Philipps Universität Marburg

INTEGRATION

Step 1: Preparation
TODO
https://github.com/Paralian/umr-data-integration-project-the-TODO-team.git

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Integration of RPG Entities

- Motivation: Every RPG-Game have different stats systems/distributions which presents a challenge to integrate and compare characters, enemies, NPCs, etc.

- Mashups between different universes are a thing. From Superman vs. Batman, to Godzilla vs. King Kong, to Whiterun Guard vs an Ancient Golden Dragon

- Idea: Integrate these stats systems by means of:

  - <u>Normalization</u> to compare metrics

  - <u>Classification</u> of repeatable values for grouping purposes

  - If possible, <u>generalization</u> of common types of groups

    - Meta-integration!

Data Integration

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Dataset 1: Yu-Gi-Oh! Trading Cards Dataset

Name	Type	Level	Race	Attribute	ATK	DEF
Limit Reverse	Trap Card	null	Continuous		null	null
The 13th Grave	Normal Monster	3	Zombie	DARK	1200	900
Gem-Enhancement	Trap Card	null	Normal		null	null
Magician's Circle	Trap Card	null	Normal		null	null
Castle of Dark Illusions	Flip Effect Monster	4	Fiend	DARK	920	1930

- 6449 unique entries

- 7 Attributes

- Sparse Data for some attributes

- Entries are almost completely clean (no mixed data types)

- Source: Kaggle

- Credit: T.A. THOR

- Link: https://www.kaggle.com/datasets/tathor/yugioh-trading-cards-dataset?resource=download

Data Integration

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Dataset 2: Skyrim Named Characters

- 1009 entries

- 40 different attributes describing named NPCs

Name	Home City	House	Race	Gender	Level	Class	RefID	BaseID	Health	Magicka	Stamina	Primar
Elynea Mothren	Tel Mithryn		Dark Elf	Female	11	Apothecary	xx0177DC	xx017778	133	83	84	Alchemy, S
Ulves Romoran	Tel Mithryn	Tel Mithryn Kitchen	Dark Elf	Male	5	Farmer	xx0177DE	xx01777D	83	63	64	Alchemy, D
Varona Nelas	Tel Mithryn	Tel Mithryn Steward's Ho...	Dark Elf	Female	8	Farmer	xx0177DD	xx01777C	108	73	74	Alchemy, D
Amren	Whiterun	Amren's House	Redguard	Male	4	Warrior	0001A66A	00013BAA	85	50	60	One-hande
Braith	Whiterun	Amren's House	Redguard	Female	4	Child	0001A66B	00013BA9	65	0	80	One-hande
Saffir	Whiterun	Amren's House	Redguard	Female	4	Pawnbroker	0001A66C	00013B98	75	60	60	One-hande

- Source: Kaggle

- Credit: M. AJI PRASETYO

- link: https://www.kaggle.com/datasets/muhajipra/people-of-skyrim

- Filename: Skyrim_Named_Characters.csv

Data Integration

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Dataset 3: Dungeons and Dragons 5th Edt. monsters

- 324 entries

- 7 Attributes

- Mixed data types inside single entries: JSON values mixed into strings in a .CSV is a common thing

- Source: Kaggle

- Credit: PATRICK GOMES

- Link: https://www.kaggle.com/datasets/patrickgomes/dungeons-and-dragons-5e-monsters

Data Integration

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Dataset 4: Dungeons and Dragons diverse data

- 5 files with 898 entries total

- Mixed data types inside single entries: JSON values mixed into strings inside a .CSV greets again

- Source: Kaggle

- Credit: SHADOWTIME2000

- Link: https://www.kaggle.com/datasets/shadowtime2000/dungeons-dragons

- Filenames: DnD_classes.csv, DnD_equipment.csv, DnD_monsters.csv, DnD_races.csv, DnD_spells.csv

Data Integration
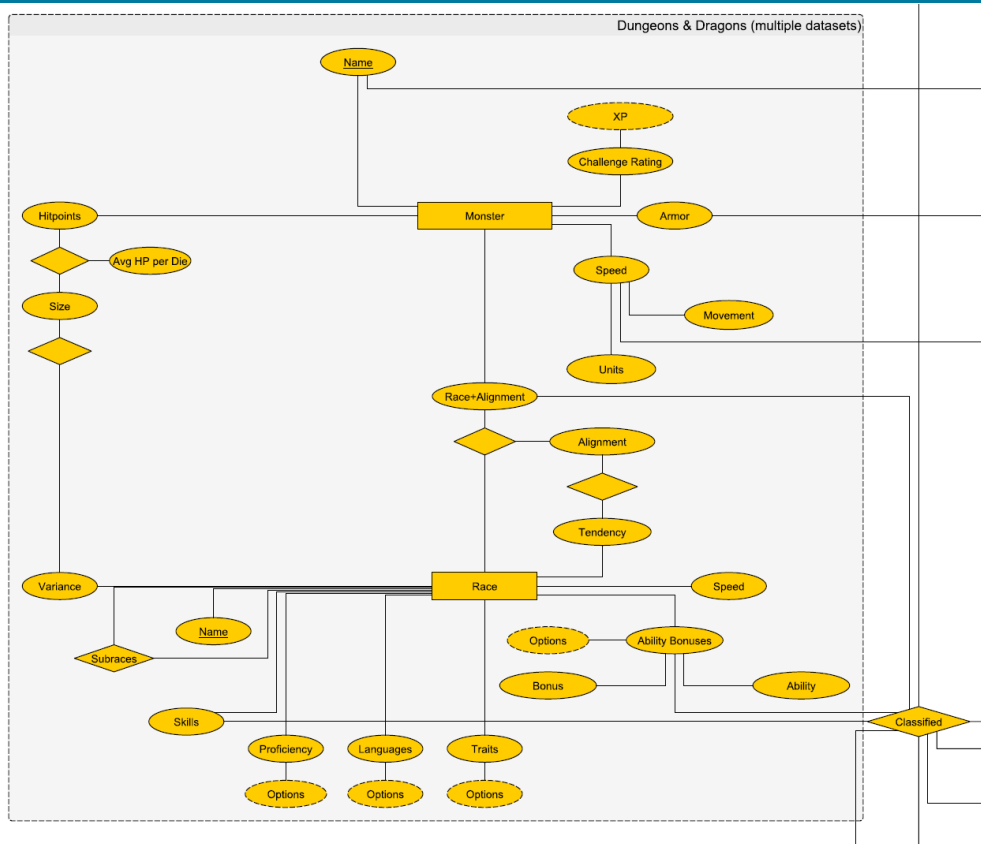Juan Fernando Maya
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Showcase

- What if…

  - If you were a Dragonborn from Skyrim, would you be able to fight actual dragons in Dungeons&Dragons?

  - How about fighting dragons with Yu-Gi-Oh cards instead of rolling a d20?

  - Sociology in the metaverse: which RPG universe is the most diverse?

  - How much *exactly* is 3000 ATK?

    - We need a baseline for answering that

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Draft of an Entity-Relation model (part)
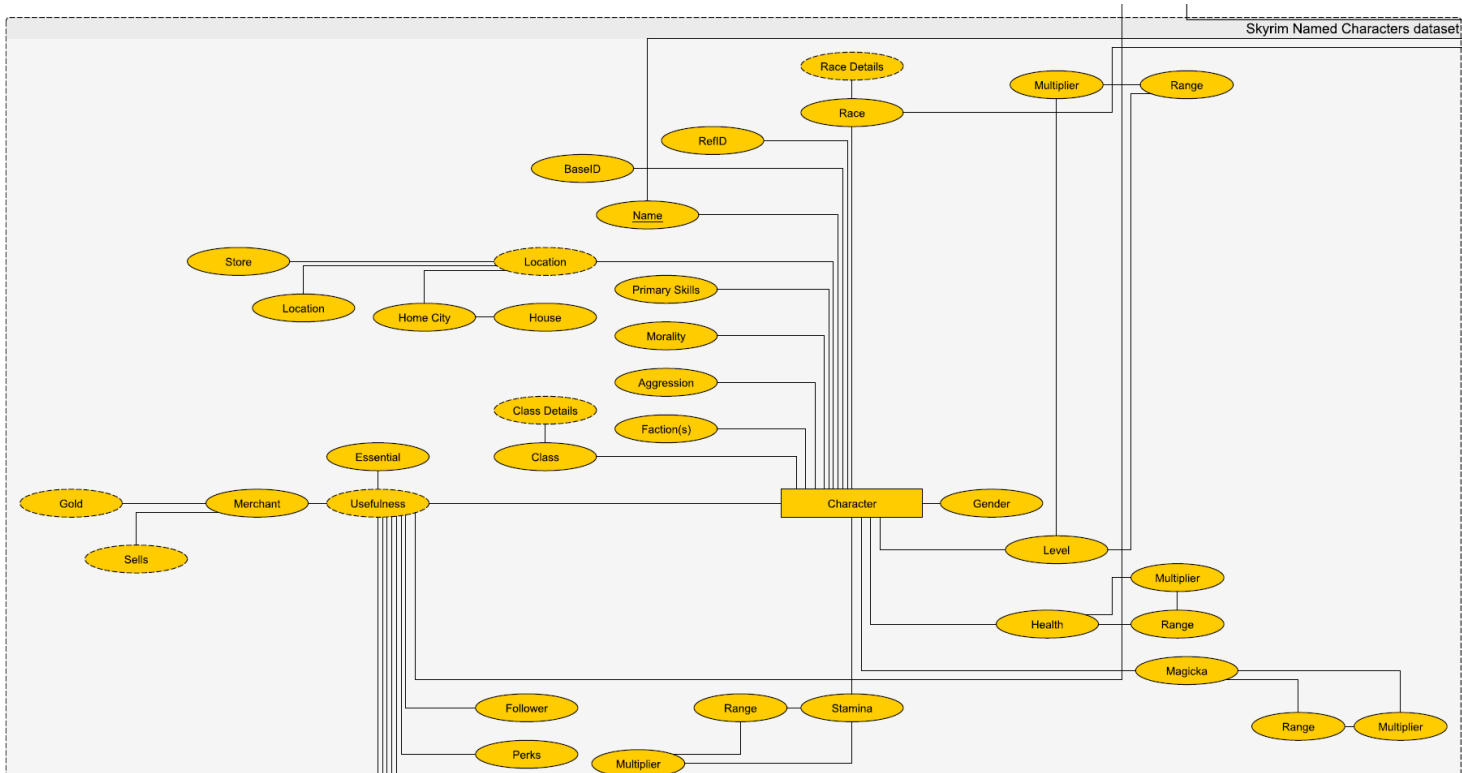

Yu-Gi-Oh! Trading Cards Dataset

Data Integration

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Draft of an Entity-Relation model (part)

Data Integration

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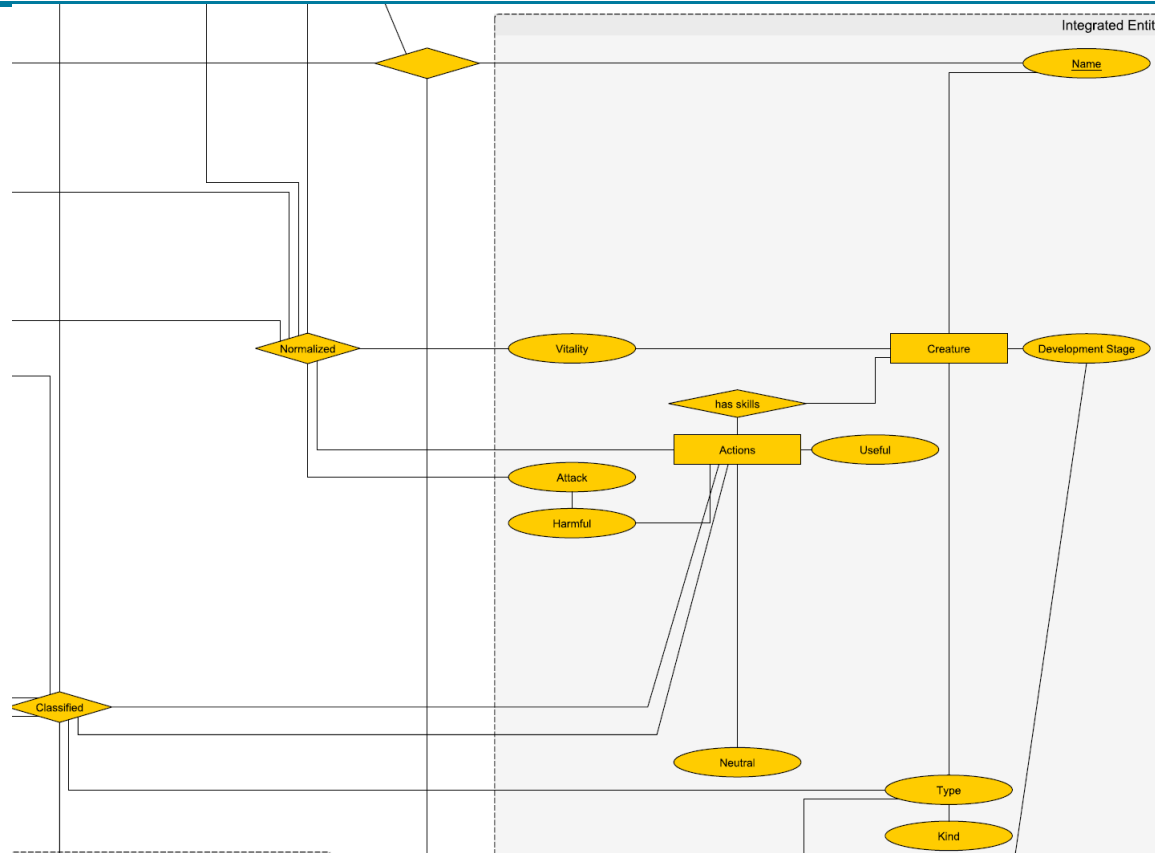
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Draft of an Entity-Relation model (part)

Data Integration

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Draft of an Entity-Relation model (part)

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Draft of an ER-Model (actual size)

Yu-Gi-Oh ->

Integrated Entity

D&D ->

People of Skyrim ->