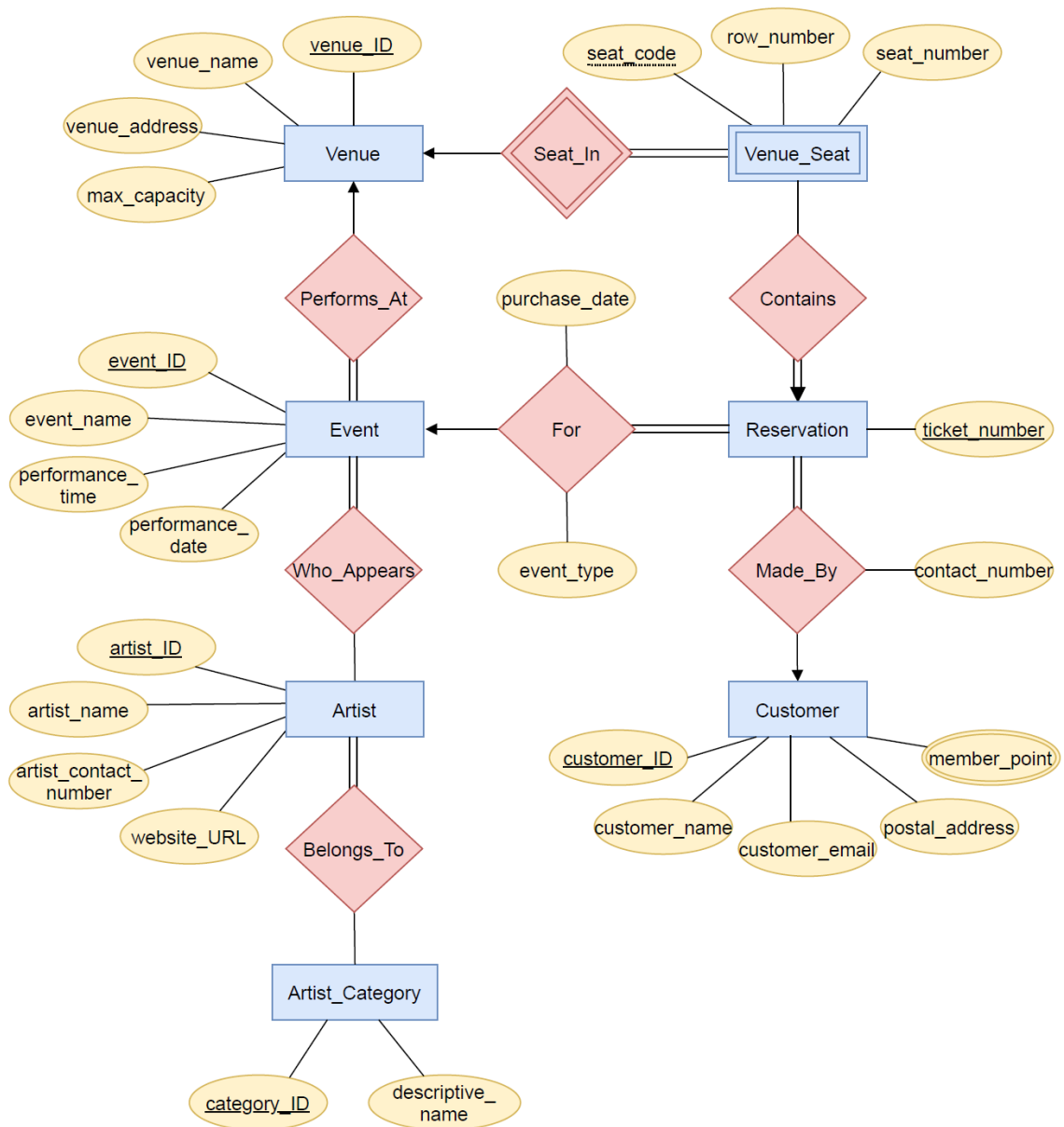


## Task 1: ER-diagram design



## Task 2: Translation from an ER-diagram to a relational model

The underlined attributes represent Primary Key (PK).

Playlist = (playlist\_ID, title)

User = (user\_ID, user\_name, user\_email, user\_country)

Artist = (artist\_ID, artist\_name, artist\_country)

Song = (song\_ID, song\_name, duration)

Playlist\_Track = (playlist\_ID, track\_no, song\_ID),

Attribute 'Playlist\_Track(playlist\_ID)' is a foreign key to the PK of 'Playlist',

Attribute 'Playlist\_Track(song\_ID)' is a foreign key to the PK of 'Song'

User\_Playlist = (playlist\_ID, user\_ID)

Attribute 'User\_Playlist(playlist\_ID)' is a foreign key to the PK of 'Playlist',

Attribute 'User\_Playlist(user\_ID)' is a foreign key to the PK of 'User'

Album = (playlist\_ID, year)

Attribute 'Album(playlist\_ID)' is a foreign key to the PK of 'Playlist'

Main\_Artist = (playlist\_ID, artist\_ID)

Attribute 'Main\_Artist(playlist\_ID)' is a foreign key to the PK of 'Album',

Attribute 'Main\_Artist(artist\_ID)' is a foreign key to the PK of 'Artist'

Follows = (user\_ID, artist\_ID)

Attribute 'Follows(user\_ID)' is a foreign key to the PK of 'User',

Attribute 'Follows(artist\_ID)' is a foreign key to the PK of 'Artist'

Performs\_on = (song\_ID, artist\_ID)

Attribute 'Performs\_on(song\_ID)' is a foreign key to the PK of 'Song',

Attribute 'Performs\_on(artist\_ID)' is a foreign key to the PK of 'Artist'