

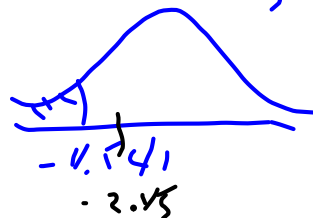
$$1) H_a: \mu_d < \mu_d^0$$

$$H_0: \mu_d = \mu_d^0$$

$$2) \underline{t}\text{-test}, df = 3$$

$$3) \underline{t}(3) = -4.541, \alpha = .01,$$

1-tailed



$$4) \underline{t} = -2.45$$

$$5) -2.45 > -4.541 \therefore \text{inconclusive}$$

$$\underline{t}(3) = -2.45, p > .01, d = -1.23$$

	2007	2008	d:f	(x-m)	Sq.
F	9	2	-7	-2	4
M	10	4	-6	-1	1
B	8	9	1	6	36
S	9	1	-8	-3	9

$$t = \frac{M_{d:f}}{SE_{d:f}} \quad \begin{array}{l} M_{d:f} = -5 \\ SS = 50 \end{array}$$

$$t = \frac{-5}{2.04} = -2.45$$

$$d = \frac{-5}{4.08} = -1.23$$

$$SS_{d:f} = \sqrt{\frac{50}{3}} = 4.08$$

$$SE_{d:f} = \frac{4.08}{\sqrt{4}} = 2.04$$