

ASTRONOMY 14 – FALL 2017

GENERAL SCHEDULE OF ACTIVITIES

WEEK #	LAB MEETING DAYS	TOPICS AND LAB EXERCISES	TEXTBOOK READING	FIELD ACTIVITY (THURSDAYS)	MOON PHASE
1	8/22 8/24	Introduction and enrollment check. Overview of course and equipment to be used (telescopes, cameras, film, accessories, CCD's and software). Measuring Angles in the Sky Lab –Using the Sky I-A		—	Wax. Cres.
2	8/29 8/31	Telescope set-up and take down, Tel-Rad, eyepieces and focusing. Telescopes, parameters and definitions. Lab – Celestial Tools I-B (parts I and II) Or Lab- Essentials of the Telescope I-E	Ch. 1	Telescope use and Sky Tour <i>Blue Canyon</i>	Wax. Gib.
3	9/5 9/7 Monday Holiday	Cameras, lenses, film, terminology Astrophotography documentation (the green book). Lab – Intro to digital astrophotography II-B (parts I and II) Or Lab – Celestial Tools I-B (part III) Lab- Essentials of the Telescope I-E OR Lab – The Workings of a Telescope I-D (parts I and II)	Ch. 4 (pp. 62-82)	Sky Tour/Star Trails/ Tripod Wide Field/Lunar <i>Blue Canyon</i>	Wan. Gib.
4	9/12 9/14	Piggyback imaging and more Telescope parameters Lab- Essentials of the Telescope I-E Lab – Celestial Tools (part III) OR Lab – Afocal/prime focus photography (terrestrial and solar) II-C OR Lab – FOV I-C (1 or 2 parts) OR Lab – The Workings of a Telescope I-D (parts I and II)	Ch. 4 (pp. 62-82) Supplemental handout(5)	Telescope use and Sky Tour/Lunar (if needed) <i>Blue Canyon</i>	Wan. Cres.
5	9/19 9/21	Tracking, polar alignment, barn door tracker Prime focus photography (planets, moon and sun) Lab – FOV I-C and Quiz! OR Lab – Afocal/prime focus photography (terrestrial and solar) II-C	Supplemental handout(9)	Wide field digital/ Piggyback <i>Blue Canyon</i>	Wax. Cres
6	9/26 9/28	Lab – Afocal/Prime focus photography (terrestrial and solar) II-C OR CCD Imagery II-D OR Lab – Using a Robotic Telescope II-F		Prime Focus <i>Blue Canyon</i>	1 st Quarter
7	10/3 10/5	Mid-Term Plus (perhaps) Lab – Using a Robotic Telescope II-F		Digital / afocal photography/lunar or CCD <i>Blue Canyon</i>	Full

GENERAL SCHEDULE OF ACTIVITIES (continued)

WEEK #	LAB MEETING DAYS	TOPICS AND LAB EXERCISES	TEXTBOOK READING	FIELD ACTIVITY	MOON PHASE
8	10/10 10/12	CCD imaging, focus, calibration (bias, darks, flats). Imaging session planning, data management. Lab – Using a Robotic Telescope II-F Lab – CCD Imagery II-D Take Pictures with Robotic Telescope?	Ch. 3 (pp 36-53) Ch. 5 (pp 94-104; pp. 117-120) Supplemental handout(11)	Astrophotography / CCD imaging <i>Pliot Hill/Blue Canyon/NCC</i>	3 rd Quarter
9	10/17 10/19	Scanning pictures and Basic Image Processing w/ PhotoShop Lab - Image processing III-A (Photoshop) Lab – TheSky Review or Lab – Afocal photography (solar) II-C Take Pictures with Robotic Telescope?	Ch. 4	Astrophotography / CCD imaging <i>PILOT HILL/Blue Canyon/NCC</i>	New
10	10/24 10/26	MaxIm DL / CCD imaging . Lab – MaxIm DL III-B	Ch. 2,3 Supplemental (12)	Astrophotography / CCD imaging <i>PILOT HILL/Blue Canyon</i>	1 st Quarter
11	10/31 11/2	Work on Images.	Ch. 2,3,4 Supplemental (13,14)	Astrophotography / CCD imaging <i>PILOT HILL/Blue Canyon</i>	Full
12	11/7 11/9	Work on Images.	-		3 rd Quarter
13	11/14 11/16	Final – Display/Turn-in Portfolio	-		Wan. Cres.
14	11/21 11/23	Pick up Final and Portfolio	-		Wax. Cres.
15	11/28 11/30	Make-up	-		Wax. Gib.
16	12/5 12/7	Make-up	-		Wan. Gib.