Super Video Game Database 5

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Introduction:

In this poster, we are focusing on the games themselves in our data. We will be looking at:

- How many games are on each platform?
- How much playtime each platform has?
- How only allowing games with certain genres affects platform playtime

Hypothesis:

If a platform has more games then another platform, then the platform with more games will have more playtime overall no matter what.

Background:

We created a relational database using Python and postgreSQL that compiles a wealth of information on video games all in one place. We store the genre, developer, publisher, rating, release date and more! All data we manipulate can and will be printed on the command line and not through a custom GUI.

SQL Queries:

```
SELECT
    p.platformid,
    p.platform_name,
    COUNT(DISTINCT a.gameid) AS
games_on_platform
FROM available_on a
LEFT JOIN platform p ON p.platformid = a.platformid
LEFT JOIN plays pl ON pl.gameid = a.gameid
GROUP BY p.platformid, p.platform_name

ORDER BY games_on_platform
DESC
```

```
SELECT
    p.platformid,
    p.platform_name,
    COUNT(DISTINCT a.gameid) AS
games_on_platform,
    COALESCE(SUM(EXTRACT(EPOCH FROM
(pl.end_play_time - pl.start_play_date_time)) /
3600)/100000, 0) AS
platform_playtime_hours_per_hundred_thousand
FROM available_on a
LEFT JOIN platform p ON p.platformid =
a.platformid
LEFT JOIN plays pl ON pl.gameid = a.gameid
GROUP BY p.platformid, p.platform_name
ORDER BY games_on_platform DESC
```

```
SELECT
    p.platformid,
    p.platform_name,
    COUNT(DISTINCT a.gameid) AS
games_on_platform,
    COALESCE(SUM(EXTRACT(EPOCH FROM
(pl.end_play_time - pl.start_play_date_time)) /
3600)/100000, 0) AS
platform_playtime_hours_per_hundred_thousand
FROM available_on a
LEFT JOIN platform p ON p.platformid = a.platformid
LEFT JOIN plays pl ON pl.gameid = a.gameid
LEFT JOIN video_game_genre g ON pl.gameid =
g.gameid
WHERE g.genreid = 1
    OR g.genreid = 2
    OR g.genreid = 6
    OR g.genreid = 10
GROUP BY p.platformid, p.platform_name

        ORDER BY
        games_on_platfor
        m DESC
```
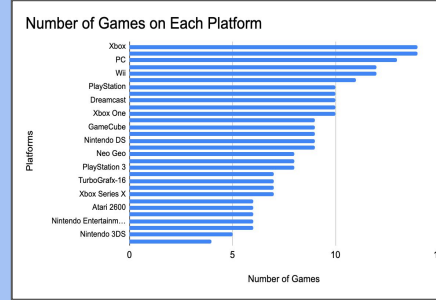
Results:

Figure 1: Total amount of games on each platform. Xbox and Xbox 360 are leading with 14.
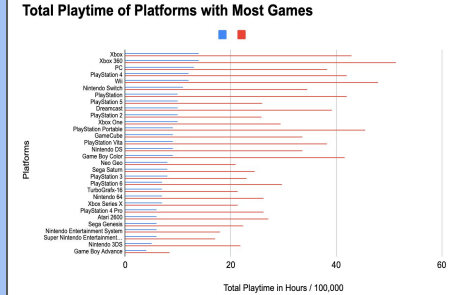

Figure 2: Total amount of playtime on each console sorted by most games on each platform in descending order. (Note: Red bar is divided by 1,000 to give better visualization)
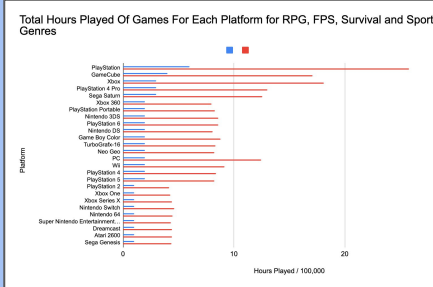

Figure 3: Total amount of playtime on each platform with games only including games from the RPG, FPS, Sports and Survival genre.

Conclusion:

In conclusion, our hypothesis was incorrect and was proven false in Fig. 3. There is an infinite number of ways we can manipulate our data to get different results and it all depends on what we want to show. Every platform is different and has different games on it so of course of data is going to be different but we showed that we can look up and visualize it using our database.