

Table of Contents

Chapter 1. OpenSCAD and 3D Printing1

Cloud Computing.....	5
In Summary	5

Chapter 2. OpenSCAD Basics7

Parameters.....	10
Comments	11
Rectangular Prisms and Cones	12
The Polyhedron.....	15
In Summary	16

Chapter 3. Operations.....17

Differencing	20
Scaling and Resizing.....	22
Mirroring.....	22
Intersection	23
Math and Variables.....	24
Printing	27
A Simple Panel	29
Summary	33

Chapter 4. Two Dimensions and Extrusions.35

Extruding Imports	38
Copying a Flat Solid Object	38
GIMP	39
Inkscape	41
OpenSCAD	42

Print!	44
Wrap Up.....	45
Chapter 5. Programming OpenSCAD.....	47
Variables	47
Modules and Functions.....	47
For Loops.....	50
Thingiverse Customizer	57
Wrap Up.....	59
Chapter 6. Libraries	61
Some Predefined Libraries	62
Wrap Up.....	65
Chapter 7. Advanced Topics	67
Strings	67
Importing STL	67
Advanced Transforms.....	68
Projection	70
Wrap Up and Summary	71
Thanks	73