



## Data Dictionary

2024-03-01

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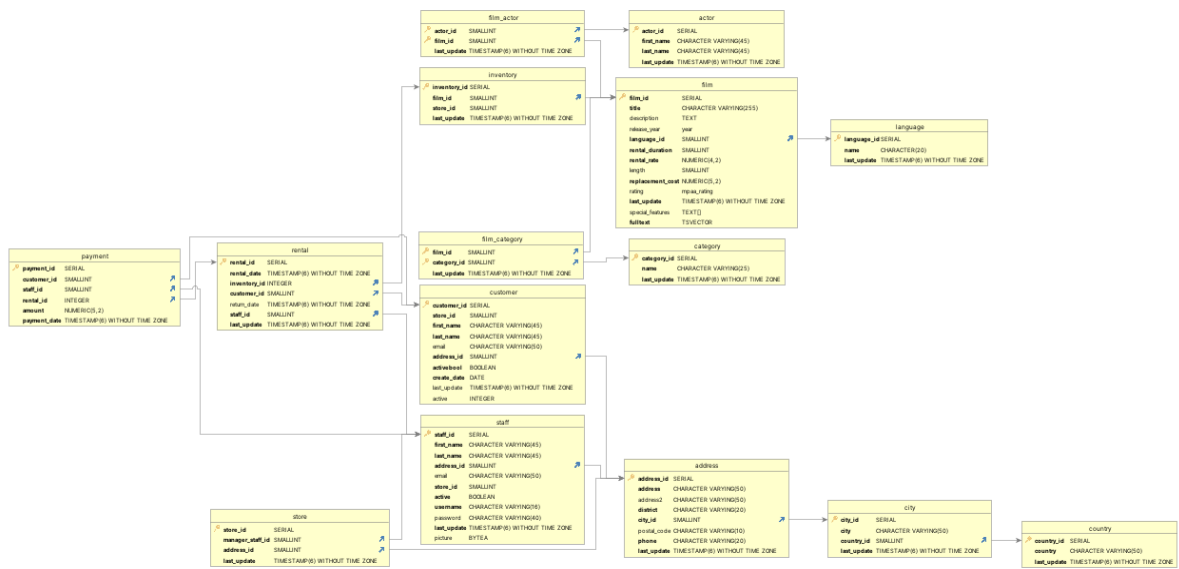
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## Entity Relationship Diagram



## payment

Links to customer\_id, staff\_id, rental\_id

Column	Data Type	Description
payment_id	SERIAL	Primary key, integer, unique value to identify payment
customer_id	SMALLINT	Foreign key, small integer, unique number used to identify the customer
staff_id	SMALLINT	Foreign key, small integer, unique number used to identify the personnel member of Rockbuster
rental_id	INTEGER	Foreign key, larger integer, unique number used to identify the rental transaction
Amount	NUMERIC(5,2)	Monetary amount, number with max 5 digits, including and 2 digits in fraction part; max value 999.99
payment_date	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)

## rental

Links to inventory\_id, customer\_id, staff\_id

Column	Data Type	Description
rental_id	SERIAL	Primary key, integer, unique number used to identify the rental transaction
rental_date	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec) used to indicate the date and time the rent has started
inventory_id	INTEGER	Foreign key, larger integer, unique number used to identify a film or item to be rented by customers
customer_id	SMALLINT	Foreign key, small integer, unique number used to identify the customer
return_date	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec). The date and time set as a deadline when the rental items to be returned
staff_id	SMALLINT	Foreign key, small integer, unique number used to identify the personnel member of Rockbuster
last_update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)

## store

Links to manager\_staff\_id, address\_id

Column	Data Type	Description
store_id	SERIAL	Primary key, unique number used to identify the store in Rockbuster classification
manager_staff_id	SMALLINT	Foreign key, unique number used to identify the manager staff, linked to staff table
address_id	SMALLINT	Foreign key, unique number used to identify the store address, linked to address table
last_update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)

## film\_actor

Links to actor\_id, film\_id

Column	Data Type	Description
actor_id	SMALLINT	Composite key, unique number used to identify the actor in this database. Foreign key connecting linked to Actor table
film_id	SMALLINT	Composite key, unique number used to identify the film in this database. Foreign key connecting linked to Film table
last_update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)

## inventory

Links to film\_id

Column	Data Type	Description
inventory_id	SERIAL	Primary key, larger integer, unique number used to identify a film or item to be rented by customers
film_id	SMALLINT	Foreign key, integer, unique number used to identify each film and connect to Film table
store_id	SMALLINT	Small integer, unique number used to identify the store in Rockbuster classification
last_update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)

## film\_category

Links to film\_id,  
category\_id

Column	Data Type	Description
film_id	SMALLINT	Composite key, unique number used to identify the film in this database. Foreign key connecting linked to Film table
category_id	SMALLINT	Composite key, unique number used to identify the film category in this database. Foreign key connecting linked to Category table
last_update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)

## customer

Links to address\_id

Column	Data Type	Description
customer_id	SERIAL	Primary key, unique number used to identify the customer in this database
store_id	SMALLINT	Small integer, unique number used to identify the store in Rockbuster classification
first_name	CHARACTER VARYING(45)	Customer's first name, max 45 characters
last_name	CHARACTER VARYING(45)	Customer's last name, max 45 characters
email	CHARACTER VARYING(50)	Customer's email. Max 50 characters
address_id	SMALLINT	Foreign key, customer's address, linked to Address table
activebool	BOOLEAN	True or false statement to indicate the customer account status. Boolean data can hold three possible values: true, false or null
create_date	DATE	The date when the customer account was created. Temporal date (yyyy-mm-dd)
last-update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)
active	INTEGER	Integer, a number to indicate whether the customer account is active or not

## staff

Links to address\_id

Column	Data Type	Description
staff_id	SERIAL	Primary key, unique number used to identify the personnel member
first_name	CHARACTER VARYING(45)	Employee's first name, max 45 characters
last_name	CHARACTER VARYING(45)	Employee's last name, max 45 characters
address_id	SMALLINT	Foreign key, employee's address, linked to Address table
email	CHARACTER VARYING(50)	Employee's email. Max 50 characters
store_id	SMALLINT	Small integer, unique number used to identify the store in Rockbuster classification
active	BOOLEAN	True or false statement to indicate the employee's status. Boolean data can hold three possible values: true, false or null
username	CHARACTER VARYING(16)	Employee's username / log-in ID for internal account, max 16 characters
password	CHARACTER VARYING(40)	Employee's password used to log in to internal account, max 40 characters
last_update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)
picture	BYTEA	Employee's picture. Bytea data type is used to store raw binary data, e.g. images

## actor

links from film\_actor

Column	Data Type	Description
actor		
actor_id	SERIAL	Primary key, unique number used to identify the actor in this database
first_name	CHARACTER VARYING(45)	Actor's first name, max 45 characters
last_name	CHARACTER VARYING(45)	Actor's last name, max 45 characters
last_update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)

## film

Links to language\_id

Column	Data Type	Description
film_id	SERIAL	Primary key, unique number used to identify each film as a rental item
title	CHARACTER VARYING(255)	Film title, fixed-length character with max 255 characters, including spaces
decription	TEXT	Film synopsis with unlimited length
release_year	year	Integer, the year the film was released
language_id	SMALLINT	Foreign key, unique number used to identify the language of film audio; linked to Language table
rental_duration	SMALLINT	Small integer, the number of days the item was rented for
rental_rate	NUMERIC(4,2)	Rating, number with max 4 digits, including and 2 digits in fraction part
length	SMALLINT	Small integer, the length of film (minutes)
replacement_cost	NUMERIC(5,2)	The cost the customer can be charged in case of lost or damage of rental item. Monetary amount, number with max 5 digits, including and 2 digits in fraction part
rating	mpaa_rating	Film rating introduced by Movie Picture Association
last_update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)
special_features	TEXT[]	Extra videos related to the film available for audience
fulltext	TSVECTOR	Text-searchable data where we can use a word as an index

## category

Links from film\_category

Column	Data Type	Description
category_id	SERIAL	Primary key, unique number used to identify the film category
name	CHARACTER VARYING(25)	The name of the film category, max 25 characters
last_update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)

## address

Links to city\_id

Column	Data Type	Description
address_id	SERIAL	Primary key, unique number used to identify the address in this table
address	CHARACTER VARYING(50)	Any address in this database - line1 (street number and street name)
address2	CHARACTER VARYING(50)	Any address in this database - line2, it can be used as a secondary address designator such as apartment number or building name
district	CHARACTER VARYING(20)	Any address in this database - district / state / region name
city_id	SMALLINT	Foreign key, small integer, unique number used to identify the city in this database, linked to City table
postal_code	CHARACTER VARYING(10)	Any address in this database - postal code, max 10 characters
phone	CHARACTER VARYING(20)	Phone number related to the address in this database, max 20 characters
last_update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)

## language

Links from film

Column	Data Type	Description
language_id	SERIAL	Primary key, unique number used to identify the language in this table
name	CHARACTER(20)	The name of the language of the film audio
last_update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)

## city

Links to country\_id

Column	Data Type	Description
city_id	SERIAL	Primary key, unique number used to identify the city in this database
city	CHARACTER VARYING(50)	City name in the address in this database
country_id	SMALLINT	Foreign key, unique number used to identify the country in this database, linked to Country table
last_update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)



## country

Links from city

Column	Data Type	Description
country_id	SERIAL	Primary key, unique number used to identify the country in this database
country	CHARACTER VARYING(50)	Country name in the address in this database
last_update	TIMESTAMP(6) WITHOUT TIME ZONE	Temporal data, store both date (yyyy-mm-dd) and time (hours:minutes:sec)