





STEP 1

	Data Output	Explain	Messages	Notifications
	 category_id [PK] integer 	name character varying (25) 	last_update timestamp without time zone 	
1	1	Action	2006-02-15 09:46:27	
2	2	Animation	2006-02-15 09:46:27	
3	3	Children	2006-02-15 09:46:27	
4	4	Classics	2006-02-15 09:46:27	
5	5	Comedy	2006-02-15 09:46:27	
6	6	Documentary	2006-02-15 09:46:27	
7	7	Drama	2006-02-15 09:46:27	
8	8	Family	2006-02-15 09:46:27	
9	9	Foreign	2006-02-15 09:46:27	
10	10	Games	2006-02-15 09:46:27	
11	11	Horror	2006-02-15 09:46:27	
12	12	Music	2006-02-15 09:46:27	
13	13	New	2006-02-15 09:46:27	
14	14	Sci-Fi	2006-02-15 09:46:27	
15	15	Sports	2006-02-15 09:46:27	

Step 2

INSERT INTO category (name)

VALUES ('Thriller')

INSERT INTO category (name)

VALUES ('Crime')

INSERT INTO category (name)

VALUES ('Mystery')

INSERT INTO category (name)

VALUES ('Romance')

```
INSERT INTO category (name)
```

```
VALUES ('War')
```

```
CREATE TABLE category
```

```
(
```

```
category_id integer NOT NULL DEFAULT nextval /*Constraint to ensure there are  
no missing values*/
```

```
('category_category_id_seq'::regclass),
```

```
name text COLLATE pg_catalog."default" NOT NULL, /*Constraint to ensure there  
are no missing values*/
```

```
last_update timestamp with time zone NOT NULL DEFAULT now(),/*Constraint to  
ensure there are no missing values*/
```

```
CONSTRAINT category_pkey PRIMARY KEY (category_id) /*Constraint to make all  
values in this column a primary key*/
```

There are 3 NOT NULL constraints which all ensure a record can't be added or updated without a value attributed to that


column. An error would be returned if this happened which acts as a guarantee that values are always entered for critical

columns, in this case the category_id, name and last_update.

The 4th constraint is PRIMARY KEY which ensures that only a unique value can be used to identify the record. This would stop a

duplicate value being entered in error. The Primary Key constraint also ensures there are no null or missing values.

STEP 3

data output		explain	messages	notifications		
 film_id	 title	 description	 release_year	 language_id	 rental_duration	 rental_rate
1	5 African Egg	A Fast-Paced Documentary of a Pastry Chef And a Dentist who must Pursue a Forensic Psychologist in The Gulf of Mexico	2006	1	6	

	Data Output	Explain	Messages	Notifications
	film_id [PK] smallint	category_id [PK] smallint	last_update timestamp without time zone	
1	5	8	2006-02-15 10:07:09	

STEP 4

DELETE FROM category

WHERE name = 'Mystery'

STEP 5

- ✓ Deleting a record in excel is just as simple as it is in SQL. The good thing about excel is you could easily undo your delete. Whereas using SQL, this is an irreversible step. I would be far more cautious deleting anything using SQL due to this factor. Excel gives you access to versions which makes undoing big changes from a long time ago very easy.
- ✓ Excel – to update the genre for the record African Egg in the film_id table would have been a bit longwinded. You would need to check the category and film id first, then go back to correct film id table and search for the film id, which might have required filtering and sorting the table.
SQL – With SQL once the id's had been checked, the query was relatively simple to update the record. A constraint have been written to stop this mistake from happening and throwing an error? Again, a plus for SQL.