Introduction

Music genres allow to categorize musical items that share common characteristics. Modern Music Archives consists of Tens of Thousands of songs which are not ordered properly, hence a proper genre into which these songs can be classified into gives us a proper arrangement of the songs and provides for easier searching of the song name using tune or beats by Apps such as Shazam. During creation of song the song composer does not always make a music specific to one genre, the composer at some point in composing the song may feel like changing the pace of the song for aesthetics. Bohemian Rapsody, a well-known song has four sections piano ballad, Capella, opera and hard rock, classifying such song into any of these genres using mere audio is not so easy.

Literature review

CNN is the widely used method for the implementation. Weibin Zhang et, al[1] proposed two ways to improve music genre classification with convolutional neural networks (CNN): 1) combining max- and average pooling to provide more statistical information to higher level neural networks; 2) using shortcut connections to skip one or more layers, a method inspired by residual learning method. GTZAN dataset consisting of about a thousand songs and 10 major genres is used, accuracy of 84.8% and 87.4% is observed respectively. Sergio Oramas et, al[2] propose to categorize musical items into multiple and fine-grained labels, using three different data modalities: audio, text and images using optimal models for each modals. Alexandros Tsaptisinos[3] propose lyrics based genre classification using Hierarchical Attention Network (HAN) also HAN is compared with many baseline models.

Hareesh Bahuleyan[4] proposed