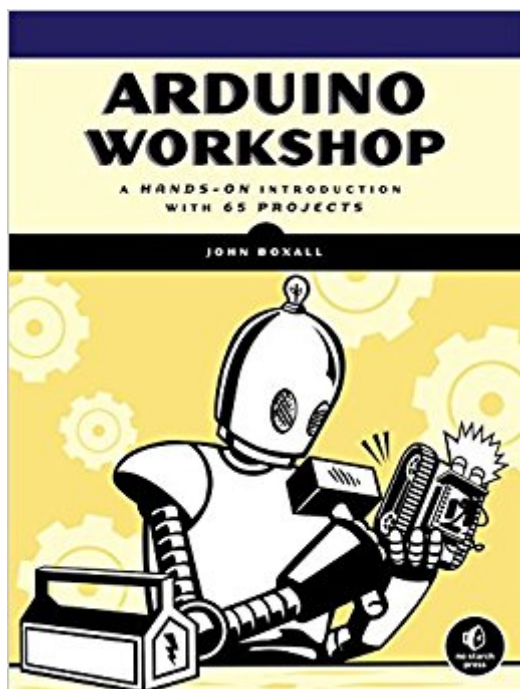


The book was found

# Arduino Workshop: A Hands-On Introduction With 65 Projects



## Synopsis

The Arduino is a cheap, flexible, open source microcontroller platform designed to make it easy for hobbyists to use electronics in homemade projects. With an almost unlimited range of input and output add-ons, sensors, indicators, displays, motors, and more, the Arduino offers you countless ways to create devices that interact with the world around you. In *Arduino Workshop*, you'll learn how these add-ons work and how to integrate them into your own projects. You'll start off with an overview of the Arduino system but quickly move on to coverage of various electronic components and concepts. Hands-on projects throughout the book reinforce what you've learned and show you how to apply that knowledge. As your understanding grows, the projects increase in complexity and sophistication. Among the book's 65 projects are useful devices like: a digital thermometer that charts temperature changes on an LCD; a GPS logger that records data from your travels, which can be displayed on Google Maps; a handy tester that lets you check the voltage of any single-cell battery; a keypad-controlled lock that requires a secret code to open. You'll also learn to build Arduino toys and games like: an electronic version of the classic six-sided die; a binary quiz game that challenges your number conversion skills; a motorized remote control tank with collision detection to keep it from crashing. *Arduino Workshop* will teach you the tricks and design principles of a master craftsman. Whatever your skill level, you'll have fun as you learn to harness the power of the Arduino for your own DIY projects. Uses the Arduino Uno board

## Book Information

Paperback: 392 pages

Publisher: No Starch Press; 1 edition (May 13, 2013)

Language: English

ISBN-10: 1593274483

ISBN-13: 978-1593274481

Product Dimensions: 7.1 x 1 x 9.2 inches

Shipping Weight: 1.9 pounds (View shipping rates and policies)

Average Customer Review: 4.5 out of 5 stars 142 customer reviews

Best Sellers Rank: #101,608 in Books (See Top 100 in Books) #31 in Books > Engineering & Transportation > Engineering > Electrical & Electronics > Electronics > Microelectronics #44 in Books > Computers & Technology > Hardware & DIY > Single Board Computers #71 in Books > Computers & Technology > Computer Science > Robotics

## Customer Reviews

John Boxall has been writing Arduino tutorials, projects, and kit and accessory reviews for several years at <http://www.tronixstuff.com>. Arduino Workshop is his first book.

I have never worked with an Arduino let alone having almost no experience with reading schematics for electronics. Though I wish there was a little more explanation on how the schematics translate onto a breadboard (hence the 4/5 stars) I think this is a great tool for beginners. I've been working my way through the book, and have so far made working buttons that turn on LEDs to more complicated circuits like simulating a traffic light. I would advise anyone picking up this book to get a decent Arduino starter kit (with stuff like resistors, input buttons, LEDs, etc.) since most of the time the local Radioshack is either A.) out of business or B.) doesn't have the right parts. The book also teaches you the basics (and the more complicated syntax/commands) of Arduino's programming language. Essentially, you get the fundamental building blocks of knowing exactly how to talk to your Arduino. It's exciting, especially as a person new to programming and circuits, to be able to manipulate digital inputs/outputs and work with electricity. Aside from wanting a little more when it comes to reading schematics (it does tell you what the symbols mean) this is a great book for beginners.

Late to the Arduino game, as a long-time software developer found this book superb in its presentation. Hard to find any fault with it, its not a reference work more of a practical applications / real world implementation book. Have had a lot of software development related books and this stuff is hard to present in an easy-to-consume manner & this author does it here.

Finally someone that actually knows how to properly write code. John writes code the way I was taught when I was in University. Well thought out and planned with everything in the correct order. This book provides not only the fun stuff but also a valuable guide for programming correctly and a good basic understanding of how everything works. This book is a must for the beginner and advanced users. Great projects beyond the simple training kits and done properly.

Yes! This is the one! If you are using Arduino or Raspberry Pi personally, or in your classroom, this is the kit book that you want. It really is fantastic! Lots of great ideas, and everything is explained really well. I had a small group of middle school students working with Arduino as an independent study program, and they found this book to be invaluable! Well done, writers, and thank you!

Many of the Arduino books focus on creating a project with just a little bit of information about how it actually works. This book sheds light on how the Arduino works and has projects that build on one another (much better to do that than create a project, take it apart, then create a new, even more complex, project from scratch!) In addition, he covers fundamentals in electricity and how to read electrical diagrams which is a key area where the other books I've purchased lack. I've been working in technology as a software developer and IT leadership for almost 20 years and I'm impressed in the way that he teaches/describes fundamentals of programming. Again, in this area he does a great job of building on information you previously learned and demonstrating key concepts in programming. I finished a couple projects using a couple of other books, then picked up this book and the lights came on! Excellent work by the author to create a technical reference that is readable to the lay-person. This is by far one of the best technical books I've seen in my career.

I am a noob to Arduinos. I fiddled with some online tutorials and got the hang of it. Within a couple of hours I had a fully functional dice rolling sketch with 7 LEDs (to mimic the pips on a die) and had it rolling random rolls, and then slowing down when you release a push-button, until it lands on a final number, with sound (thanks to a micro speaker.) I did all that without this book. However, this book takes you from this level (or even simpler) and walks you through some really advanced project ideas, and shows you exactly how a lot of the equipment works that you can get for an Arduino. I find this an incredibly useful teaching guide and project suggester. Thanks!

I purchased this because of the other reviews, most of which were very positive. I'm just getting in to Arduino, and so far this book is a great help. It's very well written, and has excellent clear easy to understand pictures. I'm not a 'techy' but like to tinker. This book is interesting - not just because I brought an Arduino but it is an interesting book. The projects go from very simple to what at the moment look impossible, but with the way the projects are explained I am confident I'll manage without too much difficulty. If you have or are thinking of getting into this Arduino business get this book. Very highly recommended.

This is such a great book for beginners and intermediates! I've done a few sketches, mostly learning through cut and paste, or modifying variables to see how that affects the outcome. Then I got this book, and I have learned so much more about the commands I was already using, how to use them, and what they do. This book takes a great approach to building something small and then adding on to it over and over again. Couple items that I think need to be covered by errata though (based on

the 4th printing):Pg 76 - The picture and the diagram are not wired the same. The picture has the buttons wired to pins 13 and 7, but the diagram has them wired to 13 and 3.Pg 125 - "For example, to change the first element in temperatures[] (currently 16.6) to 12.34..." the first element (0) is actually 11.1, 16.6 is the last element (5) in the array as listed).Pg 189 - "At (2) we introduce the char variable" - the actual (2) should be moved to the line that says "char keys[ROWS][COLS]="

[Download to continue reading...](#)

Arduino Workshop: A Hands-On Introduction with 65 Projects Beginning C for Arduino, Second Edition: Learn C Programming for the Arduino Make: Lego and Arduino Projects: Projects for extending MINDSTORMS NXT with open-source electronics Make: Sensors: A Hands-On Primer for Monitoring the Real World with Arduino and Raspberry Pi Math Projects: 50 Hands-On Projects that Correlate to Specific Math Concepts, Grades 5-8+ 30 Arduino Projects for the Evil Genius, Second Edition Arduino Cookbook: Recipes to Begin, Expand, and Enhance Your Projects Make: Arduino Bots and Gadgets: Six Embedded Projects with Open Source Hardware and Software (Learning by Discovery) ESP8266: Programming NodeMCU Using Arduino IDE - Get Started With ESP8266 (Internet Of Things, IOT, Projects In Internet Of Things, Internet Of Things for Beginners, NodeMCU Programming, ESP8266) Arduino Projects for Amateur Radio (Electronics) Arduino Project Handbook: 25 Practical Projects to Get You Started Arduino Project Handbook, Volume II: 25 More Practical Projects to Get You Started Make: Bluetooth: Bluetooth LE Projects with Arduino, Raspberry Pi, and Smartphones GSM & GPS Projects With Arduino Basic Arduino Projects: 26 Experiments with Microcontrollers and Electronics Building iPhone and iPad Electronic Projects: Real-World Arduino, Sensor, and Bluetooth Low Energy Apps in techBASIC Arduino Model Railroad Signals: And Other Projects The Arduino Inventor's Guide: Learn Electronics by Making 10 Awesome Projects Positive Discipline Workshop 5 CD Set: An audio workshop with Jane Nelsen Making Small Workshop Tools (Workshop Practice)

[Contact Us](#)

[DMCA](#)

[Privacy](#)

[FAQ & Help](#)