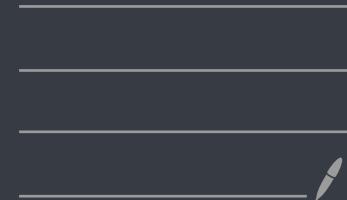


# INCLUSIVE DESIGN

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# DOES PARTICIPATORY DESIGN WORK?

- WHAT PERSPECTIVES WERE REPRESENTED AT YOUR TABLE?
- WHICH WERE MARGINALIZED?
- WHO SPOKE THE MOST?
- WHO SPOKE THE LEAST?
- WHOSE PERSPECTIVE WAS MOST REPRESENTED BY YOUR SUMMARY?
- WHOSE PERSPECTIVE WAS LEAST REPRESENTED?
- WHAT WERE POINTS OF DISAGREEMENTS? HOW DID YOU RESOLVE THEM?
- DID YOU FEEL COMFORTABLE TO SPEAK AND DISAGREE?
- DO YOU THINK OTHER PEOPLE FELT COMFORTABLE SPEAKING & DISAGREEING? DID YOU CHECK?
- DID YOU UNDERSTAND OTHER PEOPLE'S PERSPECTIVES? DID YOU CHECK?

## READING LIST:

1. Angwin, Julia, et al., Machine Bias: There's software used across the country to predict future criminals. And it's biased against blacks, *ProPublica* (2016)
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4. Black, Emily, and Michael A. Madaio. "A Call for Universities to Develop Requirements for Community Engagement in AI Research."
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9. Lohr, Steve. Facial Recognition Is Accurate, if You're a White Guy, *The New York Times* (2018).
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11. Obermeyer, Ziad, et al. "Dissecting racial bias in an algorithm used to manage the health of populations." *Science* 366.6464 (2019): 447-453.
12. Sloane, Mona, et al. "Participation is not a Design Fix for Machine Learning." *arXiv preprint arXiv:2007.02423* (2020).
13. "Predictive Policing Algorithms Are Racist. They Need to Be Dismantled." MIT Technology Review. 2020.
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## PROBLEM: WE HAVE DESIGN BLINDSPOTS

- PERSPECTIVE GAP
- DATA GAP
- NEGLECT OF THE SOCIAL SYSTEM

## SOLUTION: PARTICIPATORY DESIGN

- DIVERSIFY THE DECISION MAKING SPACE
- BUILT ON LIVE-EXPERIENCE

## PROBLEM: THERE ARE BARRIERS TO PARTICIPATION!

- YOU DON'T EVEN KNOW WHO TO TALK TO!

"VISIBLE VS INVISIBLE AXES OF MARGINALIZATION"

↳ "GENDER PRESENTATION U.S. GENDER IDENTITY"

- PEOPLE DON'T FEEL COMFORTABLE PARTICIPATING
  - "MICRO-AGGRESSION"
    - ↳ "GATE-KEEPING"
    - ↳ "STEREOTYPE THREAT/LIFT"
  - IT TAKES A LOT OF WORK TO PARTICIPATE!
    - ↳ "INVISIBLE LABOUR"
    - ↳ EMOTIONAL, TIME, UNPAID, UNRECOGNIZED
  - BECAUSE YOU'RE HARD TO TALK TO!
    - ↳ "PRIVILEGE HAZARD"
    - ↳ "SUCCESS HAZARD"
    - ↳ "SURVIVOR HAZARD"

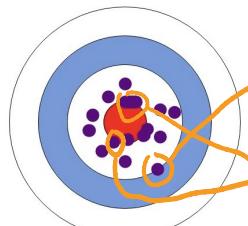
# SOLUTION: ACTIVELY DISMANTLE BARRIERS!

APPLY THEORETICAL FRAMEWORK

1. RECOGNIZE & UNDERSTAND
2. INTERVENE → IDENTIFY:
  - INSTITUTIONAL
  - PERSONAL
3. BE PREPARED TO BE WRONG!

## ① RECOGNIZE & UNDERSTAND

### EX: BIAS VS VARIANCE

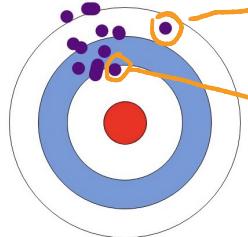


"I'VE ALSO HAD BAD DAYS / SET-BACKS / STRUGGLES"

"WHEN I WORK HARD GOOD THINGS HAPPEN TO ME"

"MY ADVERSITY MADE ME STRONGER"

$$\left. \begin{array}{l} \text{IE} \\ \text{interactions} \end{array} \right\} \begin{bmatrix} \text{OUTCOME(EFFORT)} \end{bmatrix} = \text{OUTCOME(EFFORT)}$$



"MAYBE YOU HAD A BAD DAY"

"MAYBE THAT PERSON WHO MIS-TREATED YOU WAS HAVING A BAD DAY"

"MAYBE IT'S JUST ONE BAD APPLE"

$$\left. \begin{array}{l} \text{IE} \\ \text{interactions} \end{array} \right\} \begin{bmatrix} \text{OUTCOME(EFFORT)} \end{bmatrix} \neq \text{OUTCOME(EFFORT)}$$

## SOLUTION: ACTIVELY DISMANTLE BARRIERS!

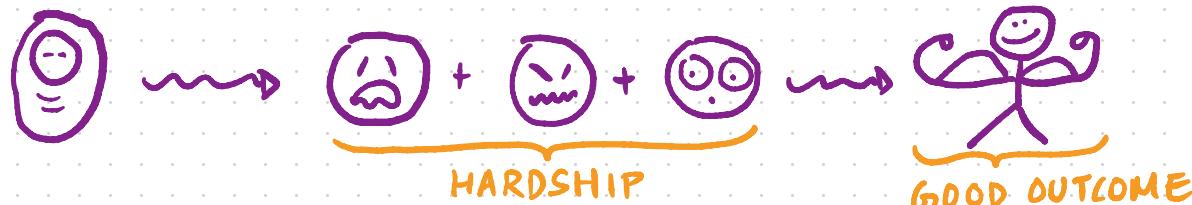
1. RECOGNIZE & UNDERSTAND
2. INTERVENE → IDENTIFY:
  - INSTITUTIONAL
  - PERSONAL
3. BE PREPARED TO BE WRONG!

APPLY THEORETICAL  
FRAMEWORK

### ① RECOGNIZE & UNDERSTAND

EX: TELEOLOGICAL & MODAL SCOPE FALLACIES

"IT HAPPENED SO IT MUST HAVE HAD TO HAPPEN"



TELEOLOGICAL: "BECAUSE A HAPPENED THEN B HAPPENED,  
THEREFORE A CAUSED B"

MODAL: "BECAUSE A, B RESULTS IN C,  
SCOPE THEREFORE A AND B ARE NECESSARY FOR C"

# SOLUTION: ACTIVELY DISMANTLE BARRIERS!

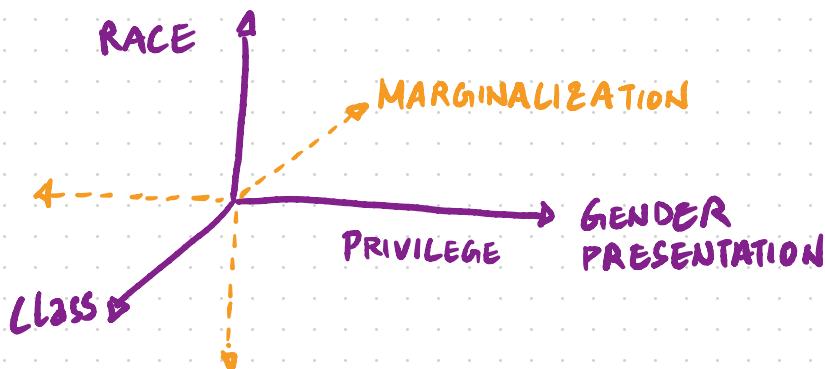
1. RECOGNIZE & UNDERSTAND
2. INTERVENE → IDENTIFY:
  - INSTITUTIONAL
  - PERSONAL
3. BE PREPARED TO BE WRONG!

APPLY THEORETICAL FRAMEWORK

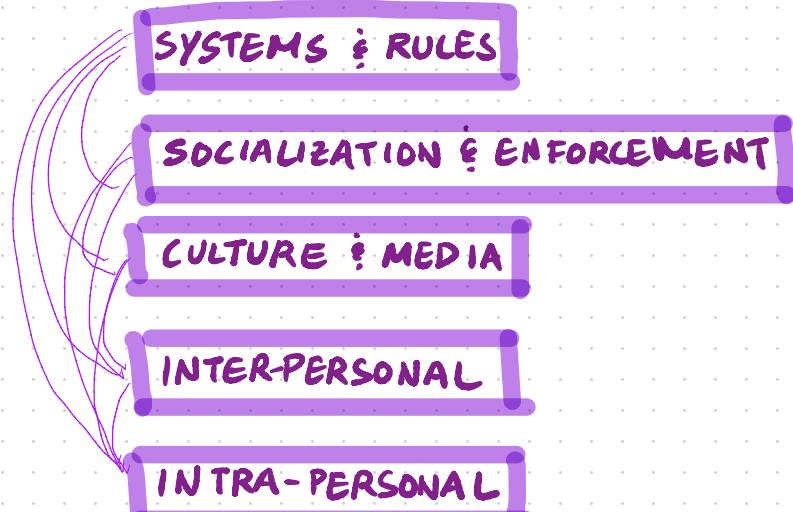
## ① RECOGNIZE & UNDERSTAND

EX: INTERSECTIONALITY

"EACH EXPERIENCE OF EACH PERSON IS A (NON)LINEAR COMBO OF IDENTITIES (BASIS ELEMENTS)"



EX: MATRIX OF DOMINATION



THIS IS A COMPLETE GRAPH!