition, equips readers to confidently understand, diagnose, and repair electrical and electronic systems in today's automobiles. Using a unique two-volume approach to optimize learning in both the classroom and the auto shop, the first volume (Classroom Manual) covers the theory and application of electricity, electronics, and circuitry in modern automobiles, while the second (Shop Manual) covers real-world symptoms, diagnostics, and repair information. Known for its comprehensive coverage, accurate and up-to-date technical information, and hundreds of detailed illustrations and vibrant photographs, the text is an ideal resource to prepare for success as an automotive technician or pursue ASE certification. Now updated with extensive information on new and emerging technology and techniques—including audio and infotainment systems, LED and adaptive lighting, hybrid and electric vehicle accessory systems—the Sixth Edition also aligns with the NATEF 2012 accreditation model, including job sheets correlated to specific AST and MAST tasks. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.

The Shop Manual covers real-world symptoms, diagnostics, and repair information. Known for its comprehensive coverage, accurate and up-to-date technical information, and hundreds of detailed illustrations and vibrant photographs, the text is an ideal resource to prepare for success as an automotive technician or pursue ASE certification.

Classroom Manual

How to Rebuild

Automotive Electrical and Engine Performance

Classroom Manual for Automotive Engine Repair and Rebuilding

Automotive Engines

Updated to reflect the latest technology in the automotive industry, this book will provide the knowledge and skills needed to successfully inspect, maintain, and repair vehicles of all makes and models. Automotive Service: Inspection, Maintenance, and Repair, 3E begins by introducing readers to a number of automotive career options, shop management basics, plus necessary tools and equipment. The book then progresses to the theories of vehicle systems operations and includes step-by-step procedures for troubleshooting and repairing all major systems of the modern automobile. Updates include coverage of new vehicle technology like EVAP systems, on-board diagnostics and emissions, alternative fuels, and hybrid vehicles, making this book not only comprehensive but also current so that readers can feel confident they are learning the very latest in industry trends and techniques.

The Seventh Edition of TODAY'S TECHNICIAN: AUTOMOTIVE ENGINE PERFORMANCE is a comprehensive learning package designed to build automotive skills in both classroom and shop settings. Following current ASE Education Foundation criteria, this two-manual set examines each of the major systems affecting engine performance and drivability—including intake and exhaust, sensors, computerized engine controls, fuel, ignition, and emissions. The Classroom Manual addresses system theory, while a coordinating Shop Manual covers tools, procedures, diagnostics, testing, and service. The new Seventh Edition features updates to cover the latest automotive technologies and take automotive technician training to new levels.

This two book set—a Classroom Manual and a Workshop Manual—provides a current and deep technical discussion of engine rebuilding and repair. This revision, written by a new author, has greatly reorganized the Workshop manual to eliminate duplicate material and improve the correlation between the two books. Provides users with an excellent resource in preparation for ASE Certification tests. In addition to the latest information about lubricants, engine design, and manufacturing, the books cover the following key topics: OSHA safety self-inspection worksheets; Engine parts, operation, and construction; Engine physics and chemistry; cooling systems; intake and exhaust systems; Tools for engine rebuilding; Engine testing and diagnosis; Engine removal, disassembly, general inspection, and cleaning. For auto mechanic professionals, those preparing for the ASE

Certification Exam, or for use as a reference tool for those seeking a good foundation in theory and repair of engines.

This comprehensive resource provides detailed content on the theory of operation, diagnosis, repair, and rebuilding of automotive engines. Students will gain essential technical expertise as they develop the skills and knowledge they need for professional success, including critical thinking and awareness of key industry trends and practices. AUTOMOTIVE ENGINES: DIAGNOSIS, REPAIR, AND REBUILDING, Eighth Edition, emphasizes universal repair techniques and case histories based on real-world scenarios to prepare users for careers in the field. Instructor resources include lesson plans, customizable lab sheets that address ASE Education Foundation Standards, a customizable test bank with questions based on chapter content, PowerPoint presentations, and more. Now updated with new, full-color images and information on the latest trends, tools, and technology--including hybrid engines and high-performance components--this trusted text is the ideal resource for automotive program instructors who want a complete teaching package for their Engines course. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.

Today's Technician: Automotive Brake Systems, Classroom and Shop Manual Prepack

Today's Technician

Nichols' Chilton Labor Guide 2002

Automotive Service

Engine Repair

Today's Technician: Automotive Engine Repair & Rebuilding, Classroom Manual and Shop Manual, Spiral bound Version Cengage Learning

This brand new title in the Today's Technician Series covers the advanced topics of drivability, emissions testing, and engine diagnostics in depth. This new book features a thorough study of On-Board-Diagnostic generation II (OBD II) Continuous Monitors and Non-Continuous Monitors strategies, a chapter on Emission Control and Evaporative Systems, OBD II generic Diagnostic Trouble Codes identification and diagnosis, and Malfunction Indicator Light Strategies. Advanced use of On-Board Diagnostic Scanners and Digital Storage Oscilloscopes is also discussed. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.

Modern Automotive Technology Instructor's Wraparound Edition

Ford FE Engines

Today's Technician: Automotive Brake Systems, Classroom and Shop Manual Pre-Pack

Version 3.0

How to Rebuild the Small-Block Ford