

## **CHAPTER 3**

### **RESEARCH METHODOLOGY**

#### **3.1 Journal**

The journals used in this project are eight journals. In the eight journals used, it can be concluded that an efficient method for processing large data in React Native is FlatList, because FlatList has better content management than ScrollView which directly loads all content which results in a lot of GPU consumption.

#### **3.2 Data**

The dataset used in this research is the data of market traders in Bali. The dataset of market traders is from market Banjar and market Seririt amounting to approximately 900-2000 traders. The data includes the merchant's name, invoice amount, and merchant registration number.

#### **3.3 Program**

The programming languages that will be used in this research are Javascript and the React Native framework. The data set is obtained through an API which will later be retrieved via React Native.

#### **3.4 Implentation and Analysis**

The data will be fetched via the API in React Native. After that, the data will be processed using the ScrollView and FlatList methods, and for the

ScrollView it will be tested using the Lodash library and Array Map. Finally, the performance and load time between ScrollView and FlatList will be analyzed.

