

Math 53
Homework 7

due March 27 in class

1. Find all characters modulo 24.
2. Exercise 2 of Chapter 4.
3. Exercise 9 of Chapter 4. There are two typos in (b). The sum should be over $p \leq x$ with $p \equiv a \pmod{m}$ and the right hand side of the equation should have a $\phi(m)$ instead of $\phi(q)$ in the denominator. I'll also point out that (b) is the one you want to use for part (d). Part (c) is independent of the the other parts.
4. Exercise 14 of Chapter 4.

BONUS: Exercise 11 in Chapter 4