

Solutions to review problems for exam 2.

1. $\frac{\sqrt{2}-1}{3\sqrt{2}};$

2. $\frac{\sin(81)}{4}$

3. $2/3$

4. Critical points are $(1, -2)$ which is a local min and $(-1, -2)$ which is a saddle.

5. 147

6. (a) $\langle 24, -24 \rangle$

(b) $\frac{-48}{\sqrt{2}}$