

AI in Multiplayer Games



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~~AI in Multiplayer Games~~ AI so Playing Online Doesn't Suck

...

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A Hammer

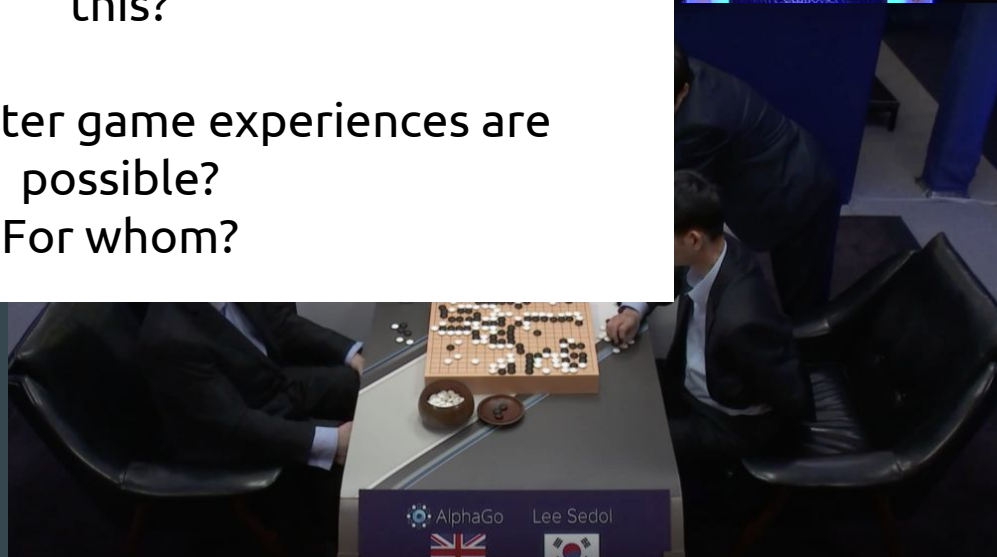
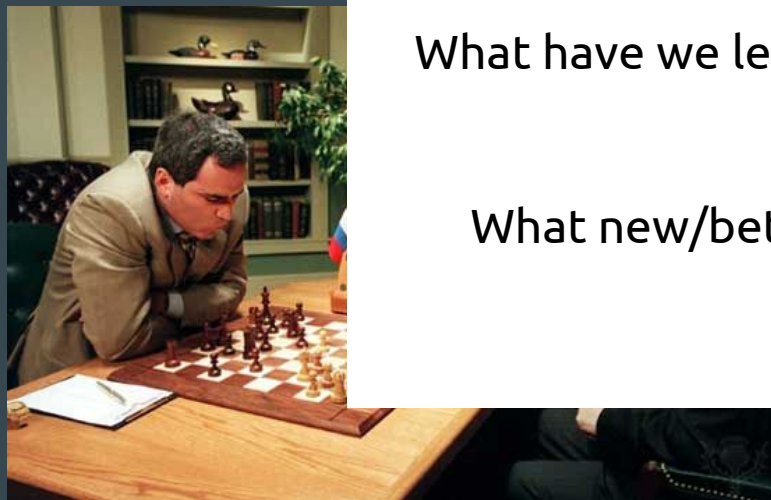
What does AI do?

- Play against people (1 v 1)



What have we learned about games by doing this?

What new/better game experiences are possible?
For whom?



What does AI do?

- Play against people (1 v 1)
- Make stuff for people (1 person)



<https://store.steampowered.com/app/239350/>

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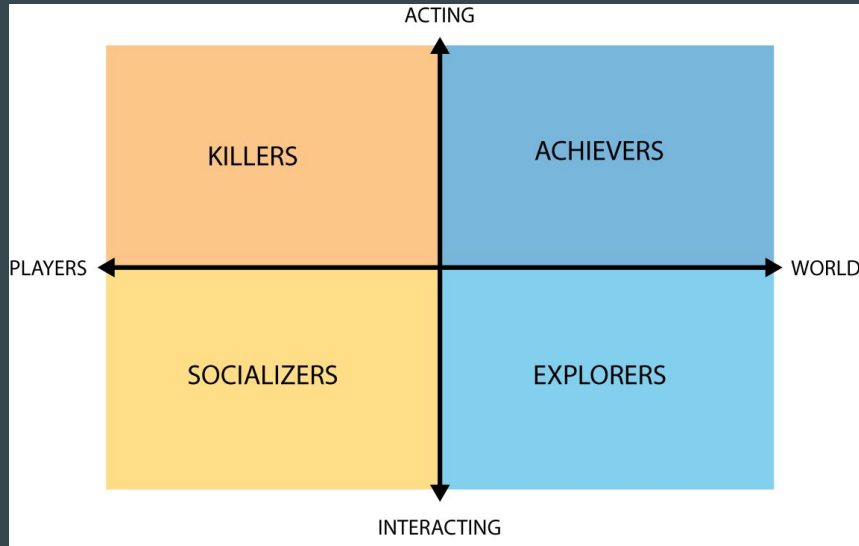


<http://www.rogueprocess.run/>



<https://www.g2a.com/diablo-ii-lord-of-destruction-pc-mac-cd-key-global.htm>

Why do people play?



http://www.gamasutra.com/blogs/AreliusAreliusarson/20130619/194574/Designing_ComputerGames_Preemptively_for_Emotions_and_Player_Types.php?print=1

Achievement	Social	Immersion
Advancement Progress, Power, Accumulation, Status	Socializing Casual Chat, Helping Others, Making Friends	Discovery Exploration, Lore, Finding Hidden Things
Mechanics Numbers, Optimization, Templating, Analysis	Relationship Personal, Self-Disclosure, Find and Give Support	Role-Playing Story Line, Character History, Roles, Fantasy
Competition Challenging Others, Provocation, Domination	Teamwork Collaboration, Groups, Group Achievements	Customization Appearances, Accessories, Style, Color Schemes
		Escapism Relax, Escape from RL, Avoid RL Problems

<http://www.nickyee.com/daedalus/archives/001298.php?page=4>

GAMER MOTIVATION MODEL

QUANTIC FOUNDRY

Action "Boom!"	Social "Let's Play Together"	Mastery "Let Me Think"	Achievement "I Want More"	Immersion "Once Upon a Time"	Creativity "What If?"
Destruction Guns. Explosives. Chaos. Mayhem.	Competition Duels. Matches. High on Ranking.	Challenge Practice. High Difficulty. Challenges.	Completion Get All Collectibles. Complete All Missions.	Fantasy Being someone else, somewhere else.	Design Expression. Customization.
Excitement Fast-Paced. Action. Surprises. Thrills.	Community Being on Team. Chatting. Interacting.	Strategy Thinking Ahead. Making Decisions.	Power Powerful Character. Powerful Equipment.	Story Elaborate plots. Interesting characters.	Discovery Explore. Tinker. Experiment.

<http://quanticfoundry.com/>

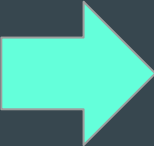
What's a (competitive) multiplayer game about?

- Mastering a space of “content”
 - fighters, maps, weapons, cards
 - E.g., CS: Go, LoL, Street Fighter, Hearthstone
- “The Meta”
- Team coordination
- Climbing the ladder
- Mentoring, coaching, learning
- Chatting and communication

What's the problem?

- Where's the AI for managing multi-party interactions?
 - team vs team
 - player vs player vs player vs ...
 - MMO / stable social world
 - board game negotiations
- How does AI interface with player communities?
 - long-term rival/buddy
 - guilds / teams
 - forums
- How support the full range of (cooperative | competitive) behavior?
 - arranging matches, tournaments, seasons, leagues
 - sparring, training, practicing, spectating
 - mentoring, coaching
 - match/team/strategy analysis
- How address long-term, ongoing social relationships?
 - Evolution of chess strategies (cyborg chess?!)
 - “The Meta” (League of Legends, Hearthstone, ...)

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- Replay analyzers
 - Long-term, cross-game bot buddies
 - (read: not just hacking for profit)
 - Friend & team matchmaking
 - Tournament arrangers
 - Team captains
 - Ranking algorithms
 - Personalized coaches
 - Chat moderators
 - Community managers


AI for Multiplayer Games







Example Topics

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Thanks!

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