

1. INTRODUCTION

The Sheikh Zayed Grand Mosque in Solo was built as a replica of the Sheikh Zayed Grand Mosque located in Abu Dhabi, United Arab Emirates. The construction of this mosque is part of the donation given by the Government of the United Arab Emirates to the Government of Indonesia. One of the distinctive characteristics of this mosque is the use of batik motifs on each component of the building, such as Kawung, flower, and Bokor Kencono motifs. This characteristic distinguishes it from the original mosque and adds to its uniqueness and beauty [1]. The city of Solo's residents and surroundings feel very enthusiastic about this mosque because its magnificent building and beautiful ornaments interest people who want to worship and visit it for tourism. Visitors have provided reviews on Google Maps to provide an impression of their experience when visiting the mosque.

Google Maps is a free application in the form of a map service developed by Google that users can access via a web browser and mobile application. This application can provide road directions when traveling on foot, by motorbike, or by car. Because there are many reviews from visitors to the Sheikh Zayed Solo Mosque, these reviews can be used as data and processed to determine the public's response to the Sheikh Zayed Solo Mosque.

Sentiment analysis implements text classification as a subfield of text mining. Sentiment analysis analyzes opinions, evaluations, attitudes, and review / perceptions about products, services, objects, events, issues, etc [2]. Sentiment analysis aims to understand positive, negative, or neutral reviews [3], [4]. Sentiment analysis is developed using two approaches: lexicon-based and machine learning-based. The lexicon-based text classification approach is divided into two categories: dictionary-based, which involves manually collecting opinion words and then processing them to find antonyms and synonyms; and corpus-based, which entails including opinion words in the corpus and then identifying other opinion words within the corpus to aid in determining opinions that are contextually appropriate [5], [6], [7].

Previous sentiment analysis research has been conducted using Twitter and Google Play Store dataset. These studies include analyzing sentiment analysis of people's emotions towards Covid-19 [8], pig farming during the African swine fever outbreak [9], comments in the Klik Indomaret application during the Covid-19 pandemic [10], government efforts in dealing with Covid-19 [11], and horror stories of KKN students in Java East [12]. Other research that uses VADER is analysis of customer reviews in determining customer satisfaction in the digital market [13], public opinion about the new educational curriculum [14], and reviews of the PLN Mobile application [15] which produces high accuracy scores on VADER performance. The results of using the VADER method can achieve an accuracy of 88%, precision of 94%, Recall of 93%, and F1-Score of 88%.

VADER is a lexicon-based and rule-based sentiment analysis method. The advantages of VADER are that it does not require training data, supports emoji for classification, requires fewer resources, is computationally intensive, and does not suffer from a speed-performance tradeoff. VADER works better for text from social media and other web sources. VADER is also a simple rule-based model for sentiment analysis [16].

The main objective of this research is to propose a sentiment analysis model by combining the VADER and Deep-Translator methods and conduct a sentiment analysis of visitors' reviews of the Sheikh Zayed Grand Mosque in Solo. The sentiment analysis results are sentiment