

MATH 1501G1/G2/G3: Calculus I
Course Calendar and Homework
Fall 2006

Homework problems refer to Salas, Hille, and Etgen, *Calculus: One and Several Variables*, Ninth Edition, Wiley, 2003.

Date	Topic	Homework
M 21 Aug 2006	Policy, Induction	1.8: 1–5,10,17 and Precalc review (web)
W 23 Aug 2006	Least Upper Bound	10.1: 1–20 odd,21–24,27,28
F 25 Aug 2006	Sequences	10.2: 1–8,9–20 odd,41,42,43,45–61 odd
M 28 Aug 2006	Limits	2.1: 1,4,5,7,11,15,19,20,23,25,34,35,40–42,45,46 2.2: 1–6,17–19,21–26,35–41,46,49–51,54,55 10.3: 1–4,13 (Give ε, N proofs if convergent)
W 30 Aug 2006	Limit Laws	2.3: 1–43 odd,45–51,57–61 odd 10.3: 5–7,9,10,14,36,37
F 1 Sept 2006	Continuity	2.4: 1–16 odd,17,20,27,28,29,31,33,49,50 10.3: 8,21,40,51
W 6 Sept 2006	Pinching Thm, Trig Lims	2.5: 1–37 odd,43,46,47 10.3: 43–46
F 8 Sept 2006	IVT, EVT	2.6: 1–14,19,21–25,29,30,33–35,37
M 11 Sept 2006	Derivative	3.1: 1–6,7–43 odd,49–54,59,65,67
W 13 Sept 2006	Differentiation Formulas dy/dx , higher deriv.	3.2: 1–47 odd,53–57 odd,62,63,69 3.3: 1,6,7,13,15,21,25,26,30–33,37,41,49,51,61
R 14 Sept 2006	TEST I	Covers 2.1–2.6 and 10.1–10.3
F 15 Sept 2006	Rate of Change	3.4: 1–3,7,8,11–13,16,17–25 odd,27–36,45,47,48,51
M 18 Sept 2006	Chain Rule	3.5: 1,5,7–19 odd,23,24,27,29–38,44,57,65,66,71
W 20 Sept 2006	Differentiating Trig. Fns.	3.6: 1–30 odd,33,35,41,43,49,55,58,60,63,67,73
F 22 Sept 2006	Impl. Diff., Rat. Powers	3.7: 1–19 odd,23,25,27–30,33,35,39,42,47,49,53,56
M 25 Sept 2006	Related Rates	3.8: 3,5,7,8,11,13–15,17,19,21,23,28,31,35
W 27 Sept 2006	Mean Value Thm	4.1: 1,4,7–9,12,13,17–23 odd,29,45,46,49
F 29 Sept 2006	Monotonicity, Max/Min	4.2: 1–25 odd,31–45 odd,49,55,64 4.3: 1–27 odd,31,34,35
M 2 Oct 2006	Max/Min	4.3: (see above) 4.4: 1–30 odd,31–34,37–39,41,45,47
W 4 Oct 2006	Max/Min Probs	4.5: 3,5,8,9,17,19,22,23,27–31,33,41,53,55 4.6: 1,2,5,9,13,15,17,19,33,35 4.7: 1–7 odd,13,19,21,25,27,31,43,44 4.8: 5,11,15,33,43,45
F 6 Oct 2006	Curve Sketching	4.6: 1,2,5,9,13,15,17,19,33,35 4.7: 1–7 odd,13,19,21,25,27,31,43,44 4.8: 5,11,15,33,43,45
M 9 Oct 2006	Differentials, N.-R. Meth.	3.9: 3,6,9,13,16,17,19,20,23,27–33 odd,37
W 11 Oct 2006	Definite Integrals	5.2: 3,6,9,15–21 odd,27–32,39,47,49
R 12 Oct 2006	TEST II	Covers 3.1–3.9 and 4.1–4.8
F 13 Oct 2006	Fund. Thm of Calc	5.3: 1–15 odd,19,23–25,29 5.4: 1–37 odd,43,47,53,62–64
W 18 Oct 2006	Area Problems	5.5: 1,5,6,9,11,13,17,23,25,29,33
F 20 Oct 2006	Indef. Integrals	5.6: 1–31 odd,35–39 odd,43,47,53,54
M 23 Oct 2006	u -Substitution	5.7: 1–30 odd,34,35,39,45–49 odd,55,60,63,73,75
W 25 Oct 2006	MVT for Integrals	5.8: 1–10,16,17–23 odd,32,33,35–37 5.9: 1–15 odd,19,25–27,29,32

F 27 Oct 2006	1-1 Functions, Inverses	7.1: 1,5,9,13,17,21,22,25,27-31,35-47 odd,51,53,57
M 30 Oct 2006	Logarithms	7.2: 11-15 odd,17-23 7.3: 1,5,7,8,13-21 odd,25,29,33,39-43 odd,47-53 odd, 57,63-67 odd,73
W 1 Nov 2006	Exponentials	7.4: 1,5,9,11,13,17,19,23,28,35,38,40,41,45,47,51,56, 57,61,64,71 7.5: 1-16,19,21,23,24,25,29-35 odd,43-51 odd, 59-65 odd
F 3 Nov 2006	Exponential Growth	7.6: 1-3,7,10-13,15,17,18,21,23,24,33
M 6 Nov 2006	Inverse Trig. Functions	7.7: 1,5,9,11,16,17,25,29,31,33,37,39-67 odd,71,73,74
W 8 Nov 2006	Integration by Parts	8.1: 1,5,9,13,17,19,21,25,29,31,33,39-47 odd,50,53 8.2: 1,2,5-11 odd,15,17,18,19,23,25-27,32,39,43,45, 50,67
R 9 Nov 2006	TEST III	5.2-5.9, 7.1-7.7
F 10 Nov 2006	Pwrs/Prods Trig. Fns.	8.3: 1-44 odd,45,61,65
M 13 Nov 2006	Trig. Substitution	8.4: 1-33 odd,41,42,45,49
W 15 Nov 2006	Partial Fractions	8.5: 1-8,9-29 odd,31,33,35,36,47(a,b),50
F 17 Nov 2006	Area (again)	6.1: 1,5,11,13,15-25 odd,27-33 odd,39
M 20 Nov 2006	Volumes I	6.2: 1-27 odd,33,37-41 odd,47,51-53,57
W 22 Nov 2006	Volumes II	6.3: 1-24 odd,25-31,34,43 (integrate, too),46
M 27 Nov 2006	Centroids	6.4: 1-29 odd,30,33
W 29 Nov 2006	Work	6.5: 1,5,9,10,13,17,21,22,27,33,35
R 30 Nov 2006	TEST IV	8.1-8.5, 6.1-6.4
F 1 Dec 2006	Fluid Force	6.6: 1,3,4,7,9,15,17
M 4 Dec 2006	Complex Numbers	All exercises from web notes
W 6 Dec 2006	Complex Numbers	All exercises from web notes
F 8 Dec 2006	Review	
R 14 Dec 2006	Final Exam	EVERYTHING!