



Table Of Contents

Chapter 1: Introduction to Small-Block Chevy Cams and Valvetrains

Basics

Where We're Headed

Chapter 2: Camshaft Basics

Camshaft Types

Lobe Prospecting – Duration

Lobe Centerlines

Advance or Retard

Overlap

Overlap Specialties

Exhaust Closing

Lobe Profiling

Conclusion

Chapter 3: Roller Cams

Mechanical vs. Hydraulic Rollers

Pluses and Minuses

Mechanical Rollers

Street Rollers

Converting From Flat to Roller

Conclusion

Chapter 4: Valvetrain Overview

Evolution

Chapter 5: Valves, Springs, Retainers, and Keepers

Valves

Springs 1

Retainers and Keepers

Seals

Conclusion

Chapter 6: Rocker Arms, Studs, Pushrods, and Lifters

Rocker Arms

It's All in the Ratio

Studs and Guideplates

Pushrods

Lifters

Chapter 7: Cam Drives

Practical Applications

Conclusion

Chapter 8: Shaft Rocker Systems

Fulcrum Length

Offset Rockers

Practical Applications

Chapter 9: How To Install and Degree a Cam

Bolt It In

Tools to Get Your Degree

Degree Program

Converting to a Roller Cam

Power Tuning

Lash Loops

Conclusion

Chapter 10: How to Choose a Cam

The Saga of Ricky Racer

Street Compromises

Duration Facts

Chapter 11: Supercharger, Nitrous, and Turbo Cams

Nitrous

Supercharging

Turbocharging

Power Adder Cams

Nitrous Cams

Chapter 12: Valvetrain Dynamics

Valve Float

Valve Toss

Lobe Design

Mass Attack

Conclusion

Chapter 13: Matching Cams and Cylinder Heads

Port Flow

Cams and Cylinder Heads

Conclusion

Chapter 14: Dyno Tests

Engine 1

Engine 2

Engine 3

Engine 4

Engine 5

Engine 6

Engine 7

Engine 8

Source Guide