Read each section before the lecture. The problems listed are from Rogawski and Adams 3rd edition.

Mon 1/7 and Wed 1/9: Read sections 13.1 and 13.2.

13.1 # 1, 4, 5, 6, 9, 11, 13, 21, 27, 28, 29, 33, 37, 39, 46, 49, 5413.2 # 5, 13, 14, 24, 27, 30, 31, 32

Fri 1/11: Read sections 13.2 and 13.3.

13.2 # 33, 37, 40 50, 52

Mon 1/14: Read sections 13.3 and 13.4.

13.3 # 3, 9, 11, 13, 15, 19, 32, 33, 35, 40, 53, 55, 65, 67

Wed 1/16: Read section 13.4.

13.4 # 3, 4, 5, 9, 11, 13, 15, 17, 19, 21, 30, 34, 41, 43, 44

Fri 1/18: Read sections 13.4 and 13.5.

13.4 # 36, 38, 47 [There is an error in #47, replace S with S(7,3,0).] 13.5 # 1, 5, 10, 11, 13, 17, 18, 19, 21, 22, 23, 27, 28, 36

Mon 1/21: No class.

Wed 1/23: Read sections 13.5 and 13.6.

13.5 # 39, 40, 55, 57, 61, 63, 65, 66

Fri 1/25: Read sections 13.6 and 14.1.

 $13.6 \ \# \ 2, \ 5, \ 7, \ 8, \ 13, \ 14, \ 16, \ 17, \ 19, \ 21, \ 22, \ 24, \ 25, \ 26, \ 27$ $14.1 \ \# \ 2, \ 3, \ 4, \ 7, \ 8, \ 9, \ 10, \ 14, \ 18, \ 20$

Mon 1/28: Read sections 14.1 and 14.2.

 $\begin{array}{l} 14.1 \ \# \ 12, \ 13, \ 21, \ 25, \ 31, \ 32, \ 33, \ 34, \ 39, \ 40 \\ 14.2 \ \# \ 1, \ 3, \ 4, \ 5, \ 7, \ 8, \ 9, \ 13, \ 14, \ 29, \ 30, \ 31, \ 32, \ 33, \ 34, \ 37 \end{array}$

Wed 1/30: Read sections 14.2 and 14.3.

 $14.2 \ \# \ 17, \ 19, \ 20, \ 21, \ 22, \ 23, \ 26, \ 39, \ 40, \ 42, \ 43, \ 50, \ 56, \ 63$ $14.3 \ \# \ 1, \ 3, \ 4, \ 5, \ 9, \ 11, \ 15, \ 20$ Fri 2/1: Exam 1.

No HW

Mon 2/4: Read sections 14.3 and 14.4.

14.3 # 24, 25, 27, 28, 29, 30, 31, 32, 33, 3714.4 # 1, 3, 5, 6

Wed 2/6: Read sections 14.4 and 14.5.

 $14.4 \ \# \ 7, \ 8, \ 9, \ 10, \ 13, \ 24, \ 34, \ 36, \ 37, \ 41, \ 42, \ 44, \ 53, \ 54, \ 55, \ 84 \\ 14.5 \ \# \ 4, \ 6, \ 8, \ 12, \ 16, \ 30, \ 41$

Fri 2/8: Read sections 15.1 and 15.2.

15.1 # 2, 4, 6, 9, 10, 13, 19, 20, 21, 23, 25, 26, 28, 29, 31, 32, 48-51

Mon 2/11: Read section 15.2.

15.2 # 1, 2, 7, 9, 11, 14, 15, 16, 23, 27, 30, 33, 34, 41, 49

Wed 2/13: Read section 15.3.

15.3 # 7, 8, 15, 16, 19, 20, 21, 25, 29, 41, 42, 43, 49

Fri 2/15: Read sections 15.3 and 15.4.

15.3 # 9, 10, 11, 12, 53, 54, 57, 58, 60, 61, 62, 63, 65, 66, 73, 74 [There is an error in #53 part (b), replace both instances of "decreasing" with "increasing."]

Mon 2/18: No class.

Wed 2/20: Read section 15.4.

15.4 # 1, 3, 4, 5, 6, 8, 10, 11, 12, 13, 15, 16, 17, 18, 29

Fri 2/22: Read sections 15.4 and 15.5.

15.4 # 20, 21, 22, 23, 25, 26, 27, 35, 41

Mon 2/25: Read section 15.5.

15.5 # 5, 6, 7, 8, 21, 22, 24, 26, 27, 28, 29, 30, 31, 37, 38

Wed 2/27: Read section 15.5.

 $15.5 \ \# \ 2, \ 3, \ 4, \ 9, \ 10, \ 11, \ 13, \ 14, \ 15, \ 16, \ 18, \ 19, \ 34, \ 35, \ 41, \ 42, \ 43, \ 44, \ 45, \ 46, \ 50, \ 51, \ 52, \ 55, \ 60$

Fri 3/1: Exam 2.

No HW

Mon 3/4: Read section 15.6.

15.6 # 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 15, 16, 17, 18, 20, 23, 25, 26, 27, 28, 29, 30, 37, 39, 40, 42, 43

Wed 3/6: Read section 15.7.

15.7 # 1, 6

Fri 3/8: Read section 15.7.

15.7 # 2, 3, 4, 5, 7, 8, 9, 10, 13, 15, 16, 17, 19, 24, 25, 26, 28, 29, 30, 32 [Note: For problem 4 assume the function has continuous second partials and the Hessian is nonzero at each critical point]

Mon 3/11: Read section 15.7.

15.7 # 33, 34, 35, 36, 37, 38, 39, 40, 44, 45, 46, 47, 48, 49, 50, 52, 53, 54, 55

Wed 3/13: Read section 15.8.

15.8 # 1, 2, 4, 7, 9, 10

Fri 3.15: Read section 15.8.

 $15.8 \ \# \ 5, \ 6, \ 8, \ 11, \ 12, \ 13, \ 14, \ 15, \ 17, \ 18, \ 19, \ 20, \ 23, \ 25, \ 26, \ 27, \ 29, \ 37, \ 38$