## Complicity in Games

Sally Davis

## Complicity in games

- This is where (serious) games become art
- Meaning: what you want your game to communicate

## What do we mean by "complicity"?



Getting people to behave the way you want them to



Getting people to reflect on their choices in the game

MANIPULATION

EXPERIENTIAL LEARNING

## All games are manipulation



	Submit more examples through this Google form:	https://do
Title	Description	Authors
Aircraft landing	Evolved algorithm for landing aircraft exploited overflow errors in the physics simulator by creating large forces that were estimated to be zero, resulting in a perfect score	Feldt, 199
Bicycle	Reward-shaping a bicycle agent for not falling over & making progress towards a goal point (but not punishing for moving away) leads it to learn to circle around the goal in a physically stable loop.	Randlov & Alstrom,
Block moving	A robotic arm trained using hindsight experience replay to slide a block to a target position on a table achieves the goal by moving the table itself.	Chopra, 2
Boat race	Reinforcement learning agent goes in a circle hitting the same targets instead of finishing the race	Amodei 8 2016
Ceiling	A genetic algorithm was instructed to try and make a creature stick to the ceiling for as long as possible. It was scored with the average height of the creature during the run. Instead of sticking to the ceiling, the creature found a bug in the physics engine to snap out of bounds.	Higueras,
CycleGAN steganography	CycleGAN algorithm for converting aerial photographs into street maps and back steganographically encoded output information in the intermediary image without it being humanly detectable.	Chu et al,
Data order -	Neural nets evolved to classify edible and poisonous mushrooms took advantage of the data being presented in alternating order, and didn't actually learn any features of the input impres	Ellefsen e

- Rules drive player behaviour
- Design drives player behaviour
- When all you have is a hammer...
- People do exactly what you tell them
- But we're terrible at telling them what we mean

## All games are experiences



- Emotional memory sticks, information doesn't
- Red-teaming is perspective-taking
- Simulation: perspective-taking is the game
- "Make your mistakes here and you won't make them at sea."

## Every game is a system

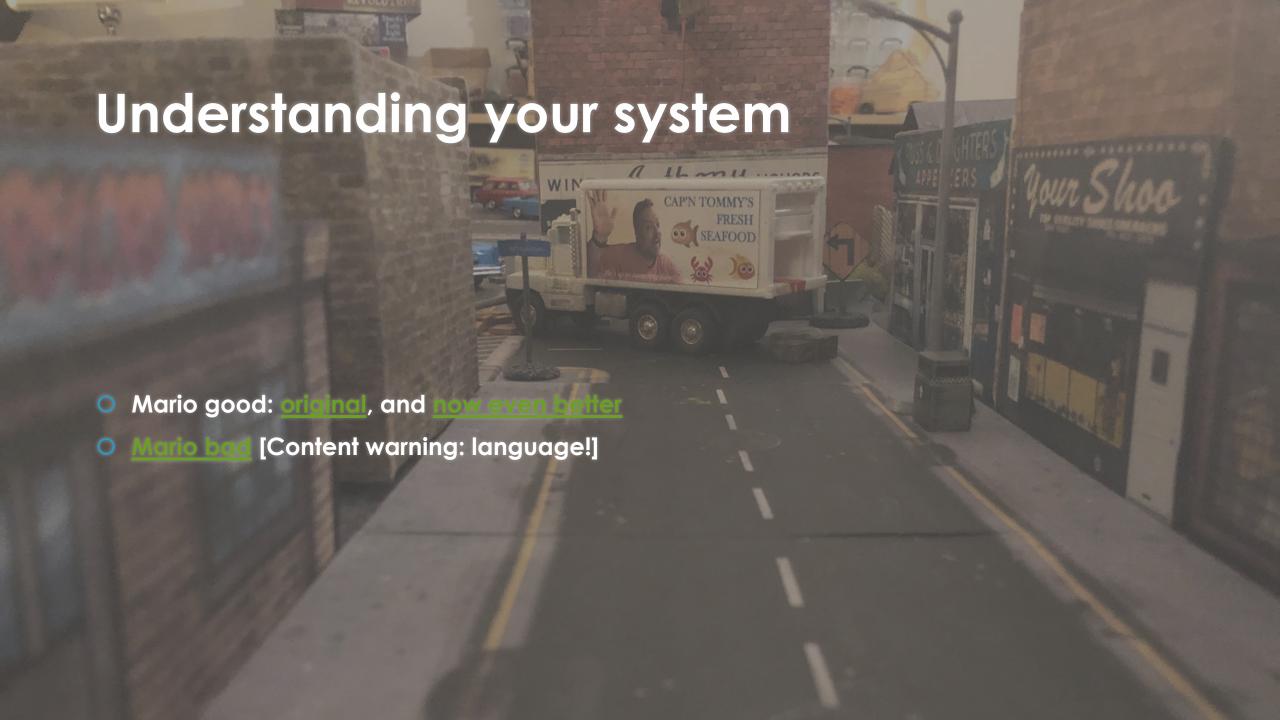
- Doing X should result in Y
- How easy is is to do X?
- Direct influence: rules balancing
- Indirect influence: complicity



## The system boundary



- Complicity brings player emotions inside the boundary
- The game is creating the system
- The system is not a wholly rational machine
- Direct engagement of empathy is the point



- Want to immerse players in a new perspective?
- Marvel: Hawkeye #19



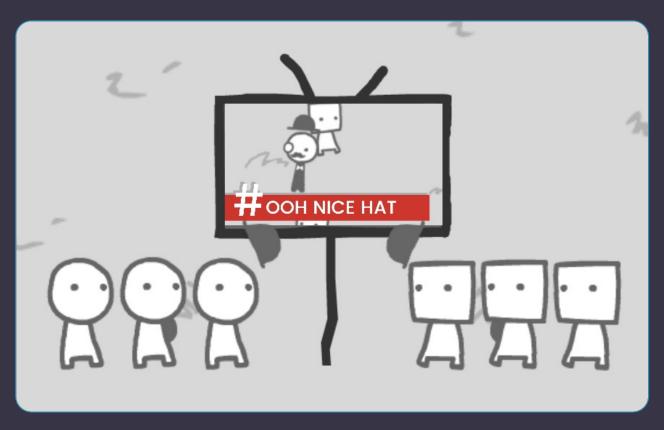
https://www.popmythology.com/a-deaf-comic-geeks-grateful-review-of-hawkeye-19/

- Want players to experience the ultimately-doomed cycle of exploitation-regulation-rejection?
- The Cost



https://spacebiff.com/2020/09/23/the-cost/

- Want to condense what's wrong with social media into 5mins?
- We Become What We Behold



https://ncase.itch.io/wbwwb

- Do you want to play a game of Global Thermonuclear War?
- (too real, sorry)



https://en.wikipedia.org/wiki/WarGames

Whatever you want them to learn is hard has to be embodied in your game as friction, obstacles or barriers.

## Methods

## MR. MISCHIEF

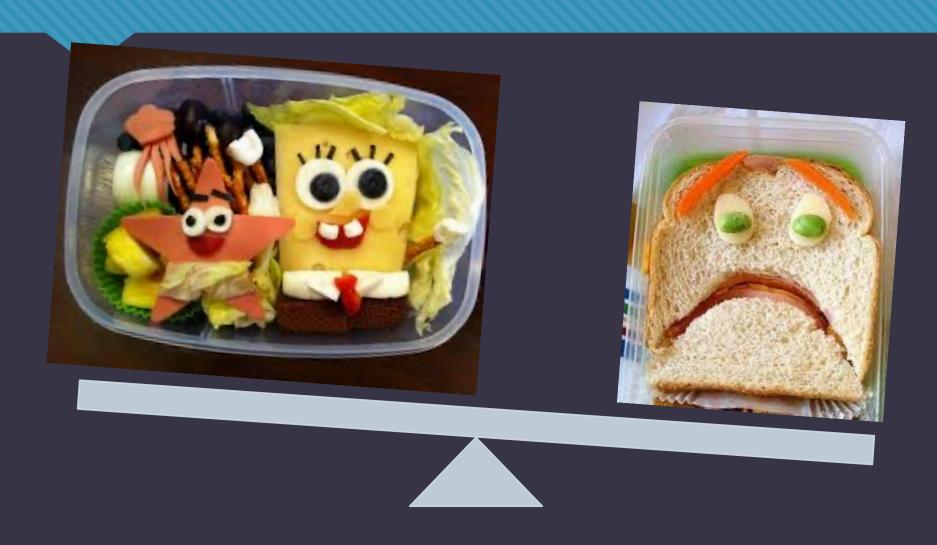
By Roger Hargreaves



## Designing your game for friction

- Making an abstract concrete
- Taking a literal and making it literal
- How you frame the information
- Challenging assumptions, subverting expectations
- Getting players to make and police the system.
- Levers and rewards signal what has value
- Rigging the game: no way to win, or no good choices

## Making an abstract concrete. Taking a literal and making it literal.



# How you frame the information

The past exonerative tense transforms acts of police brutality against Black people into neutral events in which Black people have been accidentally harmed or killed as part of a vague incident where police were present-ish.

#### Examples of Usage

"Mayor Jacob Frey of Minneapolis tweeted Tuesday afternoon that 4 officers involved in the arrest of a man who died after being handcuffed and pinned to the ground by an officer's knee had been fired." (SOURCE)

This classic example of past exonerative tense muddles the events so convincingly that it seems that no one person is responsible for the killing of George Floyd, that the officers were chiefly involved with an arrest rather than a murder, and that knees are sentient, independent entities.

https://www.mcsweeneys.net/articles/how-to-use-the-past-exonerative-tense-to-uphold-white-supremacy

## Framing

- Connections North 2022: Gaming Coalitions: Beyond Generic Blue
- We Come in Peace, Jim Wallman

## Challenging assumptions, subverting expectations

- 1939 RAF Staff College Mosul Wargame
- O Certified Copy
- O <u>Slave Play</u>

#### EXERCISE NO. 9. Serial 2/0915. A.M. CABLE NO. 1. Cable from Air Ministry received at 0200 G.M.T. : "Flying prohibited with all PEGASUS engines series 16b of They are to be withdrawn which your command holds 9. and replaced at once by series 16c. Master connecting rod found to be defective owing to manufacture from steel of incorrect specification." These engines are distributed as follows : (Note. 3 in 55 Sqn., and 2 in 84 Sqn. The rest are in reserve or at the Depot. There are 21 Pegasus 16c engines in stored reserve at the Depot.) Issue to A.H.Q. only at 0915 hrs. actual time 29.3.39.

## Players make and police the system

- Brenda Romero: <u>Train, or how I</u> dumped electricity and learned to love design
- Dog Eat Dog, Liam Burke
- My year of doing terrifying things for diversity & inclusion



http://brenda.games/train

## Levers and rewards signal what has value

- Root: only give them hammers
- Consider the whole cost of an action: process, meta- & in-game rewards



https://ledergames.com/products/root-a-game-of-woodland-might-and-right

bird bet bay bar bat bit book bought bough bone bud buy boy boo bee • • •

## Rigging the game

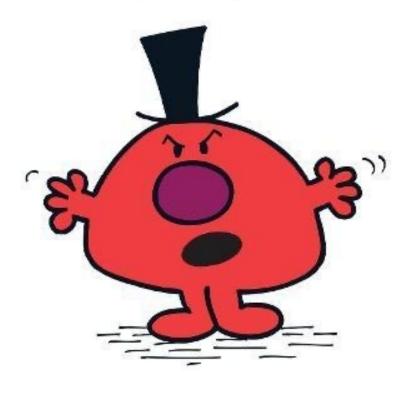
- Make Me Dyslexic
- Aftershock
- O Spec Ops: The Line



https://paxsims.wordpress.com/aftershock/

## **Ethics**

## MR. RUDE Roger Hargreaues



## But should you?

- Objectivity
- Sensitivity
- Inclusion
- O If mechanic can be message, mechanic is always message

### Art

- Mechanic as message: <u>Missile Command</u>
- Aftershock is art: <u>Wargaming has a diversity problem</u>
- $\circ$  2 + 2 = 5

The most powerful stories don't tell you the answer, they show you and let you connect the dots yourself.