



BikeDepot

6-Part Master Mechanics Class Handout

This Class will teach you about the repairs that go into the complete overhaul of a bicycle. You will learn to do the work yourself using a variety of specialized tools. The course is based on the Park Tool Big Blue Book of Bicycle Repair. This handout outlines the chapters covered in each session. In order to get the most out of the class sessions, we suggest that you look over the chapters before each class. Your instructor will demonstrate how to perform the tasks covered in each session, then you will have the opportunity to complete each repair. Expect to get your hands dirty. Enjoy!

About The Bike Depot

Bike Depot is a 501c3 Non-profit founded in 2008 by Live Well Colorado's Park Hill Thriving Communities Partnership. We have a full-service bike shop, retail store, and run classes for all ability levels. Bike Depot is run mostly by volunteers and fueled by donated bikes. BD also offers Fix-Your-Bike hours for cyclists to work on their own bikes- all skill levels welcome.

Week One:

Anatomy, Maintenance and Fix-a-Flat

Chapters 1 & 2

Chapter 1: Basic Mechanics pp. 4-6

- Repair stands
- Anatomy (map pp 247, glossary pp 222)
- Maintenance- Cleaning, lubing, diagnosing problems (schedule pp 9, bike wash p 222)
- Tool Suggestions

Chapter 2: Tires & Tubes pp. 12-29

- Fix-a-Flat

Week Two:

Brakes

Chapters 11 & 12

Chapter 12: Rim Brakes pp. 162-174

- Replacing pads and cables
- Adjusting the brakes

Chapter 11: Disc Brakes pp. 142-158

- Intro to Mechanical Disc Brakes

Week Three:

Shifting Gears

Chapters 8 & 9

Chapter 8: Chains pp. 94-105

-Removing and replacing the chain

Chapter 9: Shifting pp. 108-130

-Drive-train overview
-Setting the limit screws
-Adjusting cable tension and index shifting

Week Four:

Wheels

Chapters 3-5

Chapter 3: Rear Sprockets pp. 32-37

-Removing cassettes vs freewheels

Chapter 4: Hubs pp. 40-51

-Rebuilding hubs

Chapter 5: Wheel Truing pp. 54-63

-Wheel Dynamics (lateral, radial, dish)
-Wheel Truing

Week Five:

Stems, Headsets and Handlebars

Chapters 13 & 14

**Chapter 13: Bars, stems, saddles and seat posts
pp. 178-183**

-Removing and replacing

Chapter 14: Headsets pp.186-200

-Overhauling and adjusting

Week Six

Bottom Brackets, Cranks

Practice and Review

Chapter 7

**Chapter 7: Cranks, bottom brackets, chainrings
pp. 74-91**

-Crank removal
-BB maintenance, overhaul, adjustment
-Chart to select Ball-bearings tool p. 85

Q&A and option for review

-Bring your own bike project



Volunteer

Want to put your new skills into practice? Sign up through our website to volunteer at the Bike Depot. Volunteer opportunities for Wrenching, Retail greeter, Program assistance, Bike Rodeo Wrangler, and Administrative support are currently available.

