MUSIC STREAMING APP
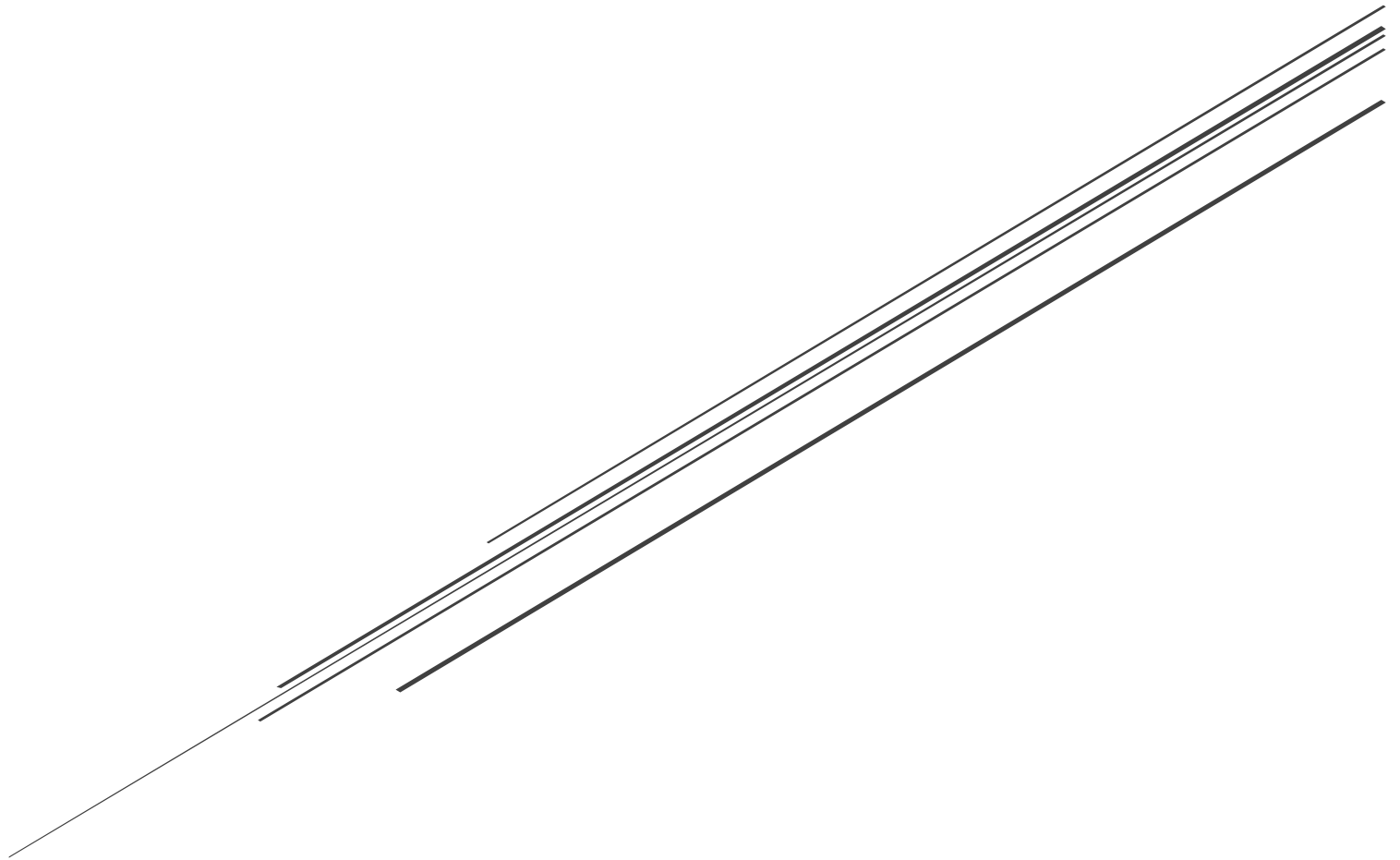
Database Management System Project

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Statement

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Music Streaming App with Playlists and Royalty Calculations

Listeners create playlists, like songs, and follow artists. Songs are tagged by genre, mood, and language. Artist earnings are calculated based on number of plays and user region. Premium users can download and listen offline. Non-premium users get ads, which are logged for billing

Project Description

This project is a music streaming platform where users can listen to songs, create custom playlists, like their favorite tracks, and follow artists they enjoy. Each song is tagged with details such as genre, mood, and language to help users discover music that matches their taste.

The platform supports both premium and non-premium users. Premium users can download songs and listen offline without interruptions, while non-premium users listen with ads. All ads shown to non-premium users are tracked and logged for billing purposes.

Artist earnings are automatically calculated based on how many times their songs are played and the regions from which users are listening. This ensures a fair and transparent way of distributing revenue to artists.

Steps for Making Entity Relationship Diagram

Following steps are used to make ERD (Entity Relationship Diagram)
for statement that is given:

➢Understand the Requirements
➢Identify the Entities
➢Define Attributes for Each Entity
➢Set Primary Keys
➢Identify Relationships Between Entities
➢Determine Cardinality
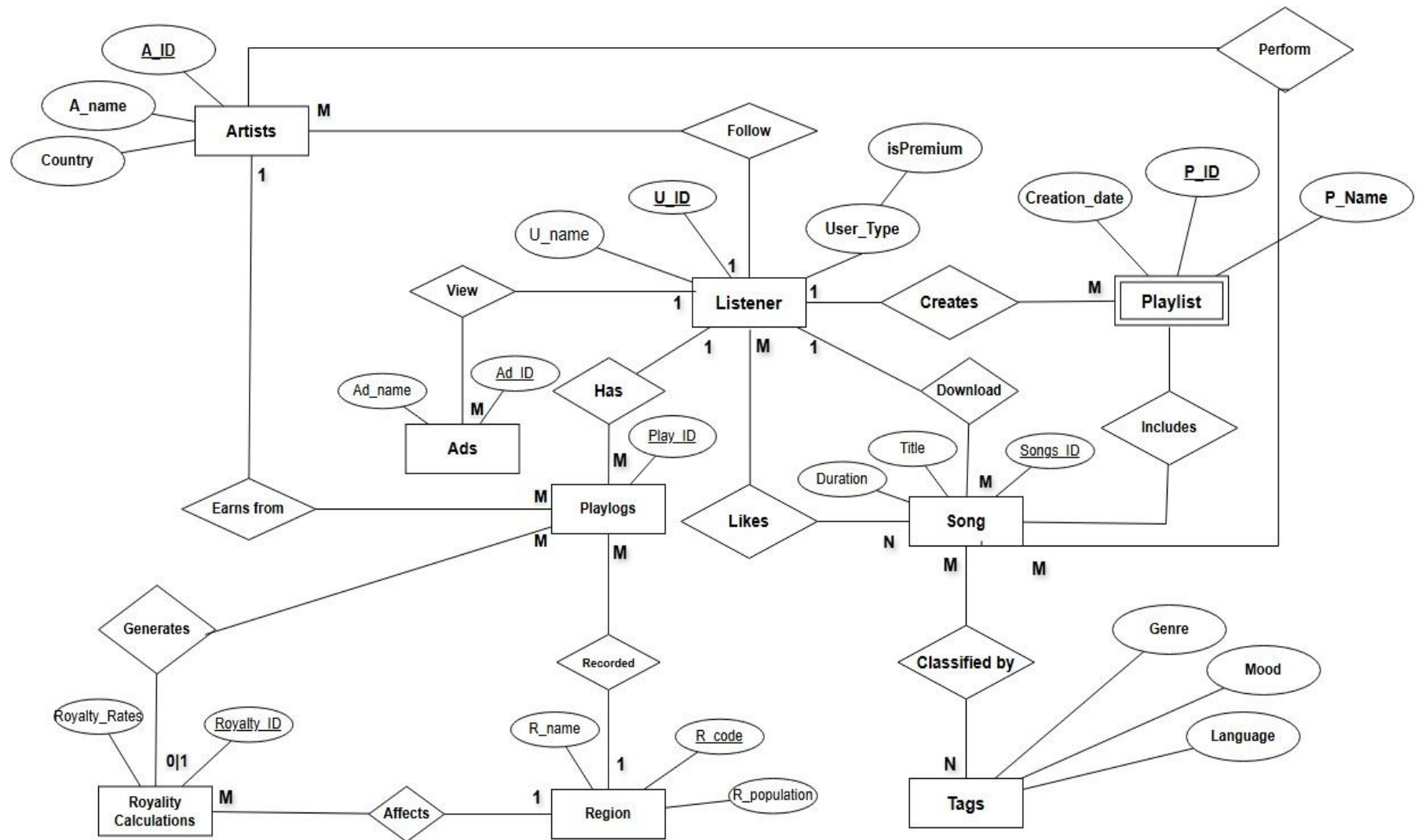➢Draw the Diagram
➢Review and Refine

Identified Entities

   i.   Listeners

  ii.   Artists

 iii.   Playlists

 iv.   Songs

  v.   Tags

 vi.   Play Logs

 vii.   Royality Calculations

 viii.   Ads

 ix.   Region

Relationships Between Entities

   I.   Listener creates Playlists

  II.   Listener likes Songs

 III.   Listener follow Artists

 IV.   Listener download Songs

  V.   Listener view Ads

 VI.   Artists performed Songs

VII.   Playlists include Songs

VIII.   Songs are classified by Tags

 IX.   Artists earns from Play logs

  X.   Play logs generates Royality Calculations

 XI.   Royality Calculations affects Region

XII.   Play logs recorded Region

Entity Relationship Diagram
Chen Model

Entity Relationship Diagram

Crow Foot Model