

10/22 Review for Midterm Next Monday Oct. 27, 2014

Format Chapters 2, 3 + 4

- 10 short questions like quizzes
- 2 problems (3 + 4)
- 1 Miller Index (Ch. 3)

Equations will be given yet need to know the components

Slides to look at

Ch. 2 - 2, 4, 5, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 20, 21, 24

MOST  
IMPORTANT

Ch. 3 - 4, 5, 8, 9, 10, 11-15, 16, 18, 19, 21, 22, 23

Ch. 4 - 5, 10 - 12

- \* Quantum numbers
- \* be able to write electron configuration
- \* Know about valance electrons
- \* Ionic Bonding - Element loses an electron
- \* Deep vally equilibrium pt 18
- \* Covalent Bonding - sharing of electrons
- \* Secondary Bonding very weak
- \* Look at cubic avoid mono + tri-dinic crystal structures

	SC	BCC	FCC
# atoms	1	2	4
$a = r$	$a = 2r$	$\sqrt{3}a = 4r$	$\sqrt{2}a = 4r$
Edges		Along the body diagonal	diagonal
APF	.52	.68	.74

\* Theoretical Density  $\rho$

\* Linear Density (7) + Planar density (11) + 14

\* Ch 3 most important chapter

Ch 4 slides 3, 4, 5, 7, 9, 10, 13, 14, 15

Possible draw

KNOW Equation

Ch 4 cont. 4 + 18, 17, 18

ASTM know on Ch 4 cont.