



# The “First Mile” of Delivering SPJ: Human-Centered Design

**Tina George**

**Global Co-Lead SPJ Delivery Systems  
with**

**Kathy Lindert, Vasumathi Anandan, Jumana Qamruddin & Jake Solomon**



2



Yet we need to pay more attention to the perspective of the people these programs are trying to serve – i.e., to the “First Mile” of Program Delivery



**Who are the people** we are trying to serve? Are they a homogeneous or diverse group? What are their characteristics, situations, perspectives?



**What is their experience** navigating the program or delivery processes? What does that journey look like? What are their pain points?



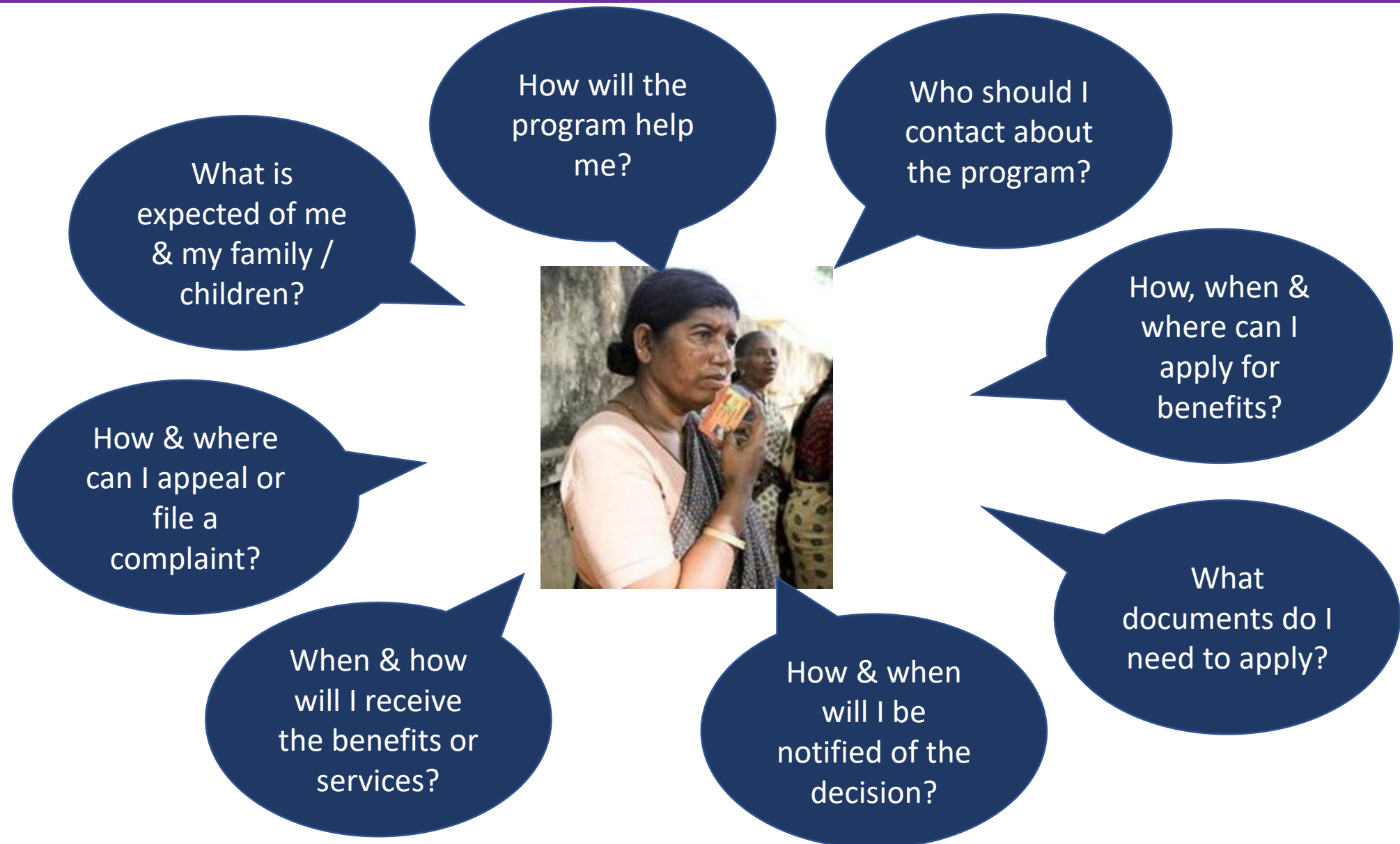
**How can programs and delivery processes be better designed** to serve these end-users?

# What is Human-Centered Design?

**The continual process of understanding and meeting user\* needs.**





\*Users of SPJ = applicants, beneficiaries, individuals, households, firms

# “End-Users” interact with SPJ programs in many ways



The risks of designing  
with incomplete  
information

Spending time, energy &  
resources, and finding out  
there's a better solution

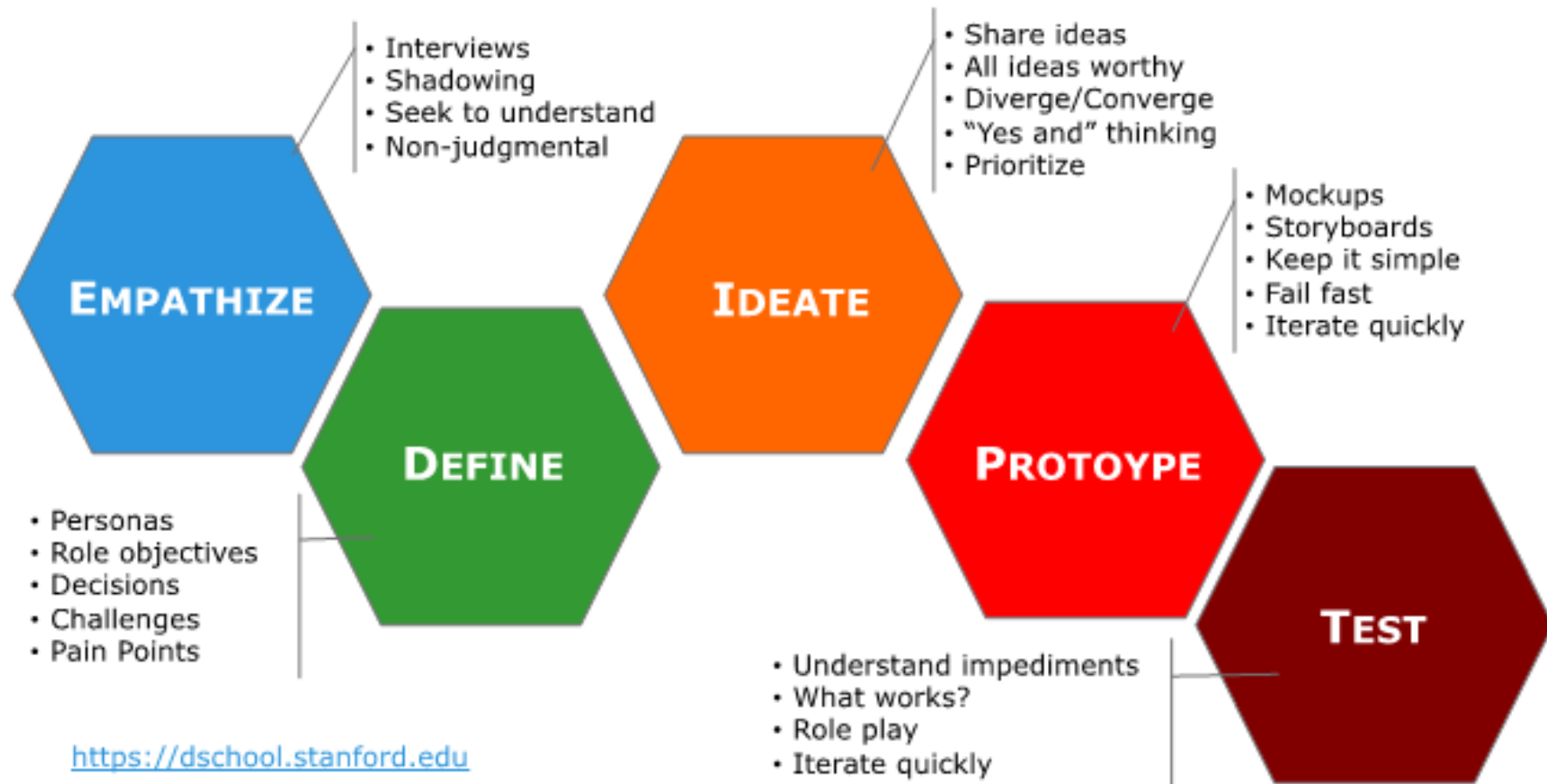


Hence, the need for  
Human-Centered Design!

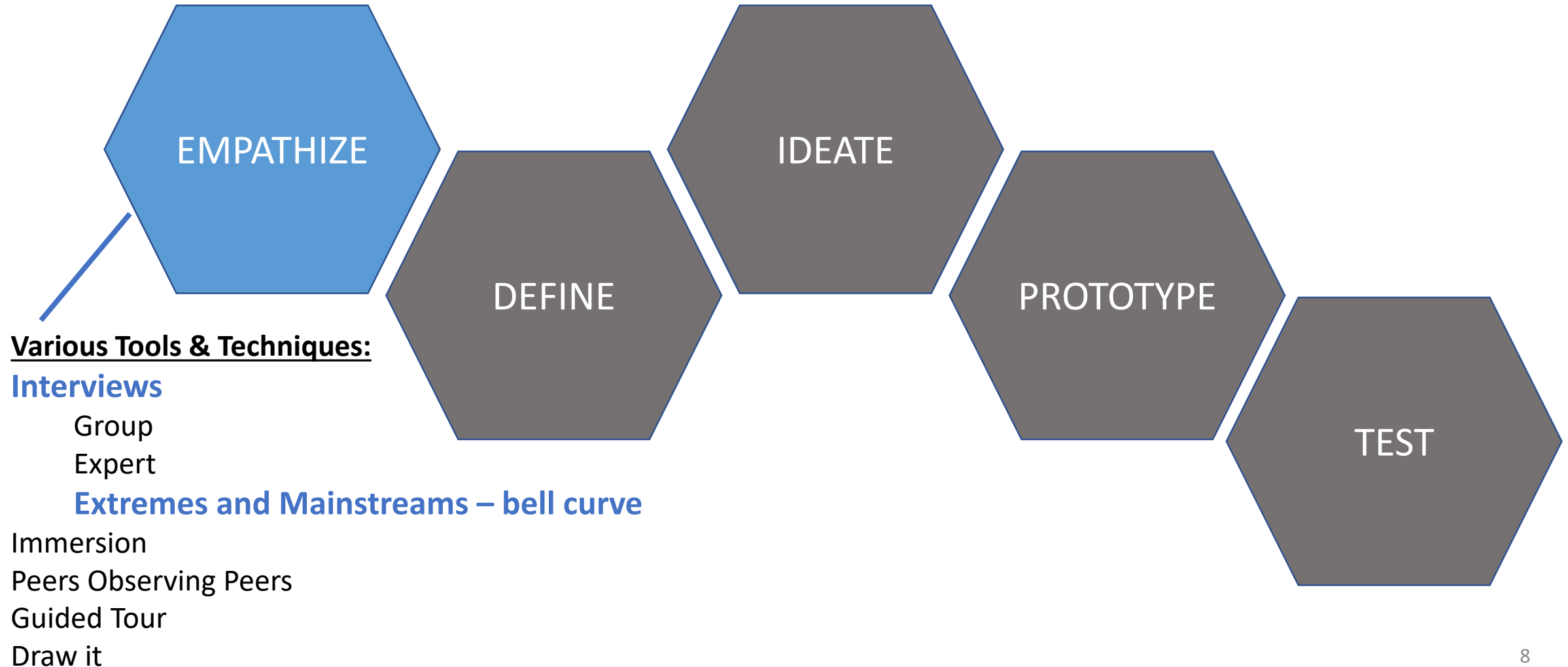
Making assumptions  
made on behalf of  
'first mile' - flawed  
perceptions

Weaknesses in  
program design and  
program delivery and  
poor experience

Human-Centered Design: A series of steps through which the design passes before it is completed to improve the chances of arriving at a better solution.



# EMPATHIZE: Understanding whom we're trying to serve





# Group Interviews & Site Visits

Designing and adapting solutions for diverse populations.  
Indonesia CCT Example: Delivering Payments in Remote Areas



PKH beneficiaries in sub-district of Fena Leisela, Buru Island. Photo © Kathy Lindert

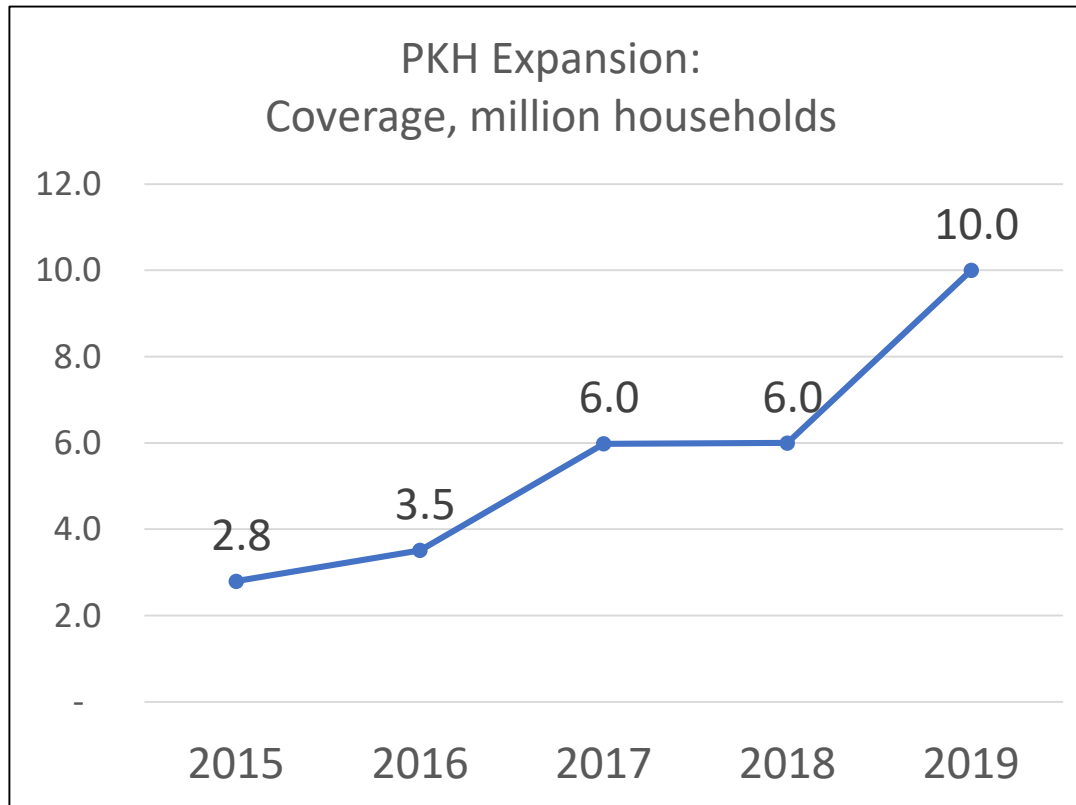


# Indonesia's Family Hope Program (PKH) – Conditional Cash Transfers Rapidly Scaling Up – Including to Remote Areas

The PKH Program rapidly scaled up.  
 It now covers 10 million households,  
 > 40 million people

The Government also made a deliberate  
 decision to expand coverage nationally  
 - Including to Remote Areas

PKH Expansion:  
 Coverage, million households

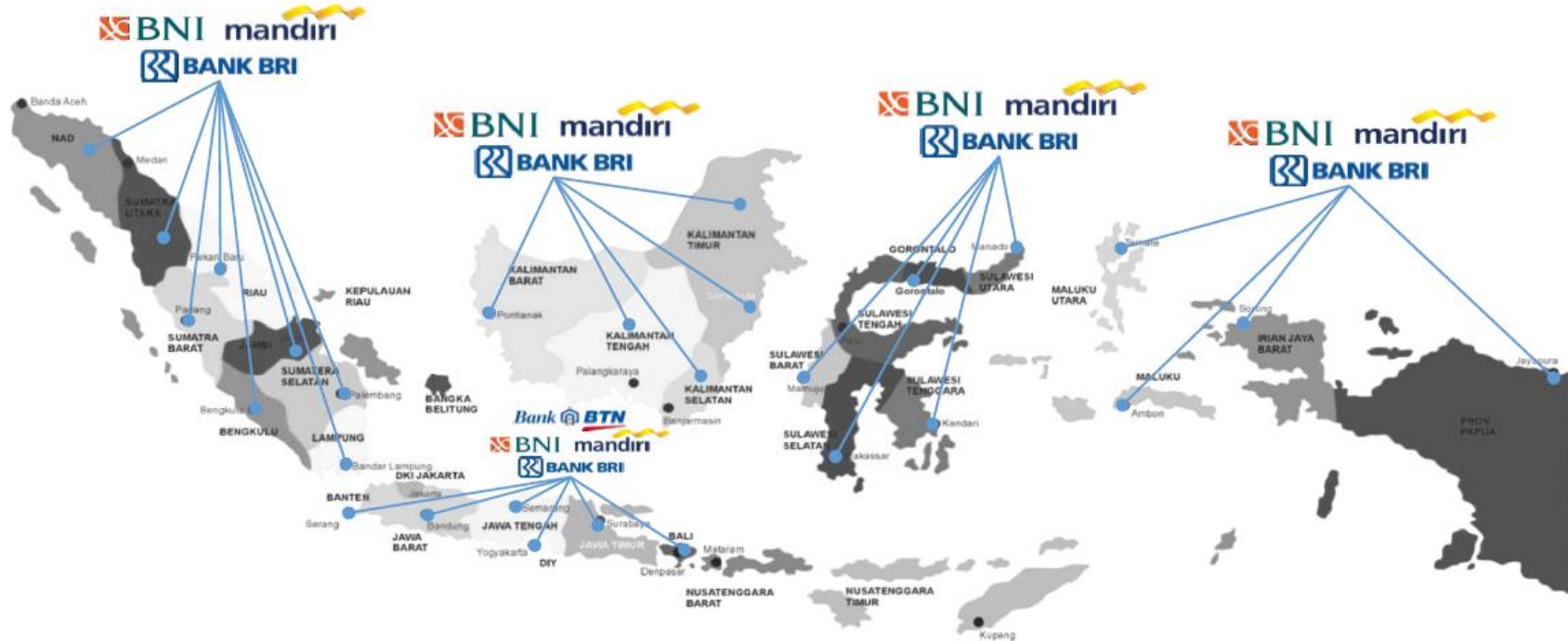


At the same time, Indonesia made a rapid shift from manual delivery of cash payments to an e-payment system, with significant gains in efficiency and transparency

 **18,921**  
OUTLETS

 **60,992**  
ATMS

 **193,901**  
BANK AGENTS



#### 2007-2016

- Cash payment
- Using services from PT Pos Indonesia
- Distribution cost could reach Rp120M per annum



#### 2016 s/d now

- Cashless payment
- Using banking services from states owned banks (HIMBARA)
- Efficiency: distribution cost 0
- Almost 10 millions of poor people have bank accounts (with ATM)

However, while this may be an efficient solution overall, it is also facing challenges in remote areas.





3 Perspectives of e-payments in remote areas



## Indonesia CCT Program: Payment Service Provider – Mandiri Bank



We don't have any ATMs on the island of Buru, but beneficiaries can use the ATMs of other banks (BRI, BNI). But... the ATMs only disburse in denominations of R\$50,000 or R\$100,000 – which doesn't always match the needed denominations of benefit levels.

For most areas, there are no ATMs. So, we have to travel long-distances to the sub-districts to pay beneficiaries of PKH. We aren't used to going to those areas. We had never been there before.

We have to go outside regular working hours, so we go on Saturdays with our whole team (15 staff). There is no signal in the sub-districts so we work offline and then go upload the information at the office later.

We have to meet our own accounting standards, and verify the identity of people on the list to make the payments. Many of the beneficiaries don't have IDs – so we have to postpone payments.



## Perspective of PKH Beneficiaries in Namlea Sub-District, Island of Buru (not so far from District Capital)

There are ATM machines in town.  
It's over 5 kilometers from our village.

We had never used an ATM card before.  
We had to learn to punch in the (PIN) numbers.  
At first it was hard to do it, but now we can do it

We liked it better with PT-POS (post office) because they brought the payments to us in our village. Now we have to travel to get to town to the ATM. It costs R\$30,000 to get to town. Can they give us a shuttle?



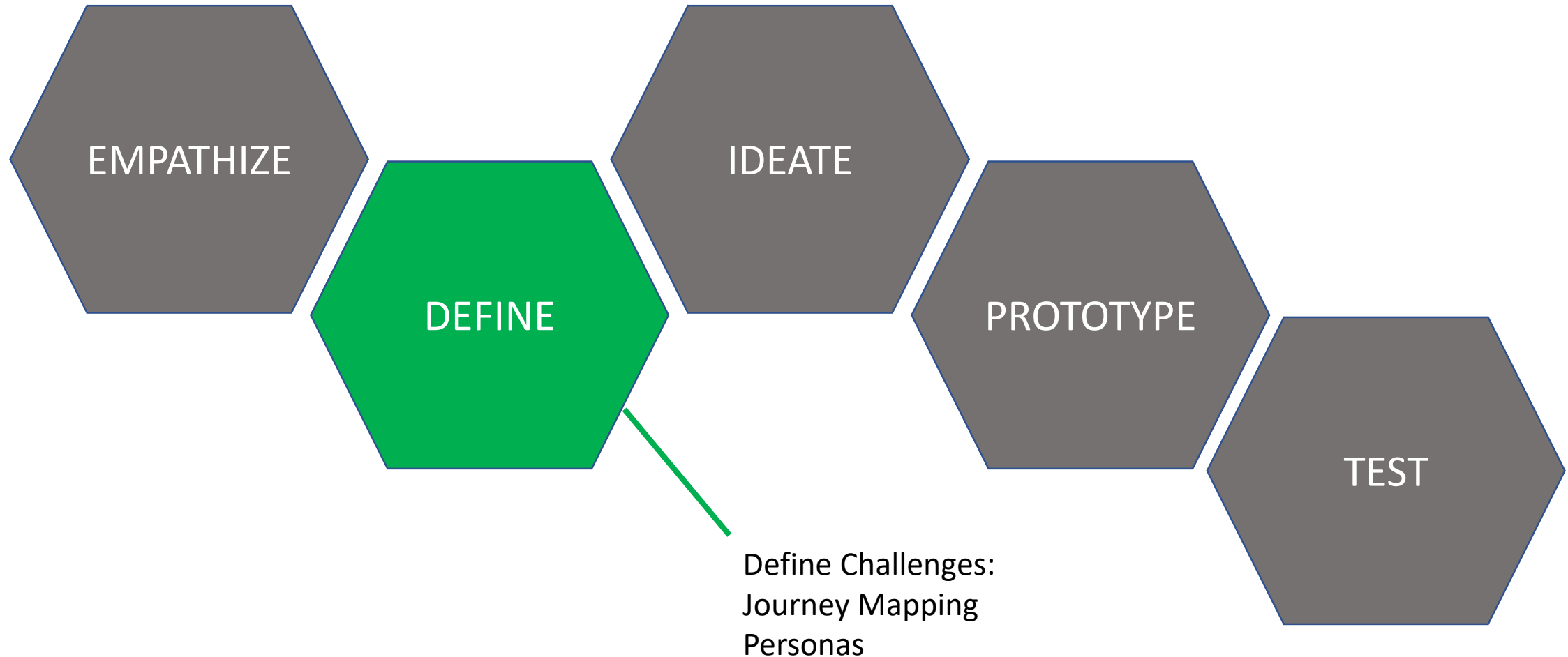
## PKH Beneficiaries in Remote Village in Fena Leisela Sub-District, far from District Capital

We did receive our ATM cards,  
but there are no ATMs in our Sub-District or anywhere near us.

It used to be easier with PT-POS (post office) because they brought the  
payments to our village

Now we have to walk many hours to get to the sub-district to then wait  
in line to get the cash from the Bank (at cash distribution events)

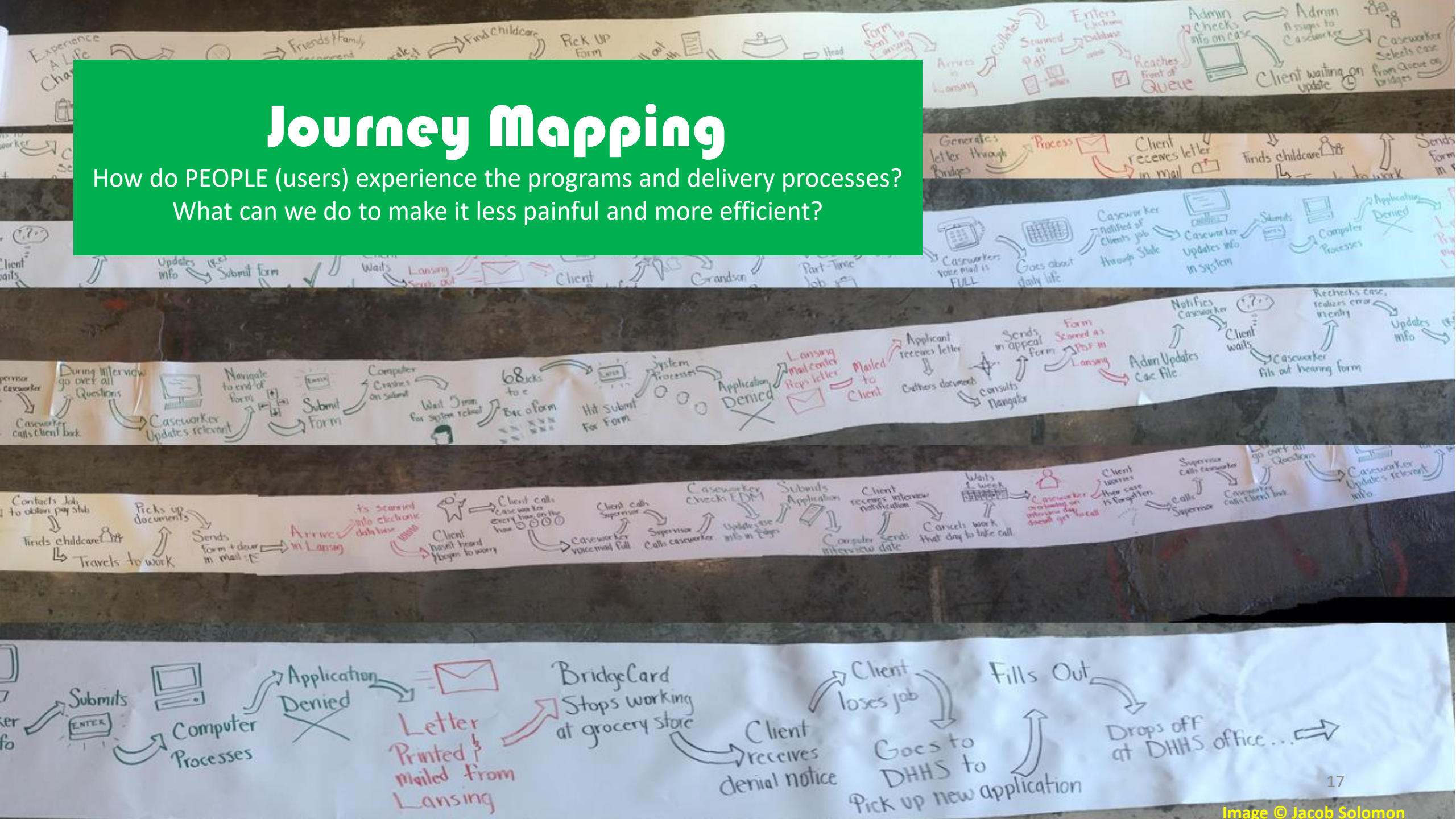
# DEFINE challenges: Understanding how end users experience the program or processes



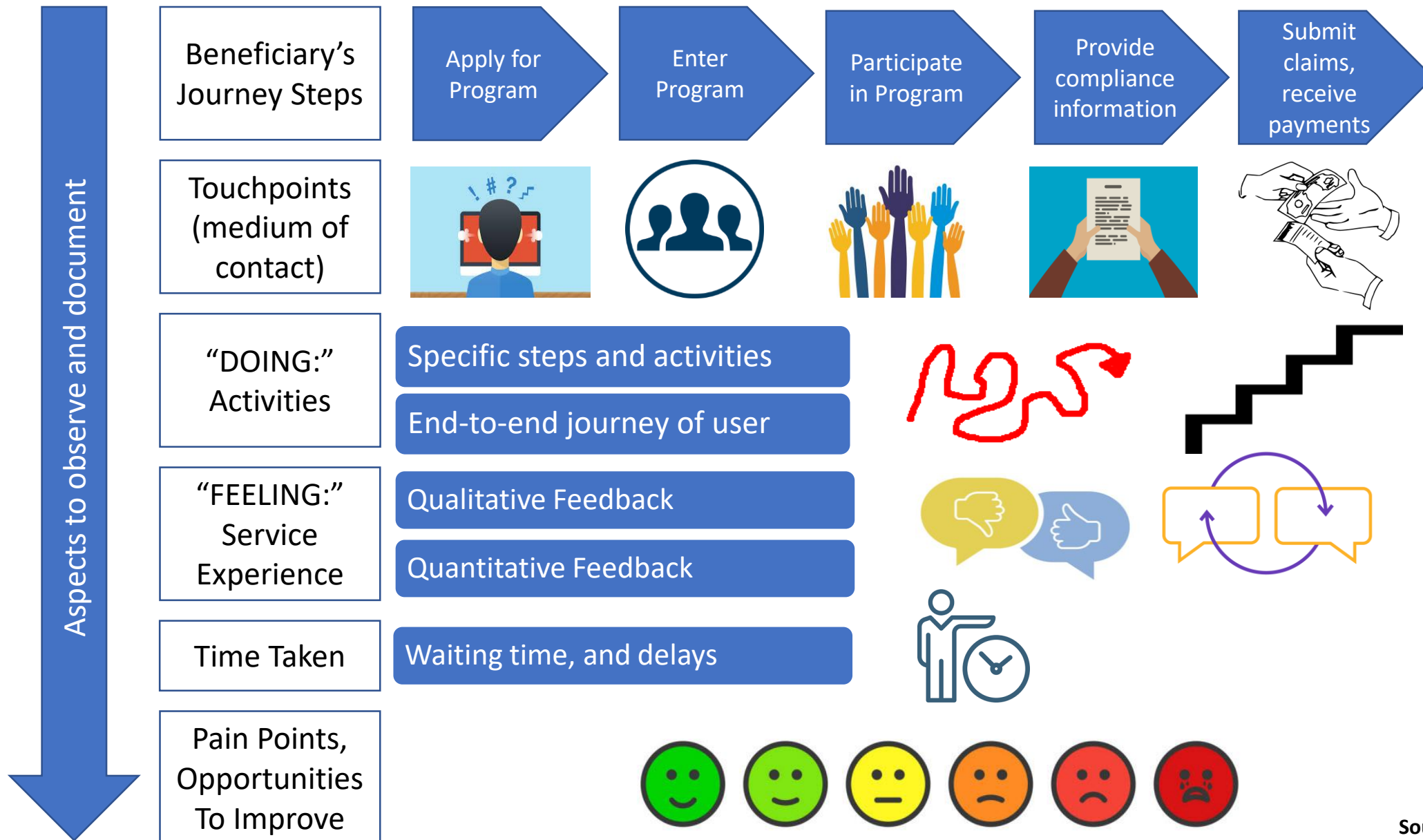


# Journey Mapping

How do PEOPLE (users) experience the programs and delivery processes?  
What can we do to make it less painful and more efficient?



# Journey Mapping Tools: Understand the End-Users' Experiences in the





# Journey Mapping

Example of Wage Subsidies for Firms to Hire More Workers,  
Common intervention in Europe



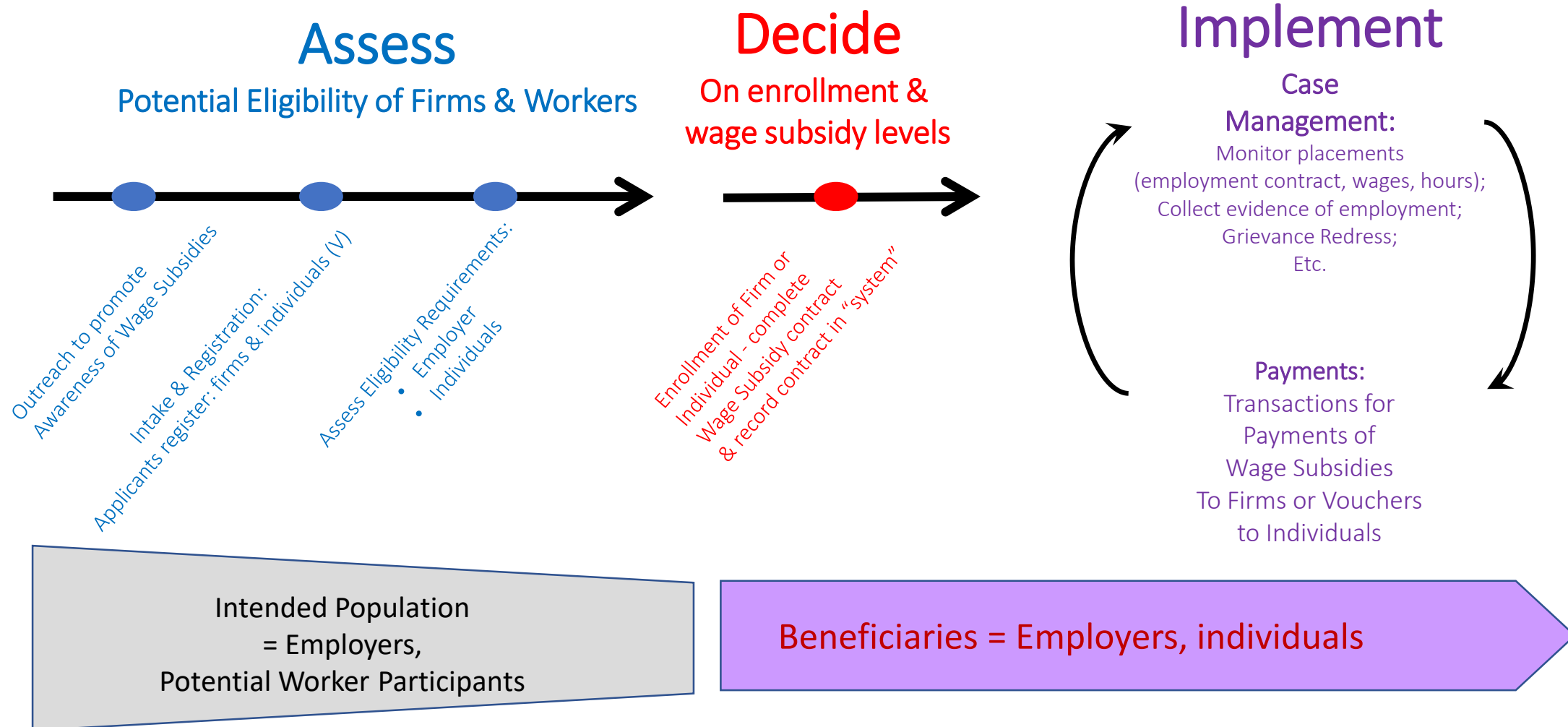
# Many countries in Europe use Wage Subsidies to stimulate employment

- Although lots of wage subsidy programs exist, with millions of € allocated for their budgets, many potential “wage-subsidy vacancies” go unfilled (80% unfilled in recent analysis in European country)
- Why? Various factors could explain these “low take-up rates” by firms for wage-subsidized workers, such as:
  - Firms or workers unaware of these wage subsidy programs
  - Quality or profiles of workers  $\neq$  needs of job vacancies
  - Or... bureaucratic steps make it “not worth the hassle” for firms (low benefit-cost ratios)
- We used Journey Mapping techniques to investigate the “hassle factor” and to define how painful delivery processes could deter firms from taking up these wage subsidy benefits

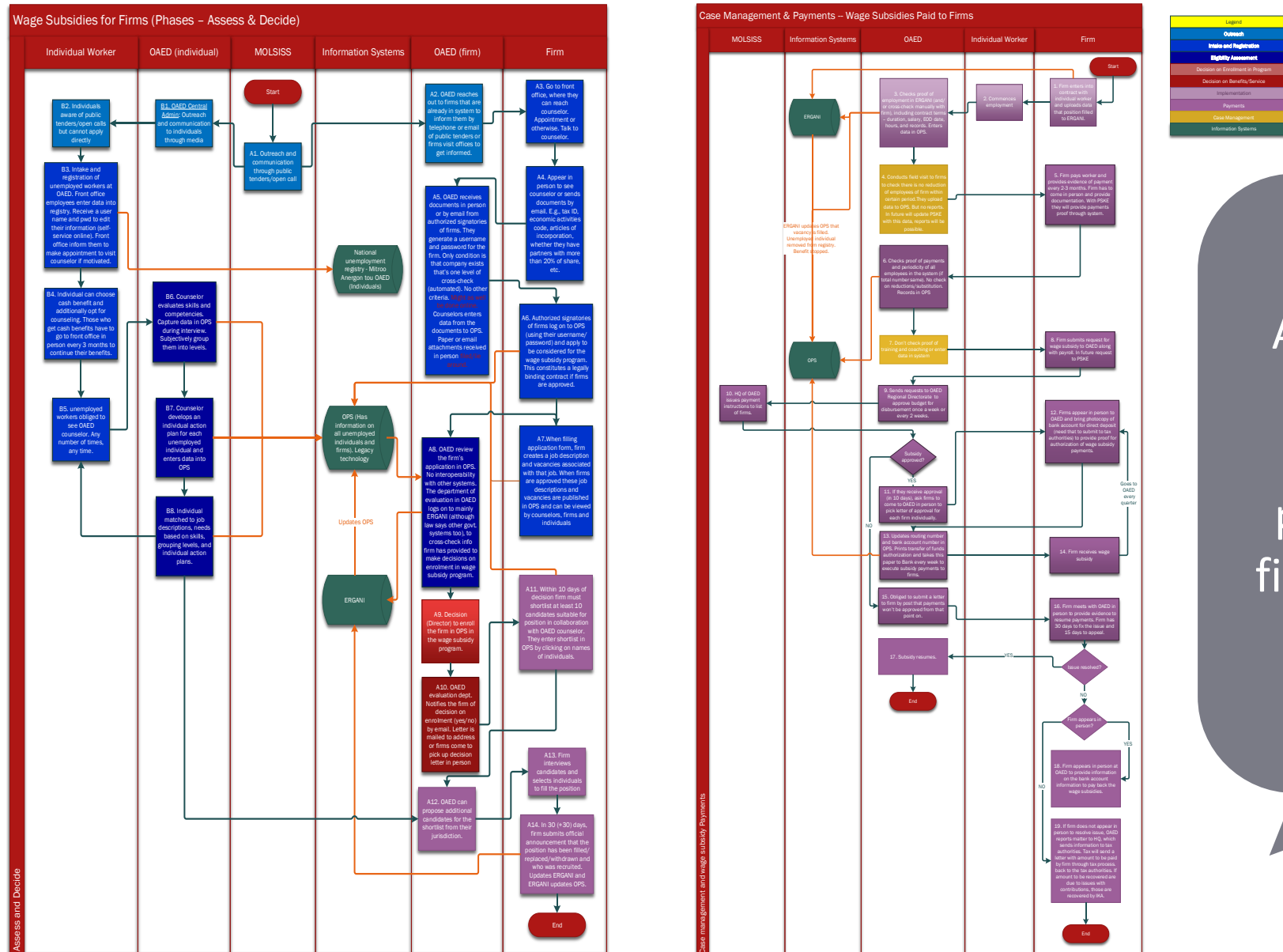


# We started by mapping out the basic processes for implementing Wage Subsidies

The basic process for implementing wage subsidies goes something like this:



But when all the steps were mapped out by agency involved, it looked something like this...



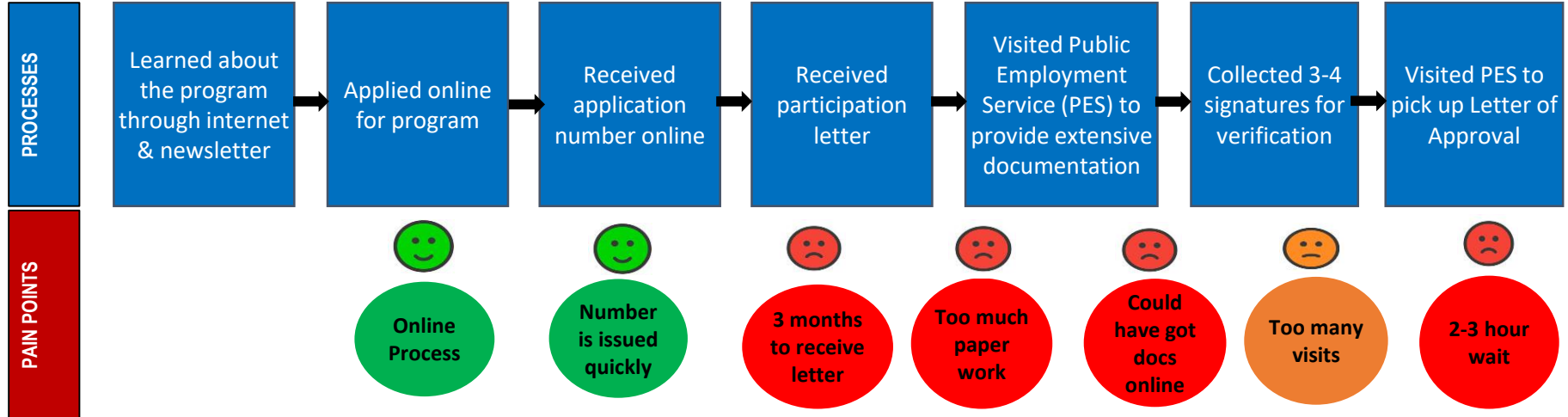
And that is the Administrator View... What about the experience of the potential beneficiary firms? What was their journey in this process?...

# Journey Mapping Example:

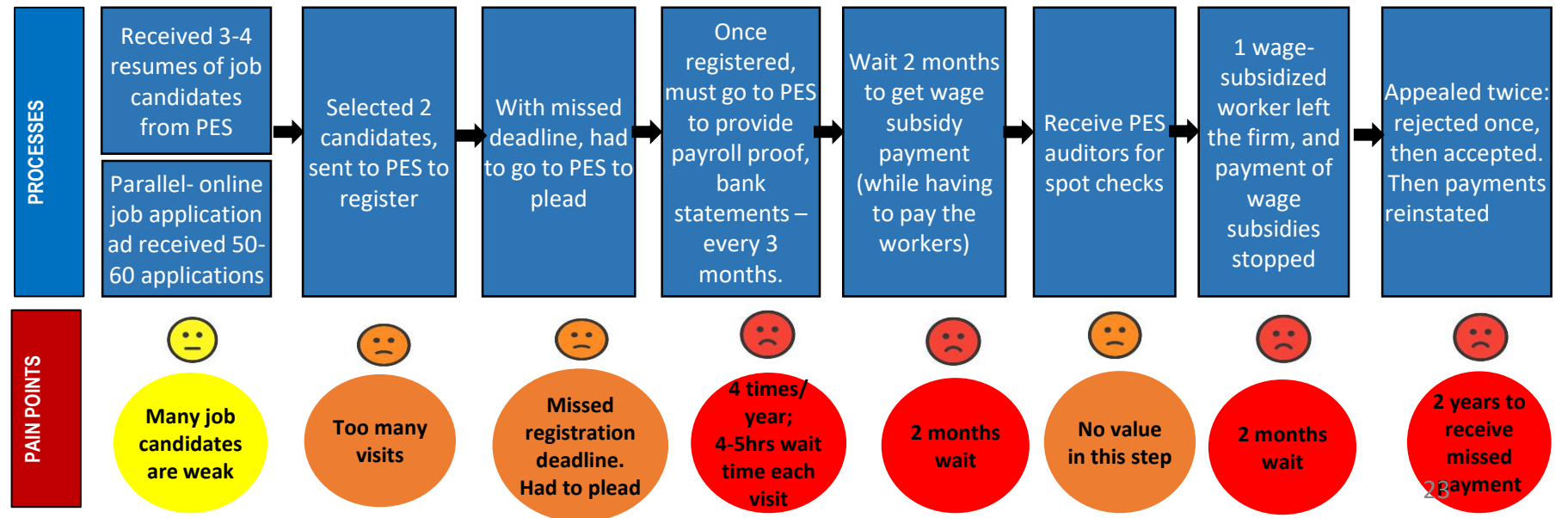
## Wage Subsidies for Firms to Hire More Workers (experience of a travel agency)



The process of outreach, intake and registration



The process of enrolment, implementation, payments and case management





# Personas

*Personas* are archetypes created to represent the different user types within a targeted demographic, attitude & or behavior





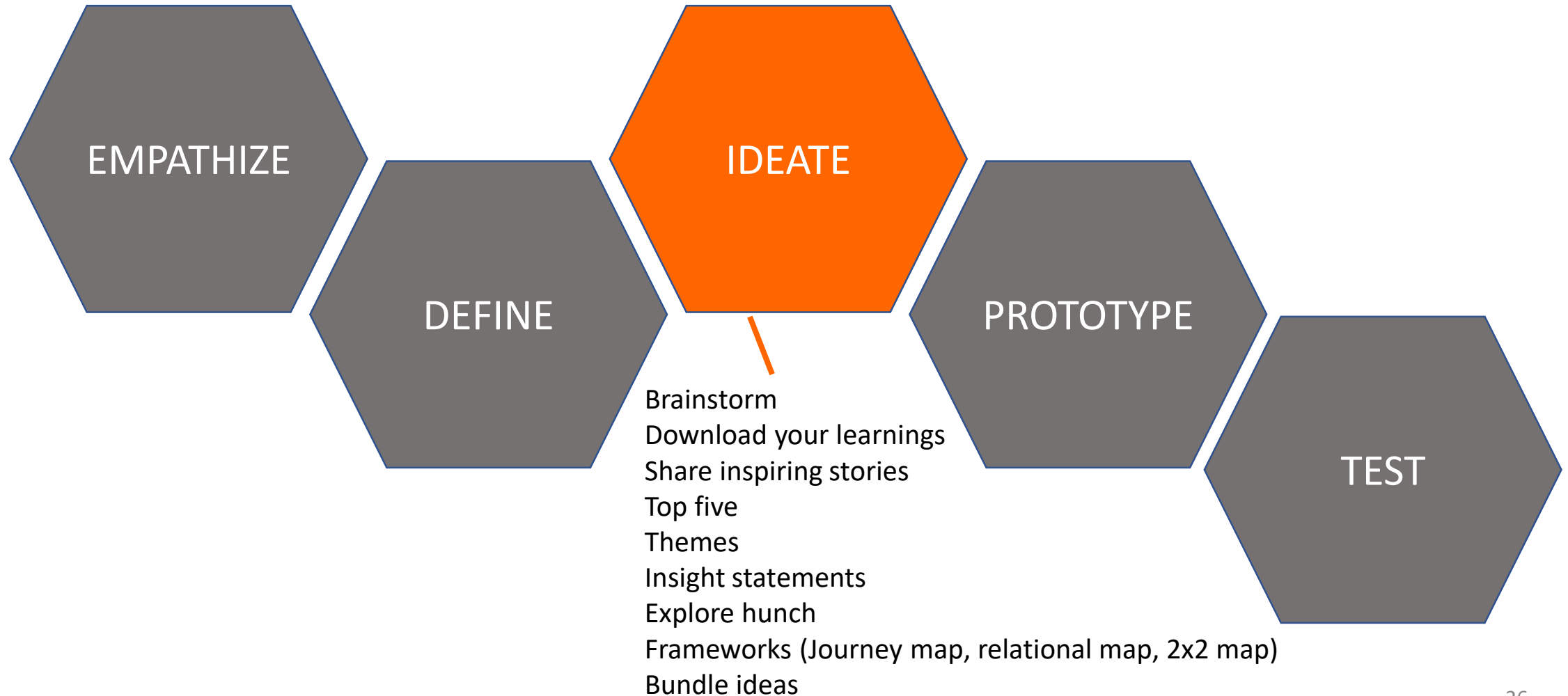
# Advantages of building *personas*

- *Personas* **humanize** the end user
- Distilled from research data collected during field observations and conversations with real people
- A single persona **represents many individuals' aggregated experiences** and **behavioral patterns**, beyond their demographic data, like age, race, or gender.
- *Personas* help program designer focus on **manageable and memorable cast** of character instead of getting lost in details
- *Personas* are particularly helpful for those who may not interact with end users, yet are responsible for generating processes, products, and protocols that directly impact these individuals.



Photo © Tina George, West Africa Unique Identification for Regional Integration and Inclusion

# IDEATE: Developing Solutions Alternatives





# Ideation:

Developing solution alternatives

Indonesia CCT Example: Finding Solutions for Payments in Remote Areas

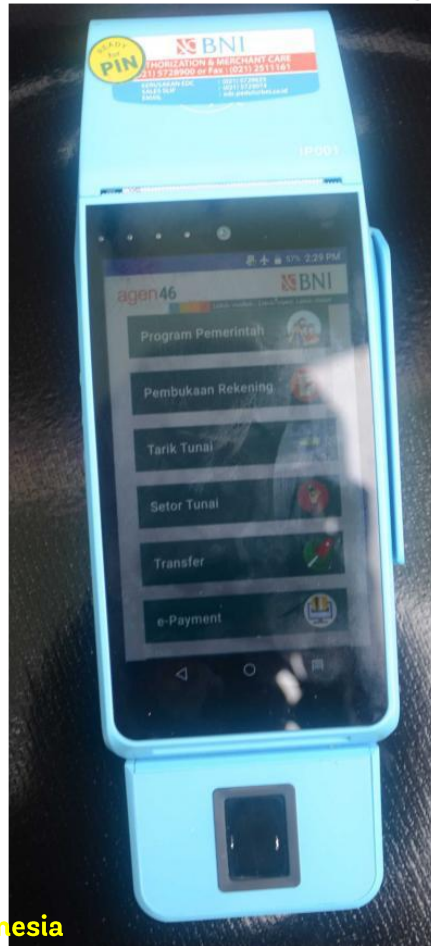




# Ideation:

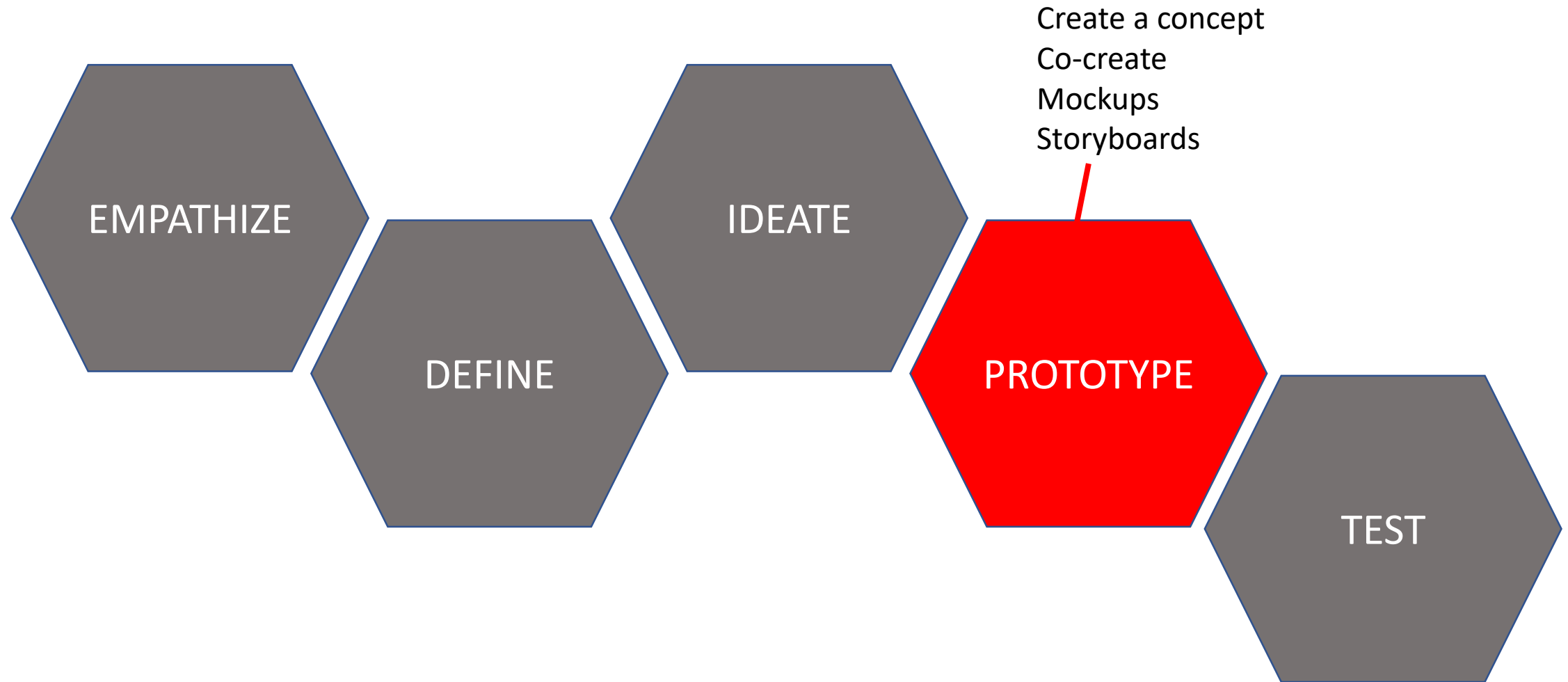
## Some possible solutions and adaptations for diverse areas

Offline EDC portable machines could be one solution... but will it really solve the problem?



- E-payments may work in many parts of the country, but we need to adapt solutions to diverse populations, including those in remote areas.
- One option for Remote Areas - BNI has launched an offline EDC:
  - Portable machine that can be used anywhere – even in remote areas without internet
  - Records beneficiaries data
  - Verify beneficiaries data from benefit card and finger print, so withdrawal doesn't require PIN
- ...But that still doesn't solve the challenge for beneficiaries who would still have to walk many hours to get to sub-district payment points:
  - As such, Ministry is developing "PKH Akses" that modifies some of the parameters in the program to simplify its use in remote areas
  - One of the modifications is to disburse the payments less frequently – such as twice per year instead of quarterly
  - And, they could still consider manual payments delivery to the villages themselves to save beneficiaries the travel/times to get to the sub-district centers
- Need to bring together the actual people affected to "IDEATE" on possible solutions that would really work in remote areas:
  - PKH Beneficiaries
  - PKH Facilitators
  - Payment Service Provider from the local office

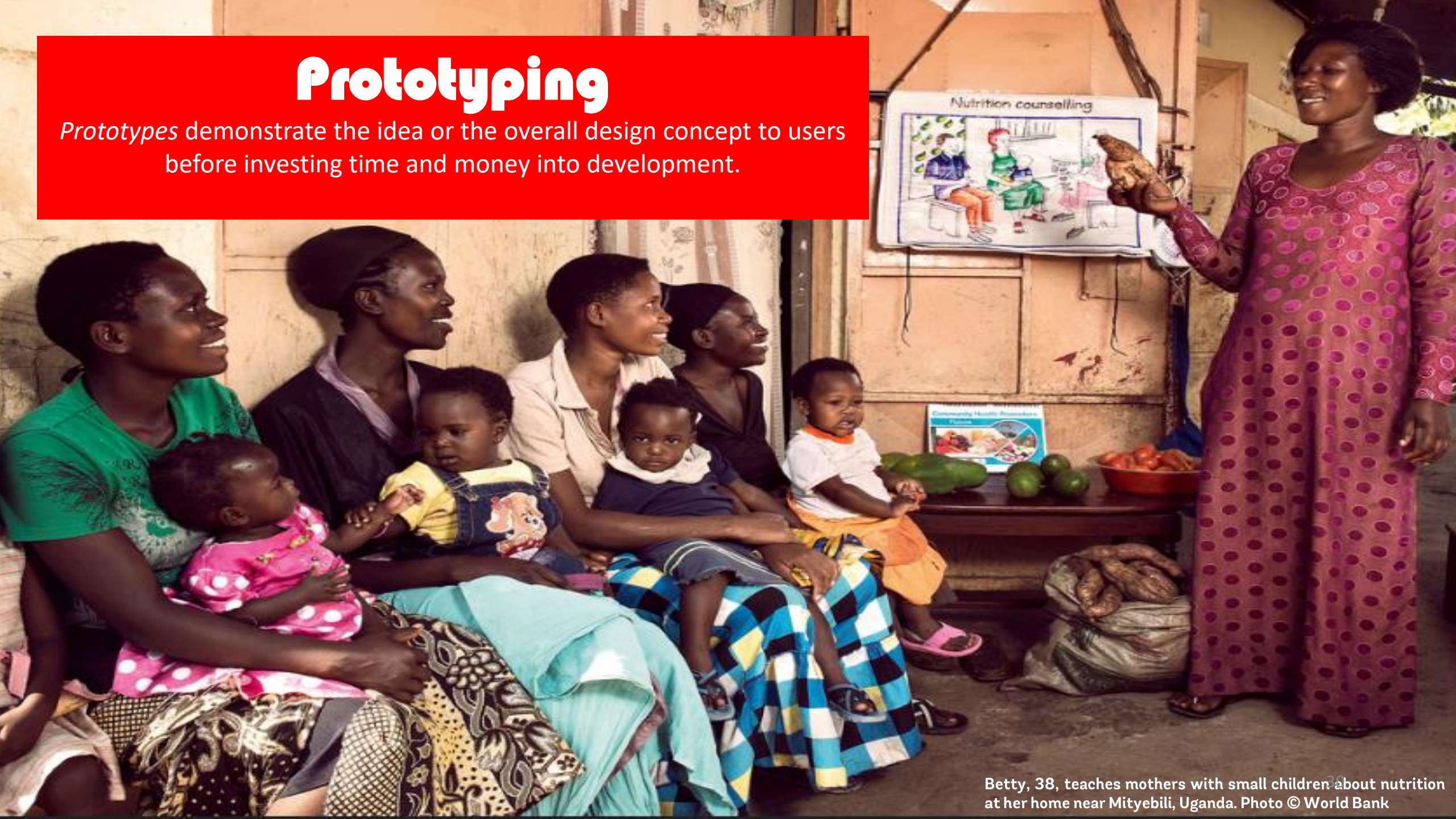
# PROTOTYPING: Modeling a solution...





# Prototyping

*Prototypes demonstrate the idea or the overall design concept to users before investing time and money into development.*



Betty, 38, teaches mothers with small children about nutrition at her home near Mityebili, Uganda. Photo © World Bank



# Nutrition Program to reduce stunting in Madagascar



Photo © World Bank

- According to WHO 160 million children under the age of five are stunted globally
- Madagascar has one of the highest rates of stunting in the world, 50% of children under five are affected.
- Stunting is a marker for poor cognitive development that can impact school and employment outcomes later in life.
- In Madagascar, the annual costs associated with malnutrition are estimated at 7 to 12 percent of GDP.
- Madagascar's leaders have turned to adaptive learning and experimental program design to effectively address stunting; an urgent development priority

# Prototyping Interventions in Madagascar Nutrition Program

- Madagascar's National Nutrition Program has been using HCD for 3 years to design more effective behavior change interventions
- Formative research was an important basis to understand background, key influencers, food habits, and perceptions of good health and nutrition of end-users as a basis for developing ideas for new interventions.
- The “prototyping” phase of HCD has allowed the program to tangibly test, several early concept ideas for new interventions directly with beneficiaries progressively focusing on the ones that show promise.
- Prototyping has allowed for reaching higher level of fidelity before interventions are more rigorously piloted and/or scaled up, potentially saving millions of dollars on implementing interventions that do not work.
- As a result of using HCD, the National Nutrition Office is seeing a shift in mindset from designing for beneficiaries to designing with beneficiaries.

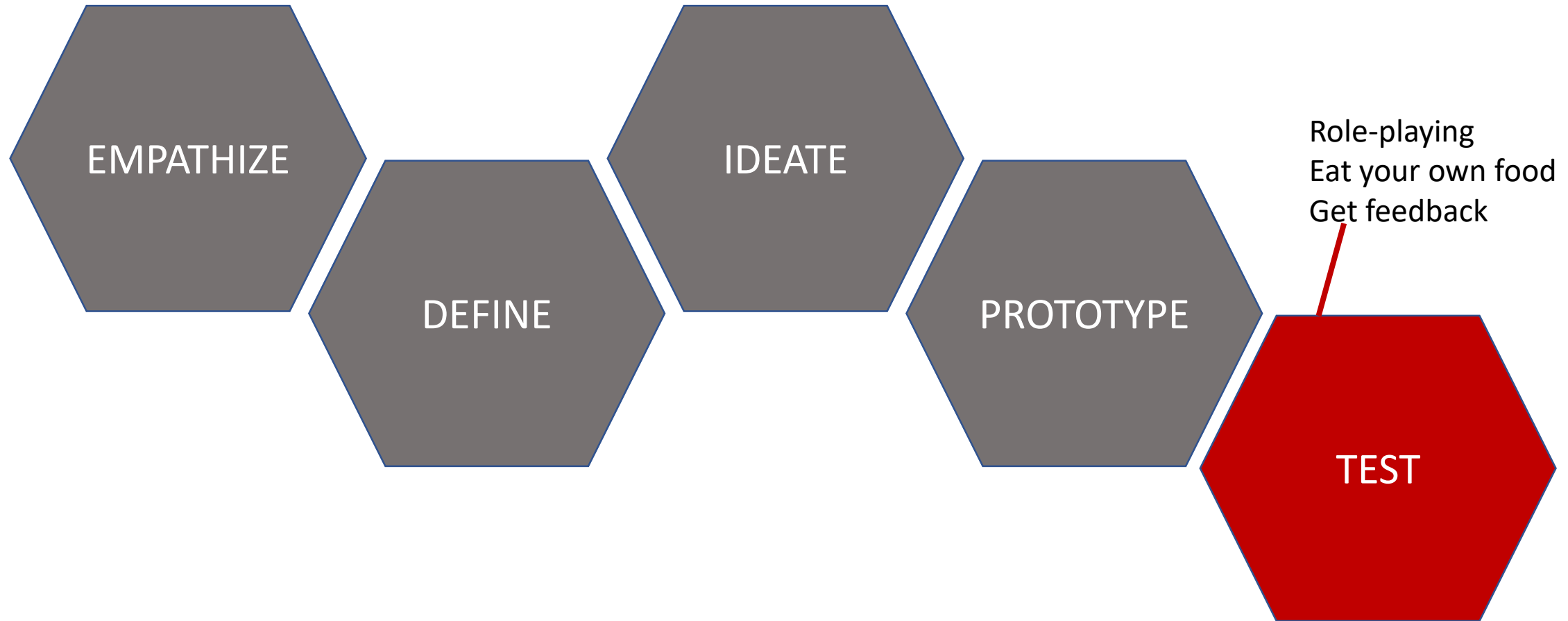


Source: Madagascar: Nutrition & Health Project, The World Bank



# TESTING:

Testing the solution YOURSELF and with END USERS before rolling it out



# Eat your own food...

...try out the solutions before going to the field.

- How often do we “try out” the processes or solutions ourselves?
- Have we ever “applied for benefits” of our own program – just to see how easy or hard it is?
- Have we ever tried the APPs we develop or the technologies we think will “solve the problem?”



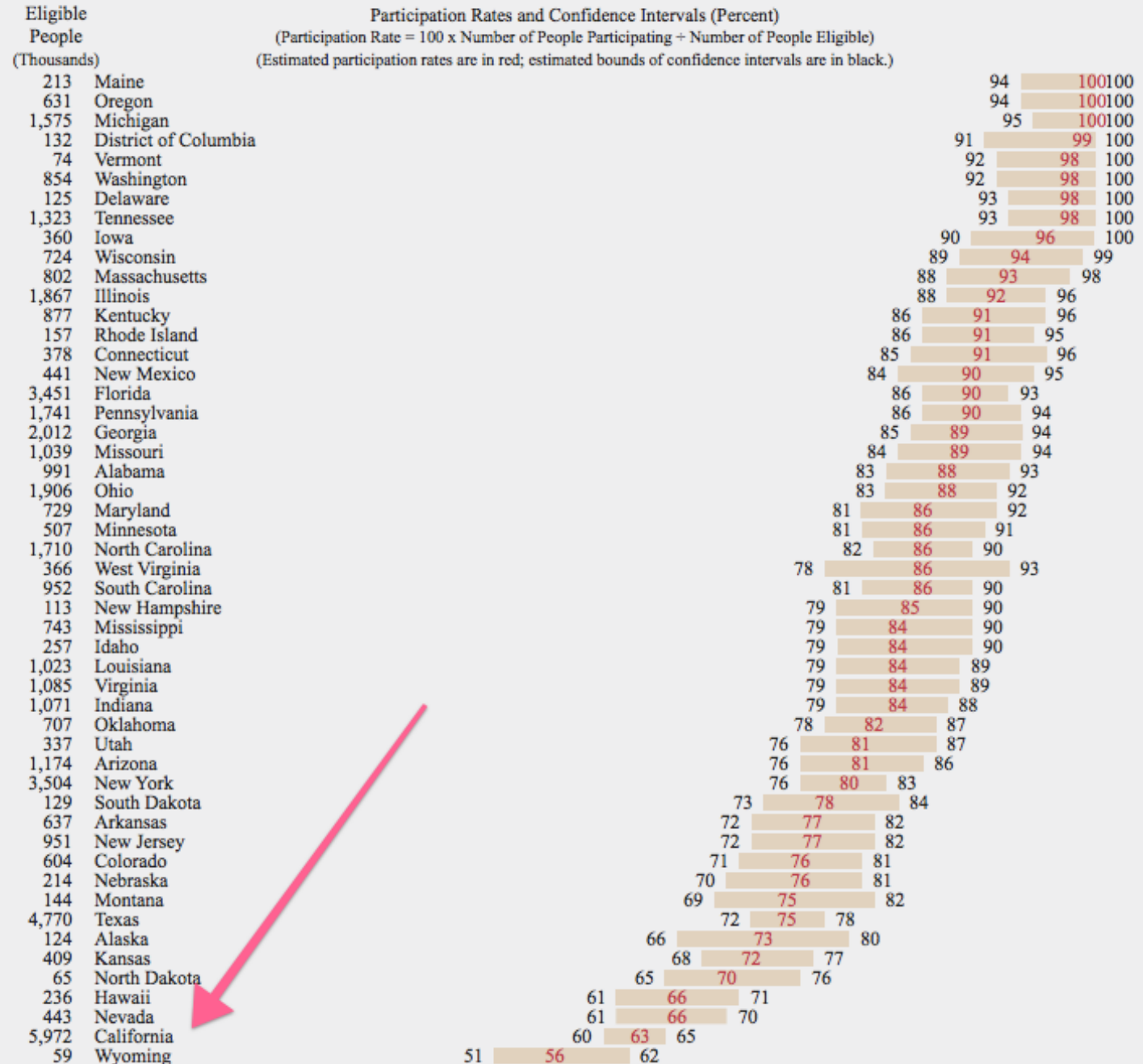
DogFOODING



# Challenge of Low Take-Up Rates for Food Stamps Program in California (USA)

...why?

## How Many Were Eligible in 2012? What Percentage Participated?









Language English Go

[Create A MyBenefits Account](#) | [Sign In](#)

MyBenefits CalWIN

[? FAQs](#)

[Contact Us](#)

[Help](#)

- Open Enrollment begins 10-1-2013 [Read about Affordable Health Insurance](#)



## Welcome,

This website is a fast and easy way for California residents to learn about and apply for medical, food, and cash assistance programs. MyBenefits CalWIN also provides ongoing access to secure and private benefit information. Select a topic below to get started or sign in to your account.

Community Based Organization, [get started here](#).

Sign in to your MyBenefits CalWIN Account

Username

[Sign In](#)

[Forgot Username?](#) | [Create New Account](#)

[View MyBenefits](#)

[See if I Am Eligible](#)

[Apply for Benefits](#)

[Report My Changes Or Renew Benefits](#)

### MyBenefits CalWIN allows you to:

- ☒ Check your benefit status and amount
- ☒ See if you are eligible for other assistance programs
- ☒ Apply for benefits or Continue an application
- ☒ Submit your reports or renew your benefits online

[View MyBenefits](#)

Hard to apply

# Simple, mobile application

Apply now →

This website is a free, non-profit service to help California residents apply for CalFresh (food stamps).

[Learn more about this website](#)

cal

-92 Verizon 4:04 PM 28%

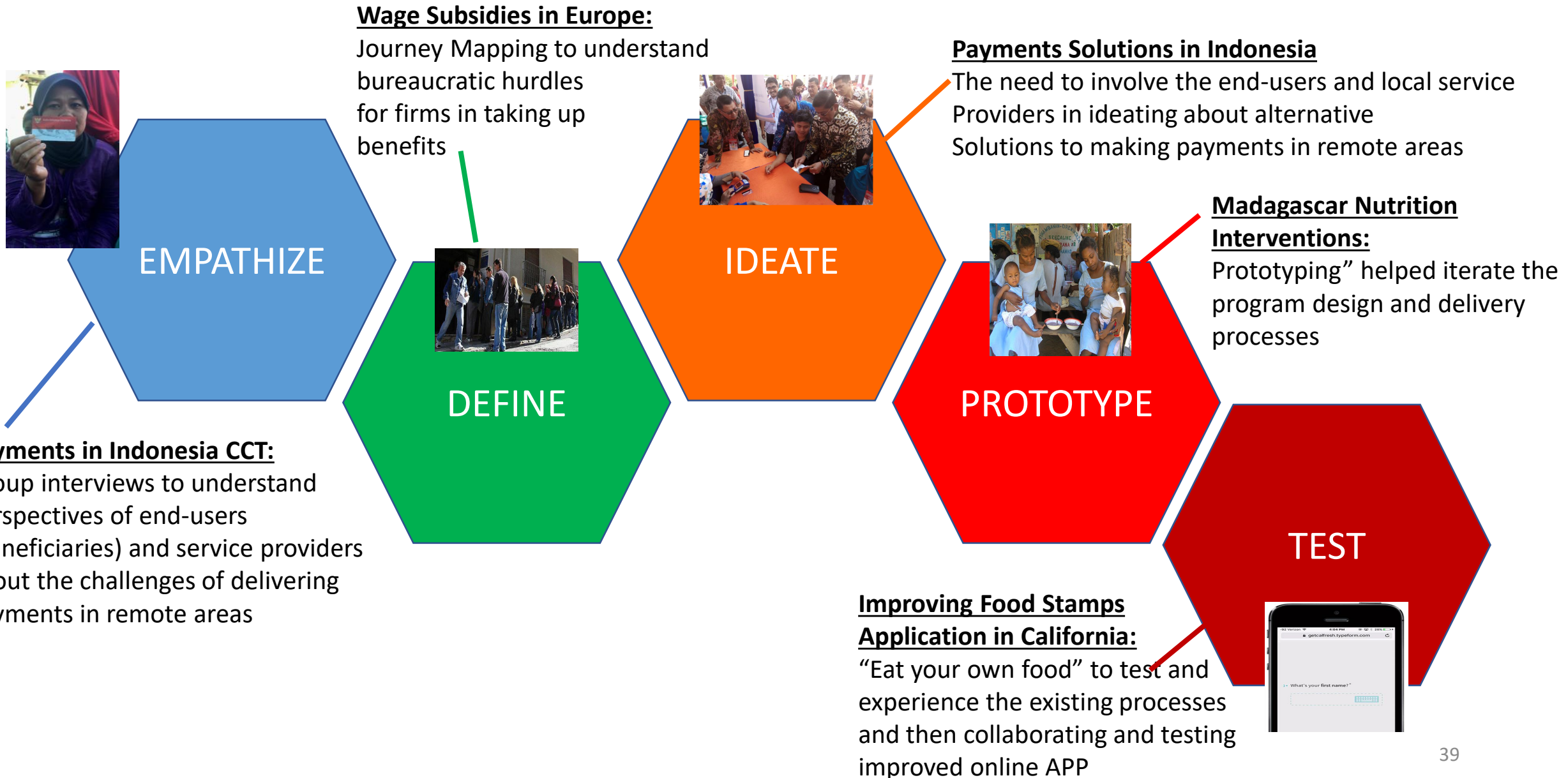
getcalfresh.typeform.com

1- What's your first name?\*

Strength indicator: 4 bars, 100%



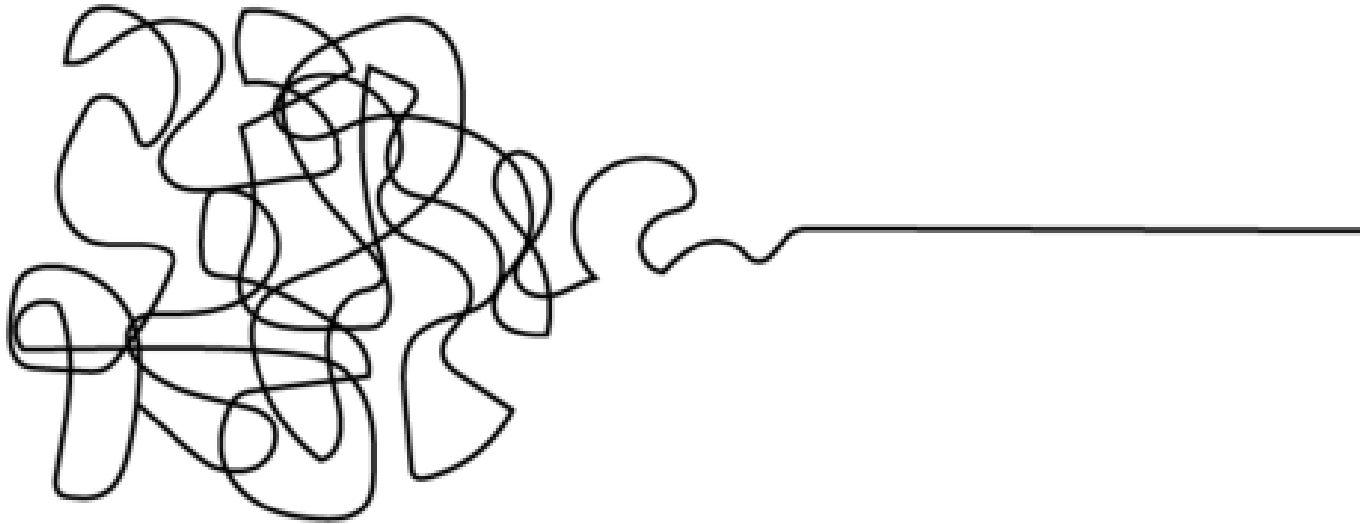
# Many Examples of Usefulness of Human-Centered Design in SPJ





UNCERTAINTY

FOCUS



DISCOVERY

DESIGN

DELIVERY

Designing solutions to deliver  
social protection systems...

- We move **rapidly from a problem statement to solution.**
- There is **no right answer**
- **Many stakeholders** and factors affect outcomes
- Having **deep understanding of people** while seeing the bigger picture
- Spend considerable time **understanding the problem** and generating alternatives
- Gaining **clarity and conviction** despite incomplete information
- Discovering and **choosing interventions that have impact**

Human-centered design is  
a powerful **methodology**  
**and mindset** to employ in  
delivering Social  
Protection programs

Thank you!



© World Bank

## The “First Mile” of Delivering SPJ: Human-Centered Design