Robota Psyche Presentation:

Why We Love Robots

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History of Dolls

SPIRITUAL AND SOCIAL DOLLS

- Jewish, Christian, and Muslim traditions where God formed the first human from the dirt of the earth
- Nuwa, build humans with clay

SPIRITUAL AND SOCIAL DOLLS

- Adrienne Mayor, **"Gods and Robots"**
  - Greek
    - *biotechne*, "life through craft"
    - Talos by Hephaestus, the Greek god of invention
    - Robotic servants, animated statues, and ancient versions of Artificial Intelligence as early as Homer
  - Buddhism
    - Buddha 's precious relics were defended by robot warriors copied from Greco-Roman designs for real automata.
  - Mythic automata appear in tales about Jason and the Argonauts, Medea, Daedalus, Prometheus, and Pandora
  - Described as being built with the same materials and methods that human artisans used to make tools and statues

SPIRITUAL AND SOCIAL DOLLS

Spirit Dolls, The Democratic Republic of Congo

Javanese and Balinese Wayang-shadow puppet

Doll as Teacher

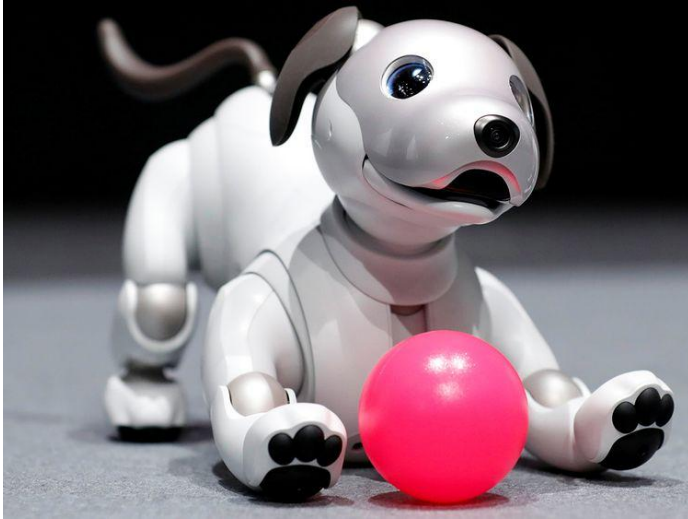- Model gender roles and teach people how to behave in society.

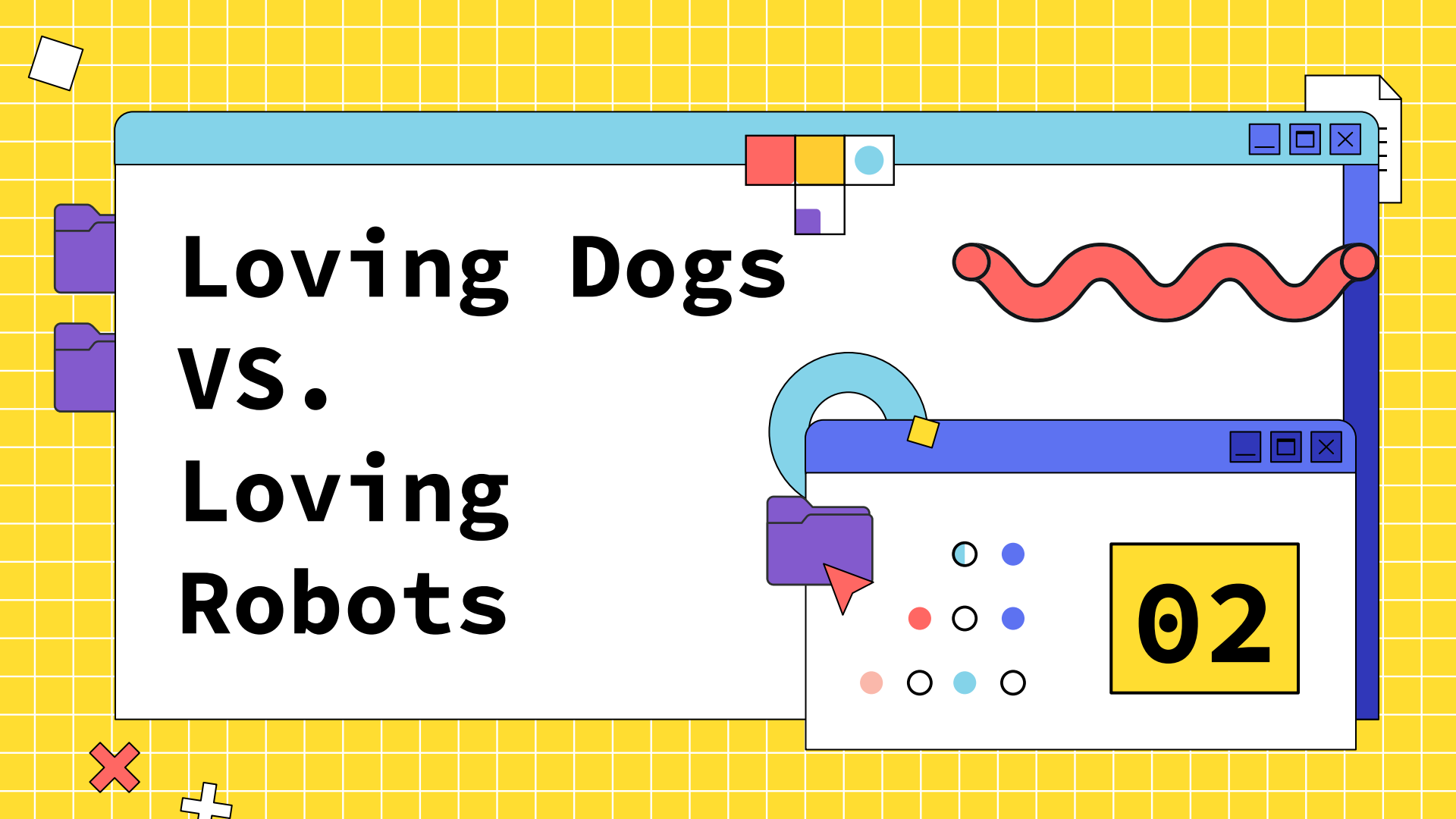Barbie Doll   G.I.Joe

Tech Toys

- Aibo

- Taro
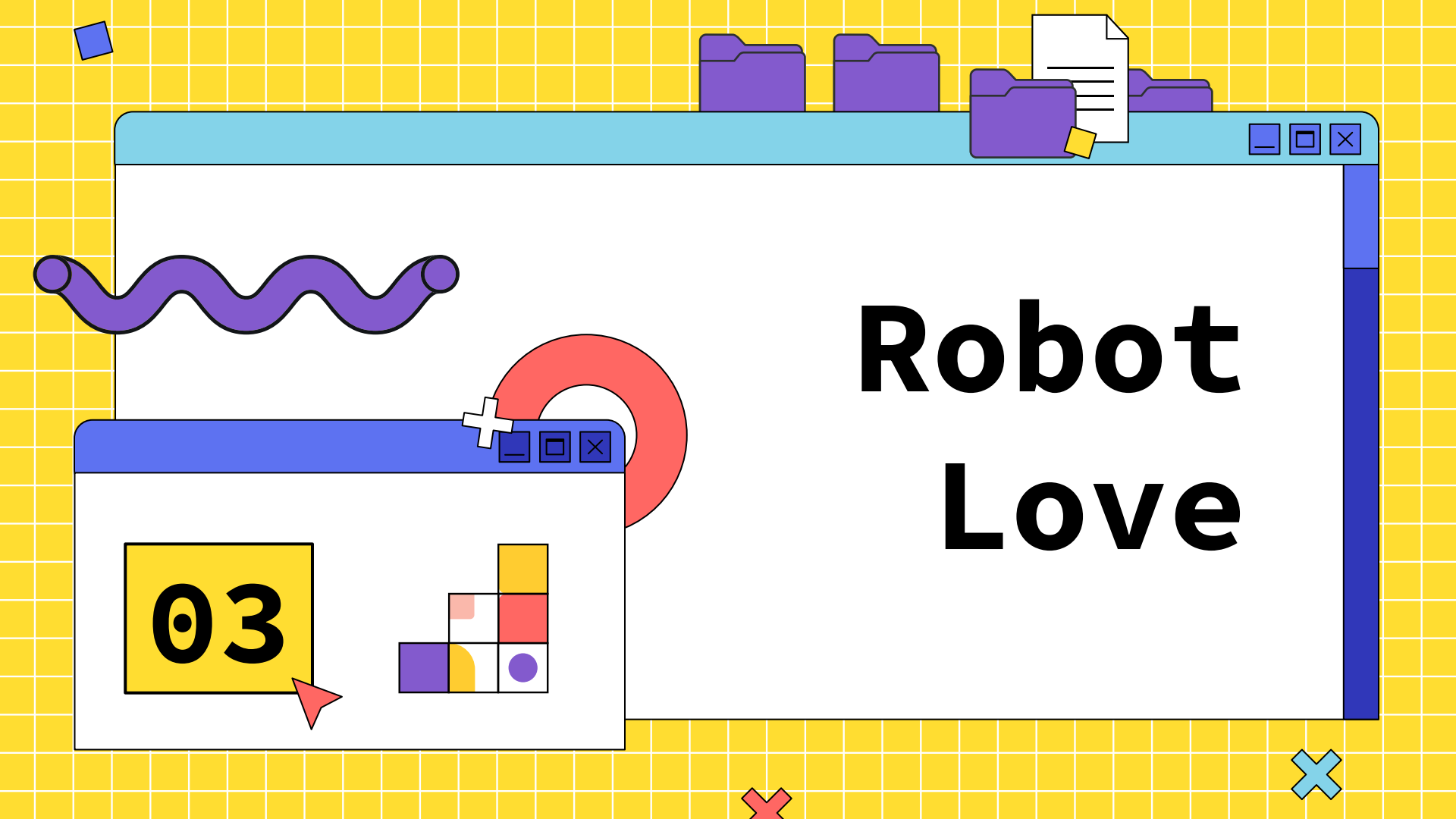
Loving Dogs VS. Loving Robots

02

Aibo - A Dog-like Robot

- People attributed animal characteristics to the robot and viewed it as a family member

- Behaved somewhat differently toward the AIBO and a living dog puppy

- Treat AIBO as a technological artifact that nevertheless embodied attributes of living animals

- Technical competence required for assistance? Or emotional companions?

Questions	Name of the variables used in the analyses	Values of the variables
Q1. Which robot would you choose, if they had the same abilities?	Embodiment	• Humanoid 29% • Machine-like 14% • PeopleBot 13% • AIBO 44%
Q2. What type of robot would you buy if you could afford it?	Buy Robot*	• Would buy a robot • Would not buy 23%
	Robot Type*	• Household robot 64% • Companion robot 13%
Q3. Is it important for the robot to be able to use verbal utterances for communication? - household robot	Household Speak	• Yes • No 63%
Q3. Is it important for the robot to be able to use verbal utterances for communication? - companion robot	Companion Speak	• Yes 78% • No

Q4. Which one would you prefer: changing the behavior of a companion robot by teaching or through programming?	Behavior Change	• by teaching 50% • by programming 50%
Q5. Do you think a companion robot with complex behavior could relieve people's loneliness in the long run?	Decrease Loneliness	• Yes 40% • No 45% • 15%
Q6. Do you think that robots might be dangerous for humans in the near future?	Robot Danger	• Yes 30% • No 47%
Q7. Do you like dogs?	Dog Love*	• Yes • No/Indifferen
Q8. Why? List three characteristics of dogs, which influenced your answer the most.	Liked qualities	(open ended question)
Q9. Is it possible to love an advanced companion robot as much as a dog?	Robot Love	• Yes 12% • No 70%
Q10. Do you have a dog?	Experience with Dogs*	• Yes • No
Q11. Have you ever had a dog?		

Question	Category	Percentage of respondents
Most liked qualities in respondents' own dogs (Q1)	Attachment/devotion	24%
	Individuality/personality	22%
	Unconditional love	22%
	Smartness	18%
	Kindness	16%
	Attentiveness	15%
	Obedience	12%
	Playfulness	10%
Reasons why respondents would not buy a robot-dog (Q3)	A machine could not substitute a real animal	21%
	It would have no emotions/it is not a sentient being	21%
	It would have no personality/individuality	19%
	It would not be alive	16%
	There would be no challenge in it	13%

Reasons why respondents would not replace their dog with a perfect one (Q6)	I love it with its faults	16%
	I'm attached to it	13%
	I brought it up/I know it from its birth	12%
	I accept its faults	12%
	It is my dog/that would not be my dog	12%
Advantages of dogs over robots (Q9)	Personality	31%
	Emotions	28%
	Love	19%
	Empathy	18%
	Attachment	16%
	Aliveness	15%
	Thinking	12%
	Cooperation	12%

03

Robot Love

Personification

- The more human-like a robot seems in both appearance and ability, the easier it is for us to project human thoughts and feelings onto them
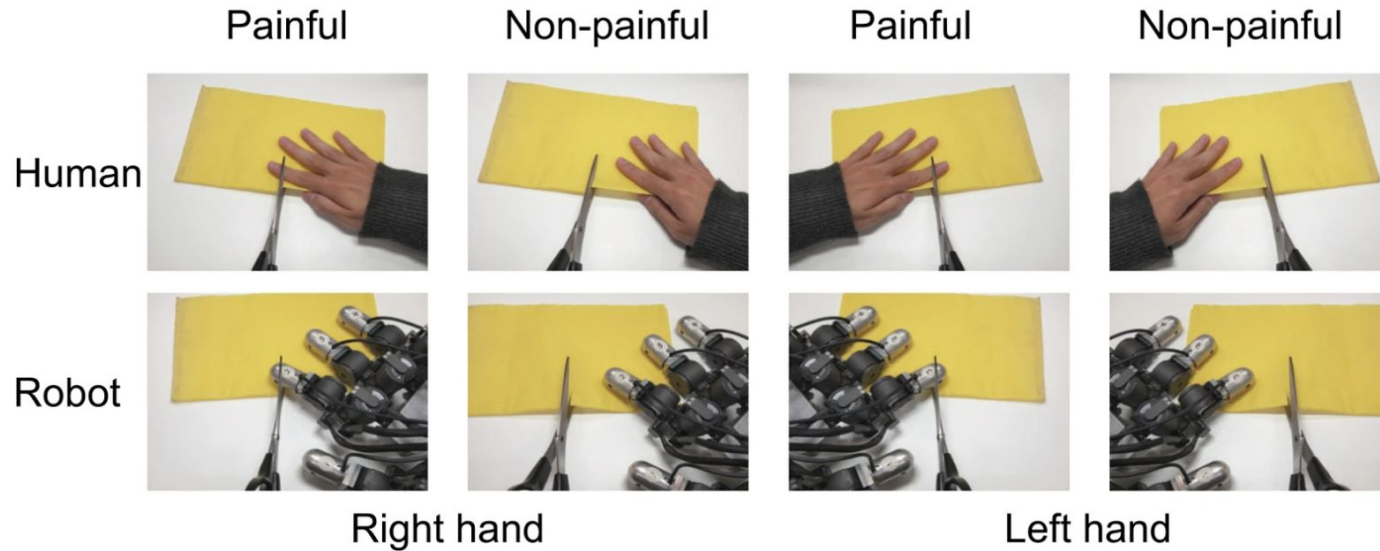 - Japan (Shinto/Animism) — Objects have souls

Pleos

(0:15 — 1 : 21)

Narrow the gap between machines and people by making sounds mimicking facial expressions, or reacting physically to their surroundings.
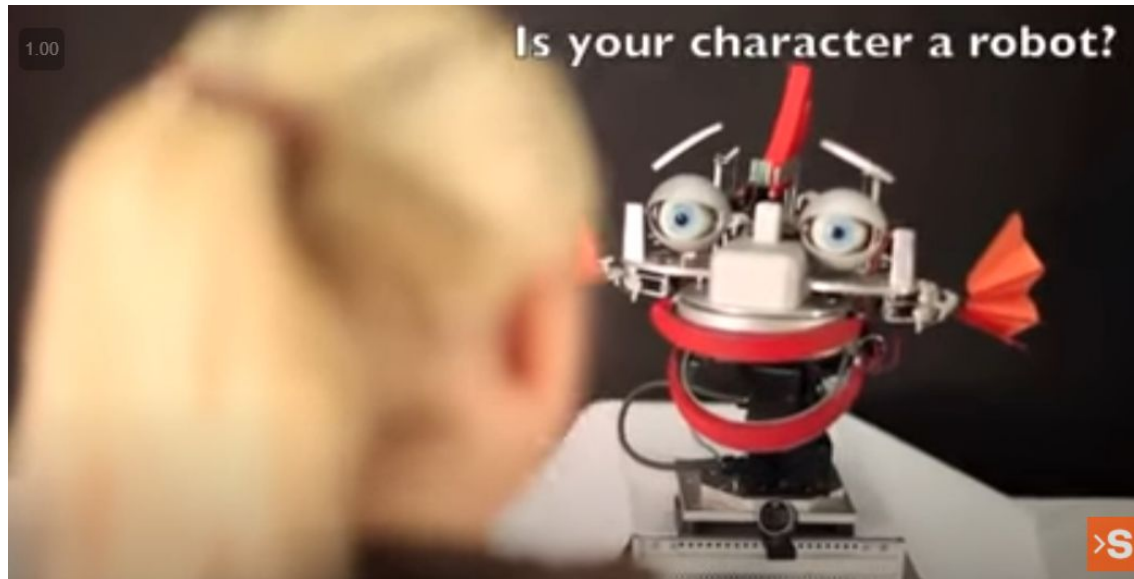
"We are biologically hardware to project intent and life onto any movement in our physical space that seems autonomous to us."

| Painful | Non-painful | Painful | Non-painful |

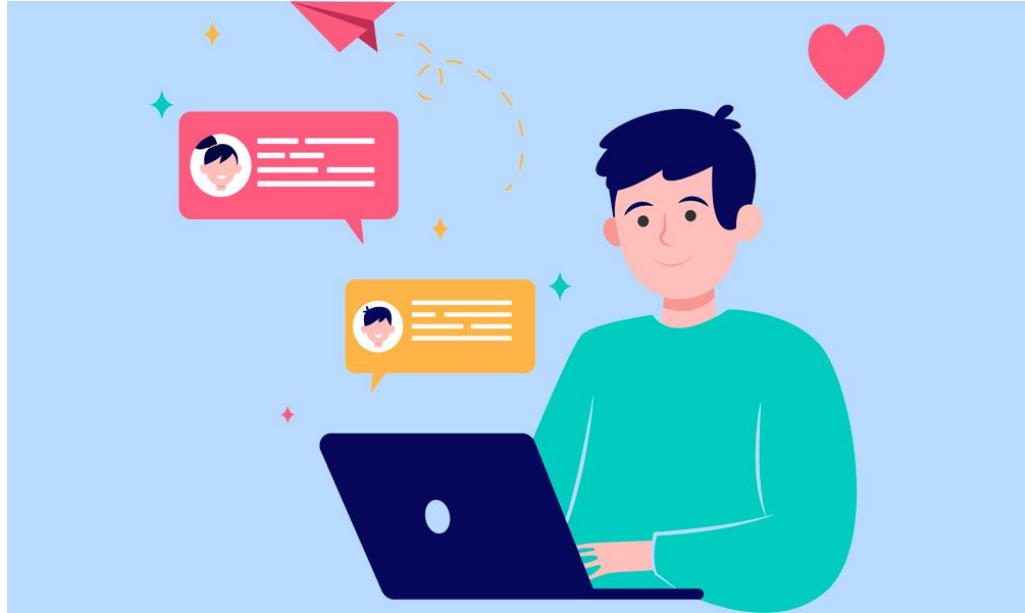Human

Robot

Right hand　　　　　　　　　　　　　　Left hand

Researchers measured the participants' responses with EEG scans, which indicated that the subjects experienced similar visceral responses to images of human and robot hands in painful situations.

Researchers from Munich conducted a study demonstrating that <u>when robots mirror human emotions</u> by smiling back at them or matching their level of enthusiasm, humans are more disposed to help them complete a task

Advantages of Loving Robots

- Less pressure when chatting online
- Human love is complex & simpler relationship with robots
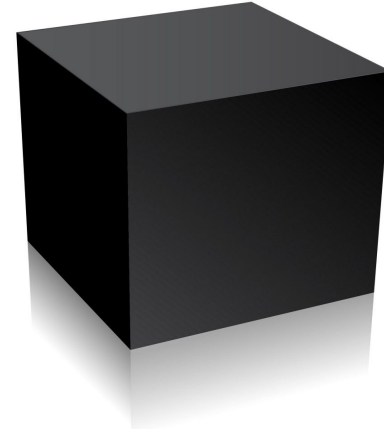- (Know your taste/Love you always/No worries on social relations…)

Obstacles

- AI cannot make nuanced emotional responses
- A relationship with a robot much like that of dog and master
- Whether or not the robot could love you back – "using"
- Worries that bubbling up
- Necessity for faults

Stigmatization

- Would a human-robot relationship be deemed as worthy as a human-to-human one?
- Would those who kept a robot lover be considered unable to find or attract a real person?
- Why love someone who never loads the dishwasher, forgets your birthday, or hates your friends when a robot won't ever?
  - These interactions could never have the depth, texture, or breadth that a real human relationship has, warts and all.
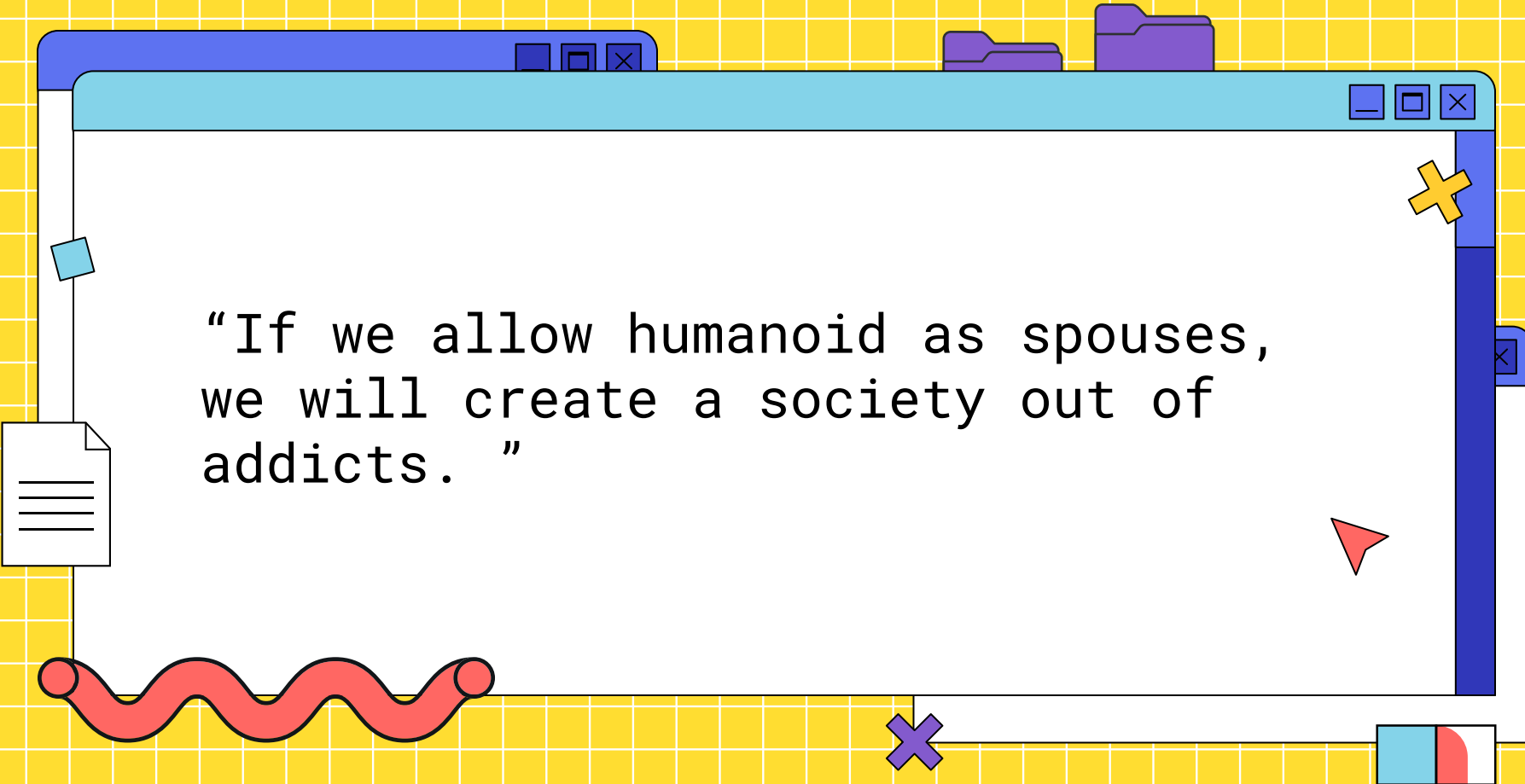
Love: Human-like Alterity

True Companion is a robot girlfriend named Roxxxy introduced in 2010

(1)   What is directly given by the communication acts and gestures of the empirically observable living body

(2)   What is indirectly construed on the basis of the latter.

Features of Human Romantic Relationships

(1) It would need to engage the whole of our **subjectivity** by
(2) **re-organizing our embodiment**; it has to provoke
(3) **predominantly affective forms** of
(4) **intensive meaning-making** regarding especially the
(5) **two-level constitution of alterity of the beloved**: what is directly given by communication acts and gestures of the empirically observable living body, and what is indirectly construed by our sense-making activity. It has to invoke in us .
(6) to **longer temporal horizons**, and there have to be
(7) **dominant cultural meanings** that categorize our relationship, and existing social norms and institutions that hold it socially acceptable and organize the relationship on the practical level.

"If we allow humanoid as spouses, we will create a society out of addicts. "

04

Reflection on Humanities

Pleos Ethic Experiment

Why we have an emotional connection to robots | Kate Darling

(7:50 — 9:01)

TALON Tracked Military Robot

Funerals and Medals

HexBug

People with higher empathy are more hesitant to hit Hex Bugs.

"Do we empathize with Robots?" X

"Can robots change people's empathy?"
√

"Can robots change people's empathy?" √

- Prevent kid kicking out robot not just out of respect for property but because the kid might be more likely to kill a real dog (video games?)
- Even if robots do not feel, our behaviours towards them might matter for us
- Robots might help us to find a better understanding of ourselves
- Empathy — How we relate to others
- They are reflections of our humanities.

Discussion Questions

1. Is it meaningful for us to project personalities on everything around us and have emotional connections to them?
2. Would you fall in love with a robot? If the robot does not have emotions? Does it matter for love to emerge without robot emotions? What is the necessity feature for you to fall in love with a robot?
3. Do you think the love relationship between human and robots is different from human-robot relationship?
4. Can humans have some certain type of emotional connection to robots that we don't have to humans/robots/objects?
5. Is that okay for you to kill the Pleos (Robot Dinosaurs)? Why/Why not?
6. Can robots change people's empathy? Do you agree with the violent video problem — if a kid kick a robot, he/she is more likely to kick animals?

Resources

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