

# Health Prevention Program

Among Middle-aged Asian in San Francisco

## Define the Problem



- Many asian immigrants work as manual labors for construction companies or restaurants in San Francisco.
- They work over time, and have low awareness of healthy problems such as pain or ache in bones, joints and muscles.

“An ounce of prevention is worth a pound of cure.”  
— Benjamin Franklin

### Interview



- Certainly feel tired after work, because of long time standing, rushing around to help customers, and holding heavy plates.
- Know the importance of having medical insurance.
- If there is educational video about the right gesture to do things, the problem will be how to make people accept it.
- Have problem in shoulder, elbow and wrist, sometimes feel pain, will use bandage if needed.

### Personas and Daily Scenarios

#### 1 Persona Sample



Vision: ●●  
Hearing: ●●●  
Mobility: ●●●●  
Grasp: ●●●●●  
Balance: ●●●●●  
Strength: ●●●●●  
Memory: ●●●●●

- Jason
- 55 years old
- Jason immigrated to America from China 30 years ago. He only graduated from middle school, and learned cooking from his uncle. Now he owns a restaurant in Chinatown. He is not only the owner but also the main chef. He works very hard. He seldom cares about his health, and only goes to the doctor when problem occurs. He feels pain in arms sometime, but always ignores it and keeps working.



#### 2 Daily Scenarios 8 Hour Activity Schedule and Most Challenging Activities

Activity	Duration	Frequency	Intensity	Notes
Working in the kitchen	8 hours	Daily	High	Includes lifting heavy pots, carrying heavy dishes, and standing for long periods.
Walking to the store	10 minutes	Weekly	Medium	Carrying heavy bags of ingredients.
Walking to the doctor	15 minutes	Monthly	Low	Feeling pain in arms, but always ignores it.
Walking to the restaurant	10 minutes	Daily	Medium	Carrying heavy pots and dishes.
Walking to the bank	10 minutes	Weekly	Medium	Carrying heavy bags of money.
Walking to the gym	10 minutes	Weekly	Medium	Feeling pain in arms, but always ignores it.
Walking to the school	10 minutes	Weekly	Medium	Feeling pain in arms, but always ignores it.
Walking to the hospital	10 minutes	Monthly	Low	Feeling pain in arms, but always ignores it.
Walking to the police station	10 minutes	Monthly	Low	Feeling pain in arms, but always ignores it.
Walking to the fire station	10 minutes	Monthly	Low	Feeling pain in arms, but always ignores it.

- Holding heavy pots all the time in busy hours.
- Carry heavy dishes.
- Have to walk fast even run around when there are many customers.
- Have to operate quickly in busy hours.
- Don't have time to rest when feels tired.
- Don't have the awareness of self-protection.

## Problem Statement

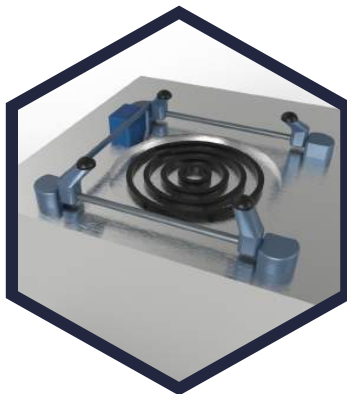


- Chefs working in Chinese restaurants are easy to have occupational diseases in arms, because they have to lift heavy pots all the time when they are cooking fried dishes. It's a huge stress in arm, and when they are busy, they have no time to rest. They also lack the awareness of prevention.



“When you seek out field observations, remember: The more emotional breadth you gather, the better.”  
— The Ten Faces of Innovation

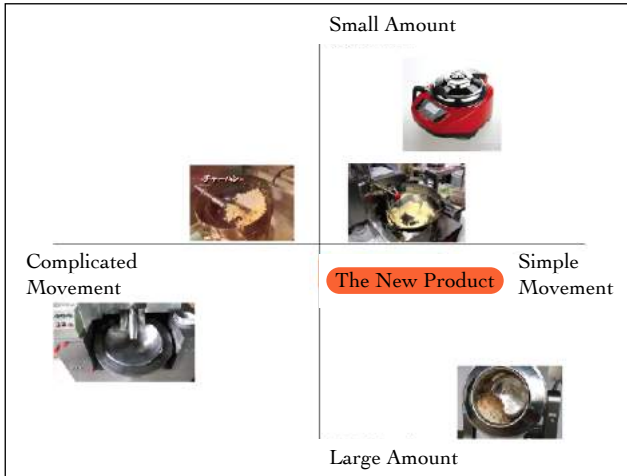
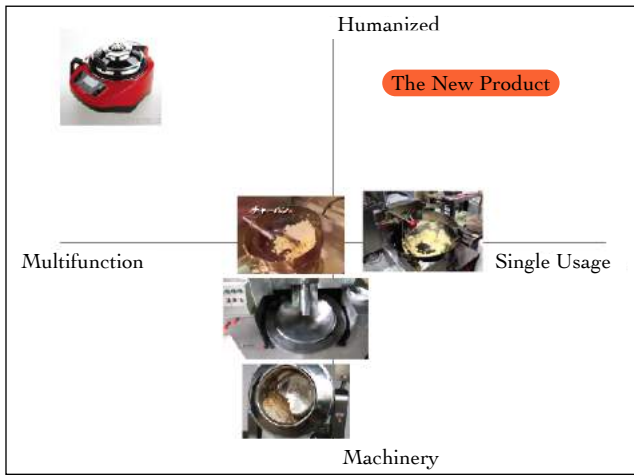
## Solution Statement



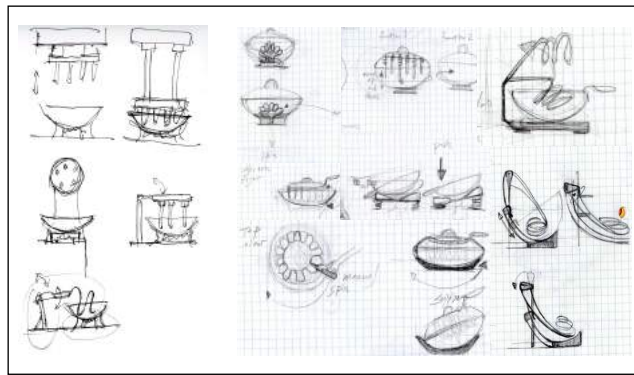
- A labor saving device, that used in the kitchen. It will be simple, easy to use and single functional, which helps to save the labor from most intense step of cooking. And it will go with an advertising strategy which gives people the idea of “An ounce of prevention is worth a pound of cure.”

### Design Development

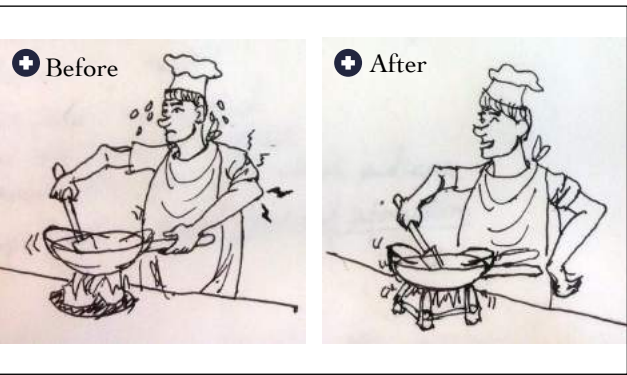
#### 1 Mapping Matrix



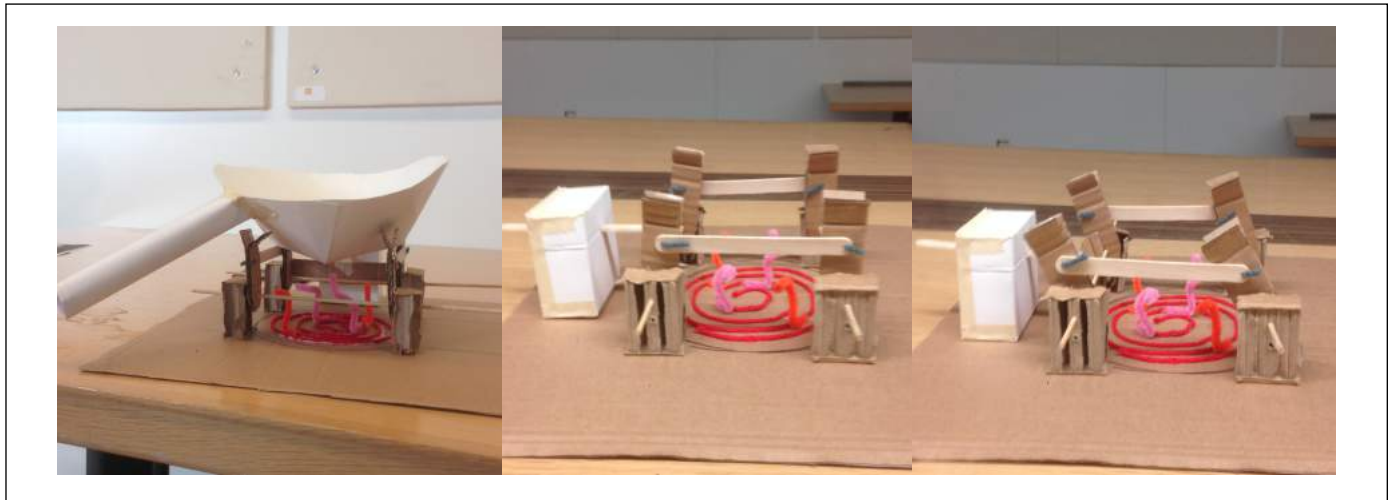
#### 2 Concept Sketching



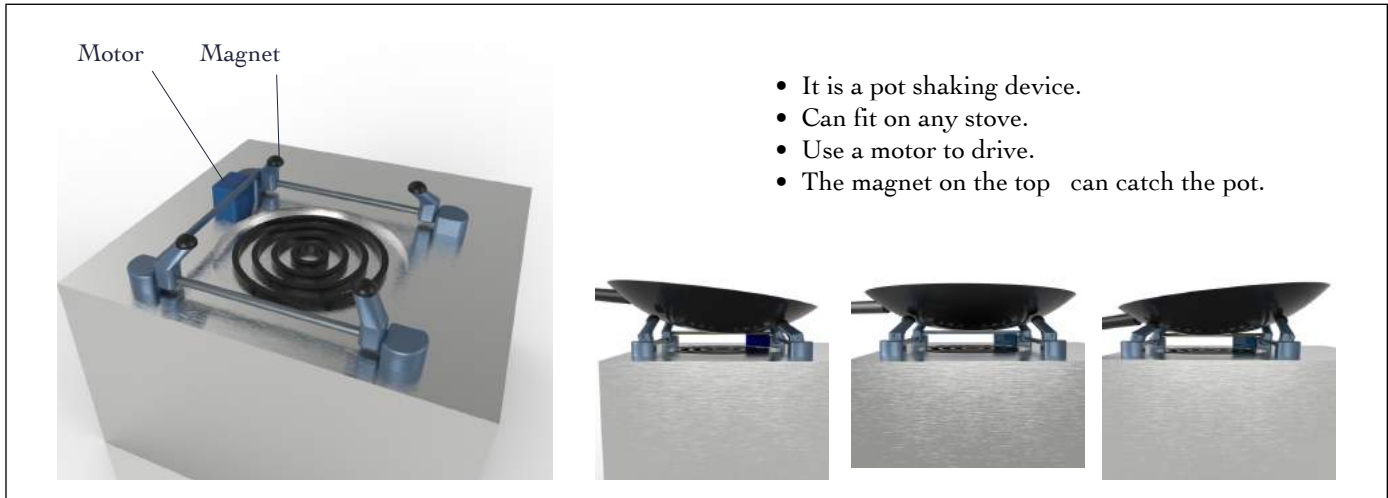
#### 3 Storyboard



#### 4 Prototype



#### 5 3D Model



#### 6 Supporting System

