



**PARTNERS  
FOR WATER**  
CO-CREATING IMPACT



**META  
META**



[www.jacana.help](http://www.jacana.help)

# Affordable portable solar pumps

# Goal



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Creating a sustainable and scalable distribution model of affordable portable solar pumps for small-scale farmers.

- Each partner must benefit
- Repairable
  - Spare parts
  - Skilled retailers making a profit

# Initial pump design



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# Current Design



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## Components:

- Two solar panels
- Pump + cables
- Panel Stand
- Pre filter
- Hose

# Who are involved?

**Warehouse: import/distribute:**



**NGOs (like DAPP):**



**Retailer / SME:**



**Farmers:**



**Jacana / MetaMeta:**



# The Innovations

## Optimizing pump design

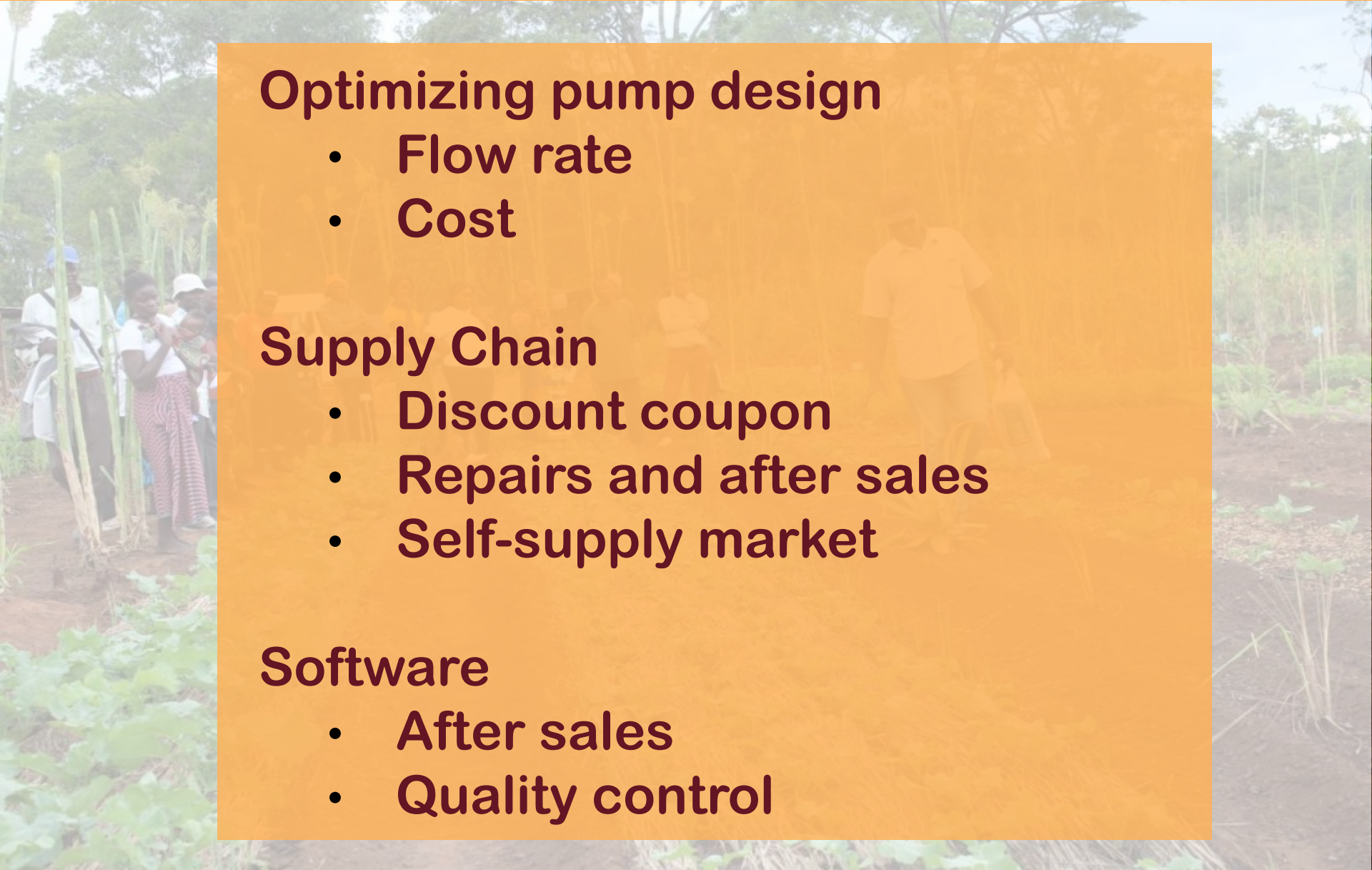
- Flow rate
- Cost

## Supply Chain

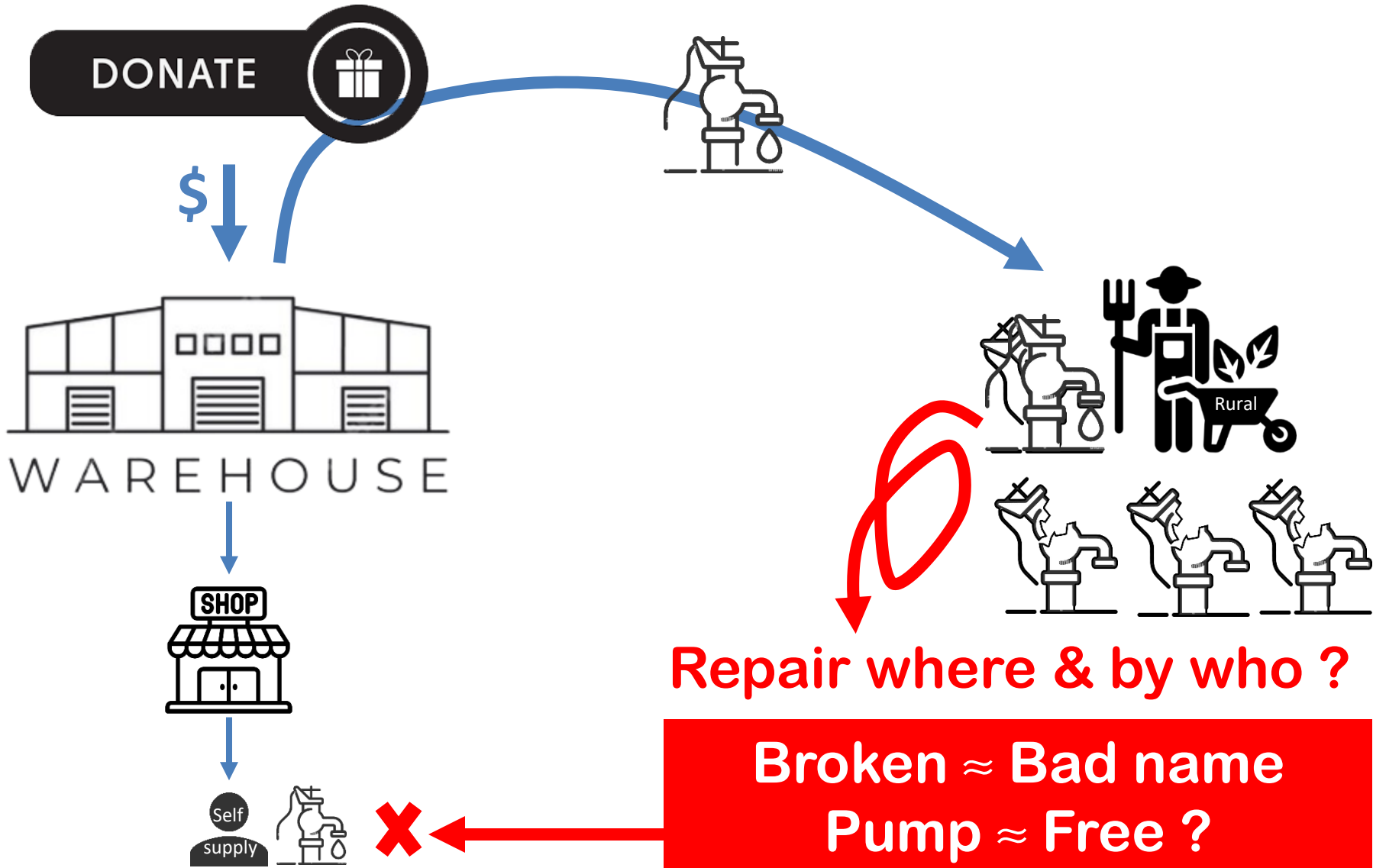
- Discount coupon
- Repairs and after sales
- Self-supply market

## Software

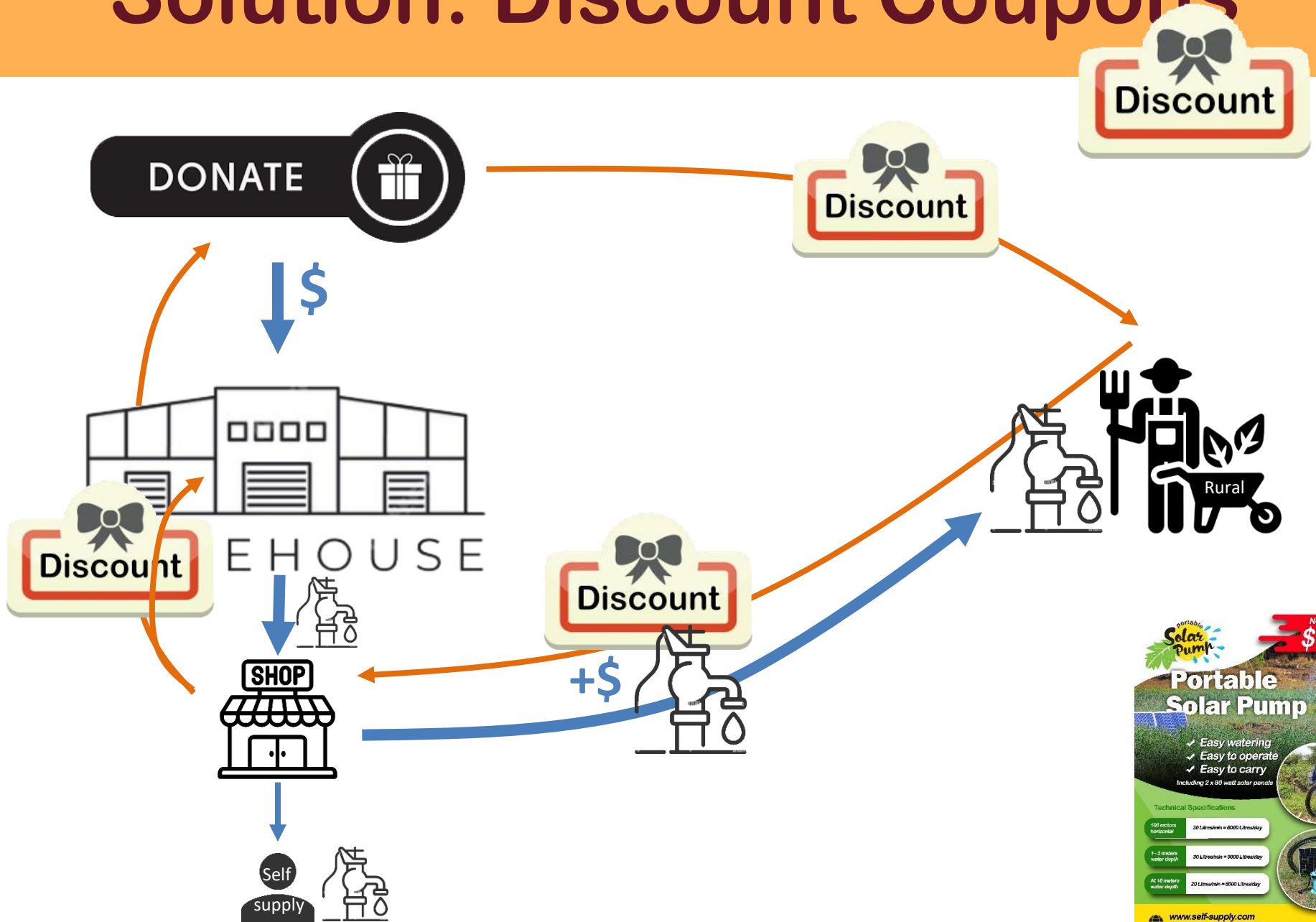
- After sales
- Quality control



# Donations distort the markets!



# Solution: Discount Coupons



**Now Only: \$160**

**Portable Solar Pump**

- ✓ Easy watering
- ✓ Easy to operate
- ✓ Easy to carry

Including 2 x 80 watt solar panels

**Technical Specifications**

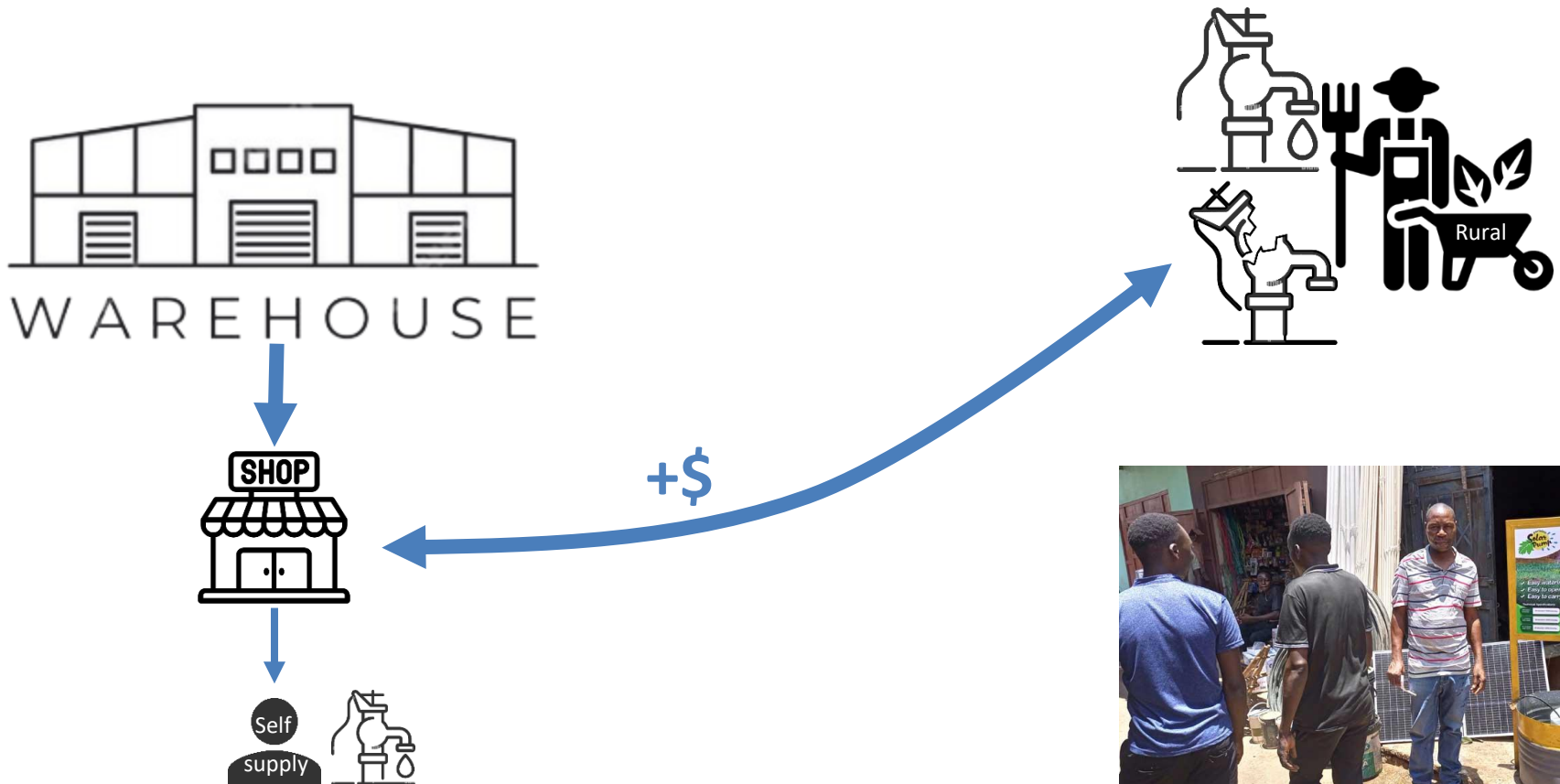
100 meters flow rate	20 Litres/min = 6000 Litres/day
1-3 meters water depth	30 Litres/min = 9000 Litres/day
At 10 meters water depth	20 Litres/min = 6000 Litres/day

[www.self-supply.com](http://www.self-supply.com)  
[www.portablesolarpumps.com](http://www.portablesolarpumps.com)

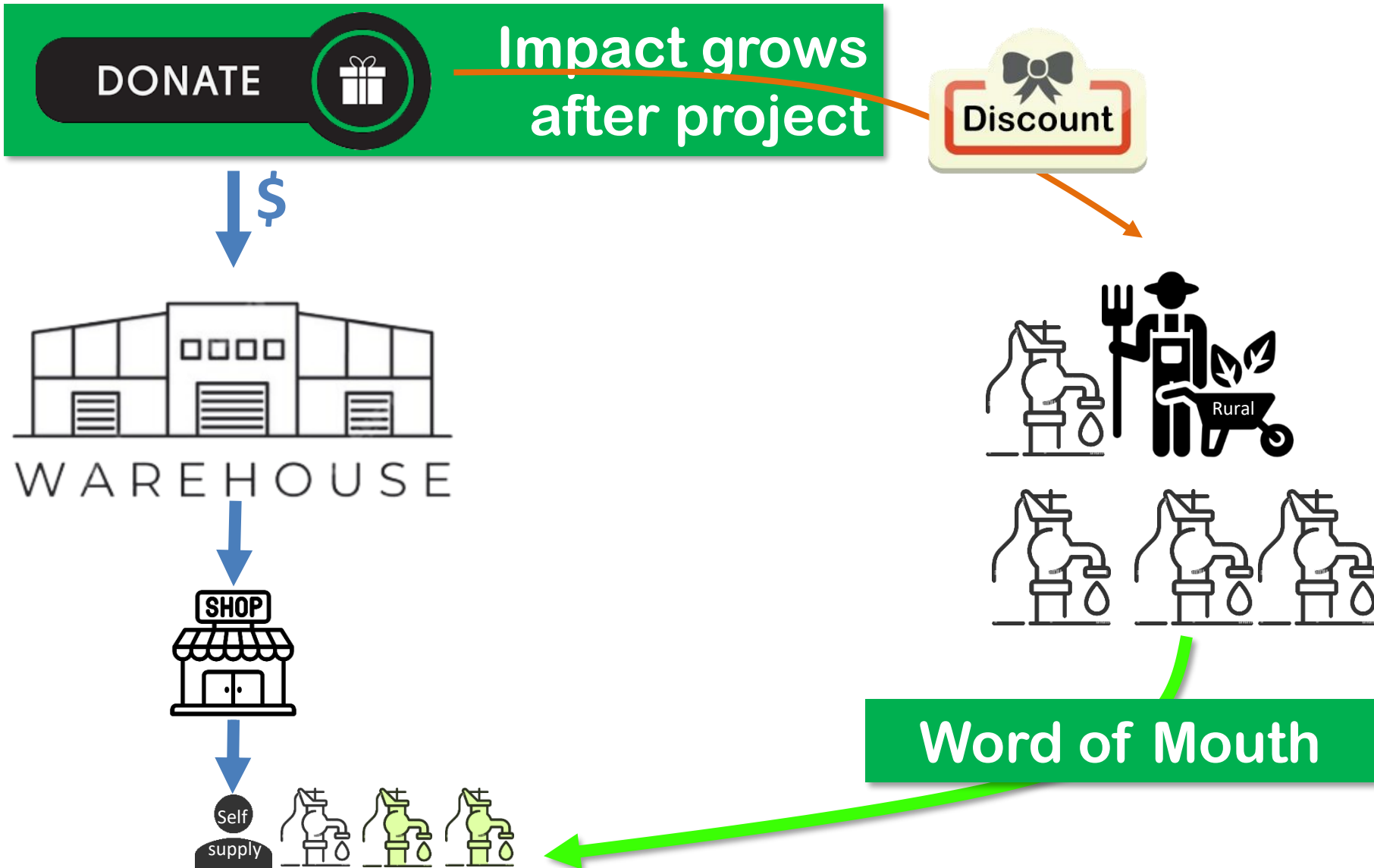


# New: Supply Chain

## New pumps and Repairs



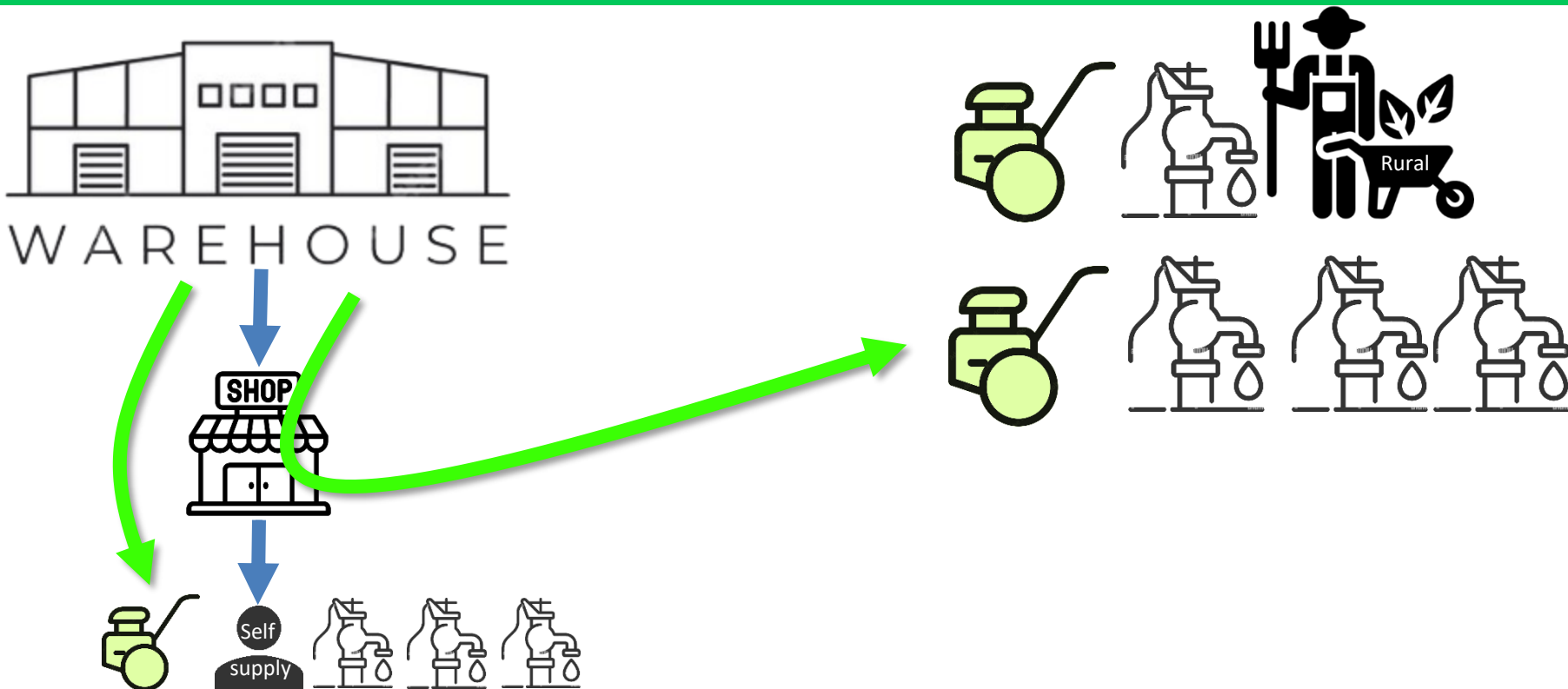
# New: Increase Self-supply



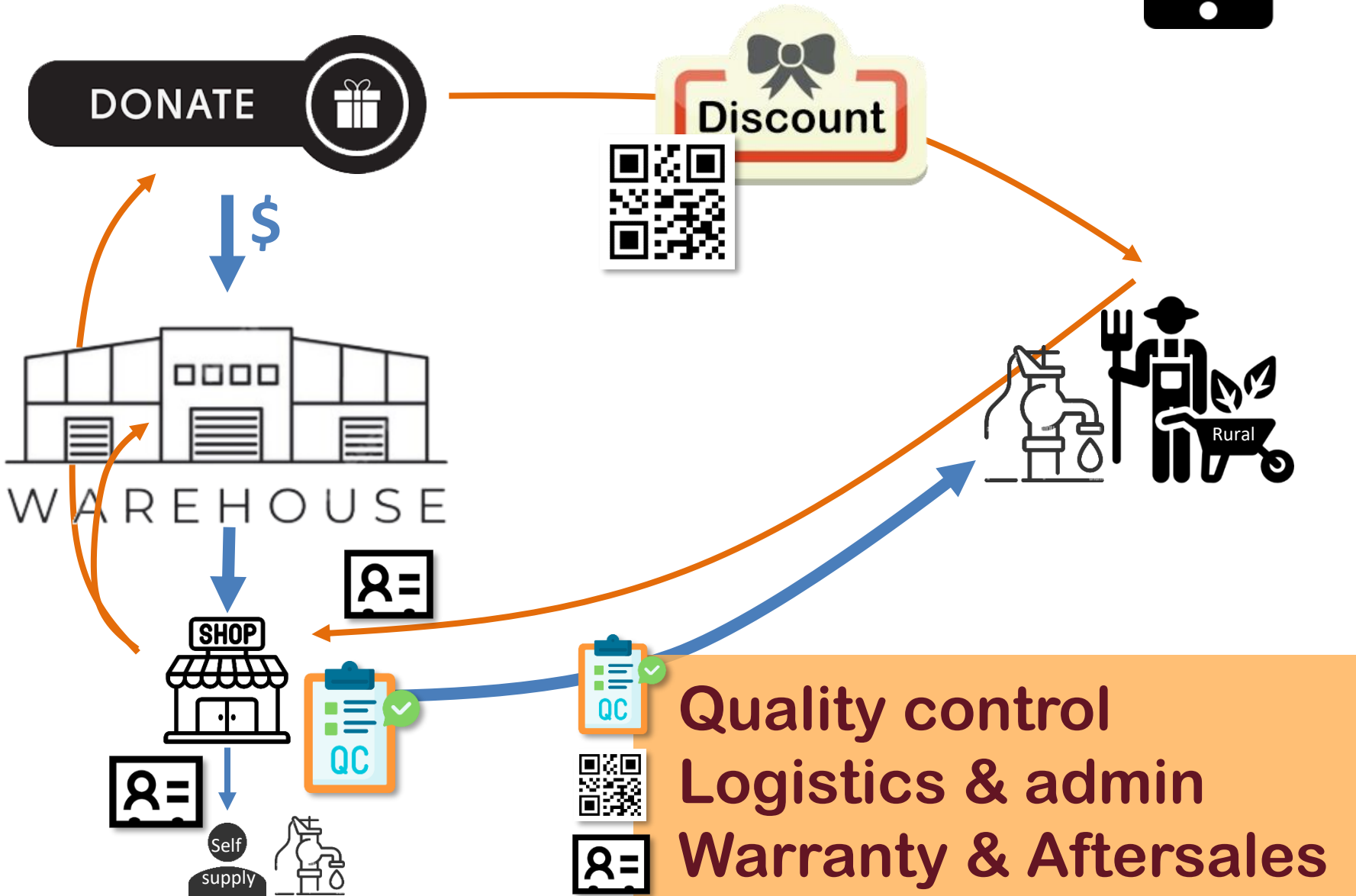
# New: After sales

Keeping customers  
is cheaper than finding new customers

We have contact details and know the users  
So sent SMS from time to time



# New: Software



# Project Summary



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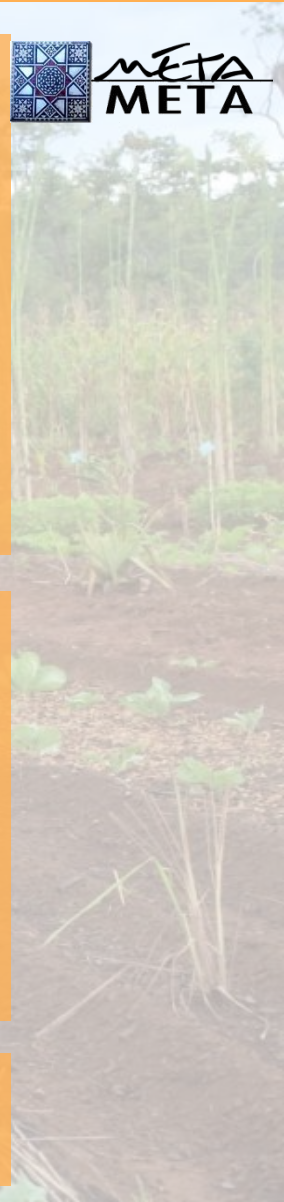
## Year 1:

- Re-design Construction kit
- Design Software
- Test in Eastern (70 pumps)
- Fine tune

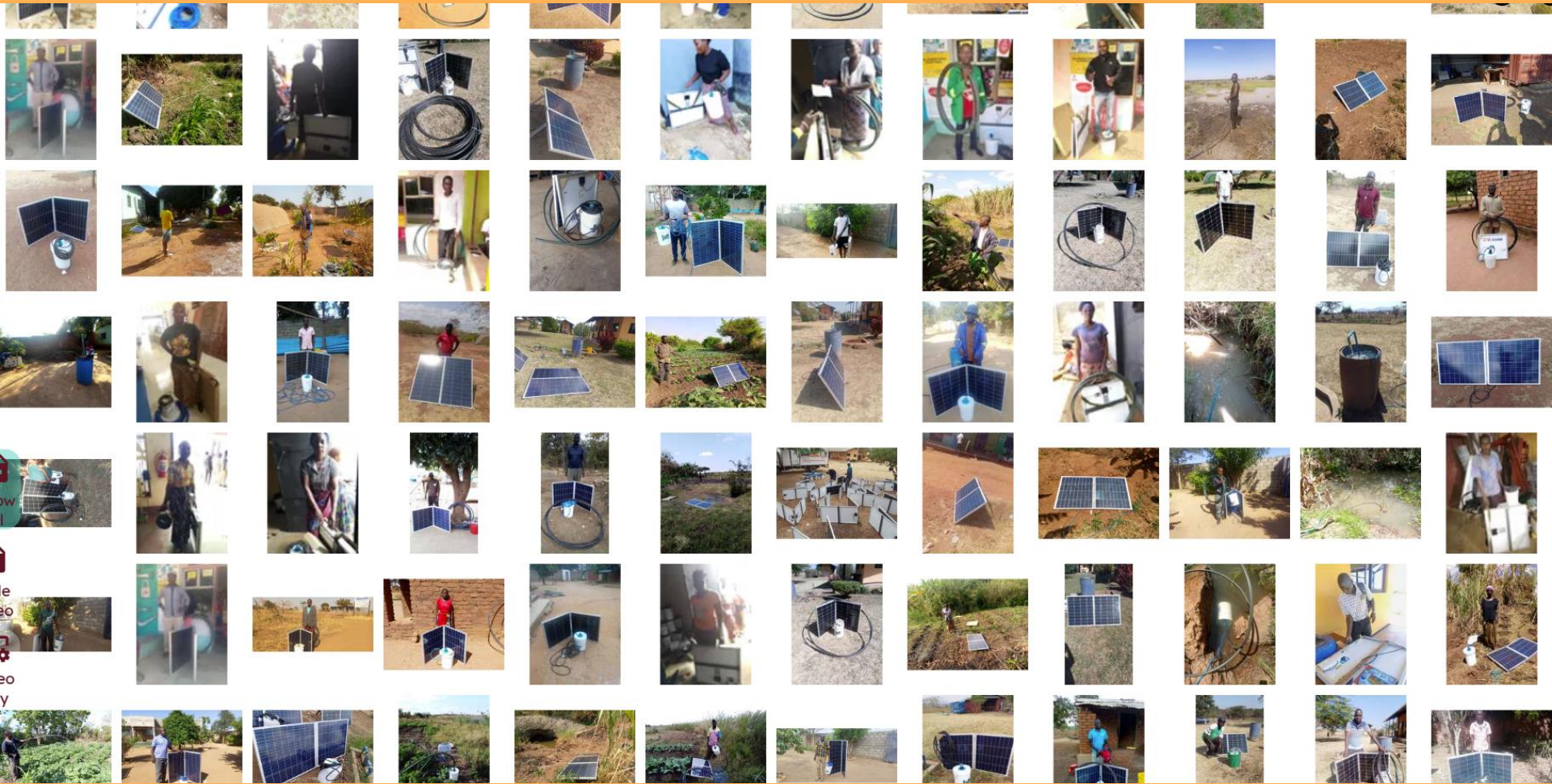
## Year 2:

- Production in factory
- Test outside Eastern (300 pumps)
- Fine tune

Scale up



# Using the Pump



<https://self-supply.com/>