CHAPTER I

INTRODUCTION

This thesis deals with the characterizations of digraphs which are defined from algebraic systems in a certain way. These digraphs are groupoid digraphs, quasi - group digraphs, loop digraphs and group digraphs. Characterizations of quasi - group digraphs and loop digraphs were given by H.H. Teh [2]. H.P. Yap [4] gave an example of a point - symmetric digraph which is not a group digraph. Turner [5] proved that every point - symmetric digraph with a prime number of points is a group digraph. The main purpose of this thesis is to characterize group digraphs given in theorem 4.3.3 and corollary 4.3.4.