Rockbuster Stealth Data Dictionary

Created by: Ryan Wick

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1. Overview

This data dictionary for the Rockbuster Stealth Database provides a comprehensive breakdown of its layout, links, and keys. The document aims to deliver a clear and detailed understanding of the database schema, including fact and dimension tables, their respective fields, relationships, and keys. Additionally, a visual presentation of the Entity Relationship Diagram (ERD) is included to aid in visually comprehending the database structure. By offering this detailed documentation, we ensure that users can effectively navigate and utilize the database for their analytical and operational needs.

2. Facts Tables

2. FACT TABLES			
2.1 Payment Table			
NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
payment_id	integer	Unique identifier for each payment.	**Primary Key**
customer_id	smallint	Link to customer table.	*Foreign Key*
staff_id	smallint	Link to staff table.	*Foreign Key*
rental_id	integer	Link to rental table.	*Foreign Key*
amount	numeric	Payment amount.	
payment_date	timestamp without timezone	Date and time payment	
2.2 Rental			
NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
rental_id	integer	Unique identifier for each rental.	**Primary Key**
rental_date	timestamp without timezone	Date and time of rental.	
inventory_id	smallint	Link to inventory table.	*Foreign Key*
customer_id	smallint	Link to customer table.	*Foreign Key*
return_date	timestamp without timezone	Date and time of return.	
staff_id	smallint	Link to staff table.	*Foreign Key*
last_update	timestamp without timezone	Last updated timestamp for the rental record.	

3. Dimension Tables

3. Dimension Tables			
3.1 Customer			
NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
customer_id	integer	Unique identifier for each customer.	**Primary Key**
store_id	smallint	Link to store table.	*Foreign Key*
first_name	character varying(45)	Customer's first name.	
last_name	character varying(45)	Customer's last name.	
email	character varying(50)	Customer's email address.	
address_id	smallint	Link to address table.	*Foreign Key*
activebool	boolean	Indicates whether the customer is active.	
create_date	date	Date the customer was created.	

last_update	timestamp without timezone	Last updated timestamp for the customer record.	
active	integer	Alternative active status indicator.	

3.2 Staff

NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
staff_id	integer	Unique identifier for each staff member.	**Primary Key**
first_name	character varying(45)	Staff member's first name.	
last_name	character varying(45)	Staff member's last name.	
address_id	smallint	Link to address table.	*Foreign Key*
email	character varying(50)	Staff member's email.	
store_id	smallint	Link to store table.	*Foreign Key*
active	boolean	Indicates whether the staff member is active.	
username	character varying(16)	Staff member's username.	
password	character varying(40)	Staff member's password.	
picture	bytea	Staff member's picture.	

3.3 Inventory

NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
inventory_id	integer	Unique identifier for each inventory item.	
film_id	smallint	Link to film table.	*Foreign Key*
store_id	smallint	Link to store table.	*Foreign Key*
last_update	timestamp without timezone	Last updated timestamp for the inventory record.	

3.4 Film

NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
film_id	smallint	Unique identifier for each film.	**Primary Key**
title	character varying(255)	Title of the film.	
description	text	Description of the film.	
release_year	integer	Year the film was released.	
language_id	smallint	Link to language table.	*Foreign Key*
rental_duration	smallint	Duration of the rental period.	
rental_rate	numeric	Rental rate for the film.	
length	smallint	Length of the film in minutes.	
replacement_cost	numeric	Cost to replace the film.	
rating	USER-DEFINED	Film rating (e.g., G, PG, R).	

last_update	timestamp without timezone	Last updated timestamp for the film record.	
special_features	ARRAY	Special features included with the film.	
fulltext	tsvector	Full-text search vector for the film.	

3.5 Film

NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
film_id	smallint	Link to film table.	*Foreign Key*
category_id	smallint	Link to category table.	*Foreign Key*
last_update	timestamp without timezone	Last updated timestamp for the film-category relationship.	

3.6 Film actor

NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
actor_id	smallint	Link to actor table.	*Foreign Key*
film_id	smallint	Link to film table.	*Foreign Key*
last_update	timestamp without timezone	Last updated timestamp for the film-actor relationship.	

3.7 Actor

NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
actor_id	smallint	Primary key; unique identifier for each actor.	**Primary Key**
first_name	character varying(45)	Actor's first name.	
last_name	character varying(45)	Actor's last name.	
last_update	timestamp without timezone	Last updated timestamp for the category record.	

3.8 Category

NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
category_id	integer	Unique identifier for each category.	**Primary Key**
name	character varying(25)	Name of the category.	
last_update	timestamp without timezone	Last updated timestamp for the category record.	

3.9 Language

NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
language_id	integer	Unique identifier for each language.	**Primary Key**
name	character varying(20)	Name of the language.	
last_update	timestamp without timezone	Last updated timestamp for the language record.	

3.10 Store

NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE

store_id	integer	Unique identifier for each store.	**Primary Key**
manager_staff_id	smallint	Link to staff table.	*Foreign Key*
address_id	smallint	Link to address table.	*Foreign Key*
last_update	timestamp without timezone	Last updated timestamp for the store record.	

3.11 Address

NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
address_id	integer	Unique identifier for each address.	**Primary Key**
address	character varying(50)	First line of the address.	
address2	character varying(50)	Second line of the address (optional).	
district	character varying(50)	District or area.	
city_id	smallint	References the city table.	*Foreign Key*
postal_code	character varying(10)	Postal code of the address.	
phone	character varying(20)	Phone number for the address.	
last_update	timestamp without timezone	Last updated timestamp for the address record.	

3.12 City

NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
city_id	integer	Unique identifier for each city.	**Primary Key**
city	character varying(50)	Name of the city.	
country_id	smallint	References the country table.	*Foreign Key*
last_update	timestamp without timezone	Last updated timestamp for the city record.	

3.13 Country

NAME	DATA TYPE	DESCRIPTION/LINK	KEY TYPE
country_id	integer	Unique identifier for each country.	**Primary Key**
country	character varying(50)	Name of the country.	
last_update	timestamp without timezone	Last updated timestamp for the country record.	

4. Entity Relationship Diagram (ERD)