

MATH 42-NUMBER THEORY
PROBLEM OF THE DAY #11
DUE TUESDAY, MARCH 15, 2011

1. In U_{71} , what is the order of 7, of 2, of $7 \cdot 2$, of 51, of 54, of $51 \cdot 54$? In U_{29} , what is the order of 28, of 16, of $28 \cdot 16$? (Note: It may make this problem easier to use generators!) Do you notice any patterns?