

# Software Report

## Random Music Player

### AI11110:Probability And Random Variables

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## 1 Aim

This report aims to document the implementation of a code that plays random song from music playlist using python. The code utilizes Random and Pydub library for shuffle the code and plays song in a random way.

## 2 Library

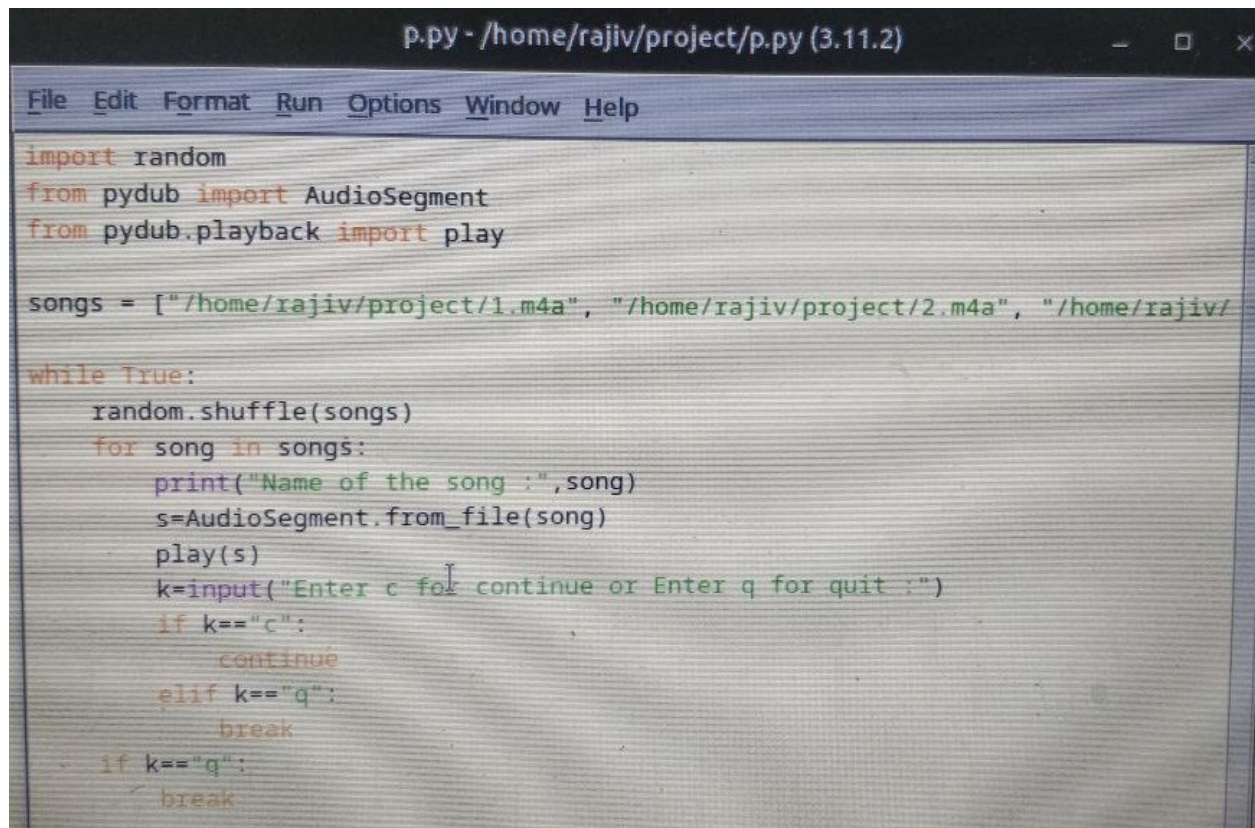
1. **Random** it will shuffle the playlist of song.
2. **Pydub** pydub library allows to load the song and play song.

## 3 Implementation

1. first import random and pydub library.
2. From pydub import Audiosegment and from pydub.playback import play.
3. create list of songs.
4. In name write full address of song.
5. Now apply for loop in list.
6. Using Audiosegment load the song.
7. Using play to play the song.
8. After playing the song, a message is printed that if you want to continue or quit.
9. If you choose continue, it will restart the playlist.
10. If you choose quit, it will stop.

## 4 Conclusion

In this way, a music playlist can be generated using Python playing random songs.

A screenshot of a Python IDE window titled 'p.py - /home/rajiv/project/p.py (3.11.2)'. The window has a menu bar with 'File', 'Edit', 'Format', 'Run', 'Options', 'Window', and 'Help'. The code is written in a light blue editor with syntax highlighting. It imports 'random' and 'AudioSegment' from 'pydub', and 'play' from 'pydub.playback'. A list 'songs' contains two file paths. A 'while True' loop shuffles the list, prints the selected song name, plays it, and asks for input to continue ('c') or quit ('q').

```
p.py - /home/rajiv/project/p.py (3.11.2)
File Edit Format Run Options Window Help

import random
from pydub import AudioSegment
from pydub.playback import play

songs = ["/home/rajiv/project/1.m4a", "/home/rajiv/project/2.m4a", "/home/rajiv/

while True:
    random.shuffle(songs)
    for song in songs:
        print("Name of the song :", song)
        s=AudioSegment.from_file(song)
        play(s)
        k=input("Enter c for continue or Enter q for quit :")
        if k=="c":
            continue
        elif k=="q":
            break
    if k=="q":
        break
```

Figure 1: code

```
rajiv@rajiv: ~/project
rajiv@rajiv:~/project$ python3 p.py
Name of the song : /home/rajiv/project/2.m4a
Input #0, wav, from '/tmp/tmpi_mc4uy6.wav': 0KB sq= 0B f=0/0
Duration: 00:01:01.44, bitrate: 1411 kb/s
Stream #0:0: Audio: pcm_s16le ([1][0][0][0] / 0x0001), 44100 Hz, 2 channels, s
16, 1411 kb/s
61.38 M-A: -0.000 fd= 0 aq= 0KB vq= 0KB sq= 0B f=0/0
Enter c for continue or Enter q for quit :c
Name of the song : /home/rajiv/project/4.m4a
Input #0, wav, from '/tmp/tmpvzuc52f8.wav': 0KB sq= 0B f=0/0
Duration: 00:00:29.05, bitrate: 1411 kb/s
Stream #0:0: Audio: pcm_s16le ([1][0][0][0] / 0x0001), 44100 Hz, 2 channels, s
16, 1411 kb/s
28.98 M-A: 0.000 fd= 0 aq= 0KB vq= 0KB sq= 0B f=0/0
Enter c for continue or Enter q for quit :c
Name of the song : /home/rajiv/project/13.m4a
Input #0, wav, from '/tmp/tmpyfbr3co8.wav': 0KB sq= 0B f=0/0
Duration: 00:00:56.89, bitrate: 1411 kb/s
Stream #0:0: Audio: pcm_s16le ([1][0][0][0] / 0x0001), 44100 Hz, 2 channels, s
16, 1411 kb/s
56.78 M-A: 0.000 fd= 0 aq= 0KB vq= 0KB sq= 0B f=0/0
Enter c for continue or Enter q for quit :c
Name of the song : /home/rajiv/project/8.m4a
Input #0, wav, from '/tmp/tmpjbjw_0th.wav': 0KB sq= 0B f=0/0
```

Figure 2: output