MATH 3360 HOMEWORK ASSIGNMENT 11

DUE ON FRIDAY 10 APRIL 2020

- (1) Complete the following computations in \mathbb{Z}_{14} : (a) [10][7] =
 - (b) ([10] + [11])[5] =(c) ([10] + [11])([13] + [9]) =(d) $[5]^{12} =$ (e) $[13]^{2020} =$
- (2) Show that the subset $\{a + b\sqrt{-5} \mid a, b \in \mathbb{Z}\}$ is a subring of the complex numbers.
- (3) Write the permutation (18352)(372451) as a product of disjoint cycles.