Math 120a – Exam 1 answers

- 1. 3x + y + z = 5
- 2. $D_{\mathbf{u}}g(2,-1) = -15\sqrt{2}/2.$
- 3. There are many possibilities, one is $\mathbf{r}(t) = \langle 1, 1, \ln(2) \rangle + t \langle 2, 3, 1 \rangle$.
- $4. \ z=x$
- 5. (a) All points except (0,0).
 - (b) All points.
 - (c) All points except (0,0).
- 6. t = -2.
- 7. (a)
- 8. Apply chain rule to z(x, y).