Video Game Genre Classification & Prediction

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Predict video game genres by learning from its other features







Dataset:

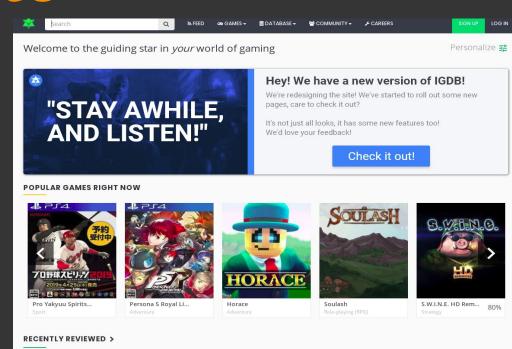
Internet Game Database

- → Top 200 games for each year
- → Sorted by popularity
- → From 2007 to 2018(11 years)

About website

IGDB.com

- Free API
- -Meta reviews
- -aggregate scores



EXAMPLE OF SINGLE QUERY

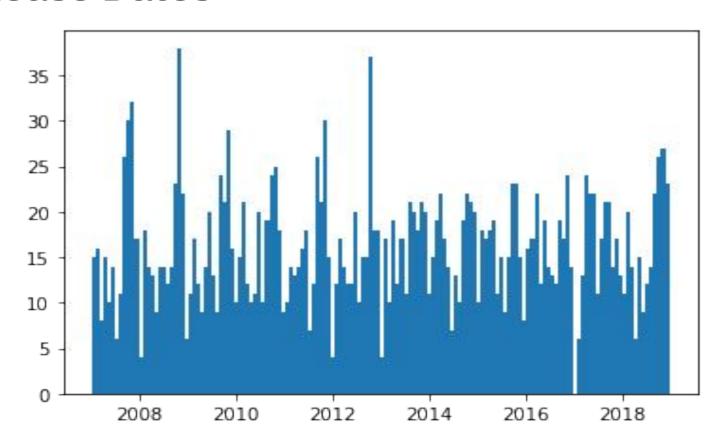
game_engines	NaN		
game_modes	[1]		
genres	[8, 31, 32]		
hypes	NaN		
id	7406		
involved_companies	[17515]		
keywords	[72, 117, 138, 226, 296, 477, 604, 658, 758, 1		
multiplayer_modes	NaN		
name	Aquaria		
parent_game	NaN		
platforms	[3, 6, 14, 39]		
player_perspectives	[4]		
popularity	31.4343		



Note:

The less popular a game is, the more features are null value

Release Dates



Results

		precision	recall	f1-score	support
	0	0.75	0.11	0.10	27
	0	0.75		0.19	27
	1	0.50	0.17	0.25	30
	2	0.62	0.56	0.59	163
	3	0.55	0.30	0.39	74
	4	0.55	0.26	0.35	23
	5	0.57	0.40	0.47	107
	6 7	0.43	0.09	0.15	32
	7	0.64	0.33	0.44	21
	8	0.33	0.07	0.12	27
	9	0.15	0.06	0.09	34
	10	0.00	0.00	0.00	1
	11	0.63	0.60	0.61	252
	12	0.48	0.19	0.27	155
	13	0.00	0.00	0.00	23
	14	0.25	0.04	0.07	24
	15	0.59	0.61	0.60	106
	16	0.00	0.00	0.00	6
	17	0.33	0.04	0.08	70
	18	0.30	0.11	0.16	57
micro	avg	0.57	0.36	0.44	1232
macro	avg	0.40	0.21	0.25	1232
veighted		0.52	0.36	0.40	1232
samples		0.47	0.39	0.40	1232



Thank you!

Questions?