

MATH 101: ALGEBRA I
HOMEWORK, DAY #26

Problem JV26.A. Show that a group is a category with one object in which all morphisms are isomorphisms.

Problem JV26.B. Let \mathcal{C} be a category and let A be a fixed object in \mathcal{C} . Define a category \mathcal{C}_A whose objects are arrows $f : Z \rightarrow A$ in \mathcal{C} . What are the morphisms in \mathcal{C}_A ? Draw a diagram illustrating associativity of the composition law.