

In class examples  
Jan 24, 2013

1. Let  $a$  and  $b$  be integers. Prove that  $\gcd(a, a + b) = \gcd(a, b)$ .

2. Let  $a$  and  $b$  be integers. Prove there exist integers  $t$  and  $w$  such that  $ab = a^2t + b^2w$ .