# PUBLIC HEALTH EDUCATION TO RURAL TEENS



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# **OVERVIEW**

**❖ FIELD EXPERIENCE** 

**\*** HEALTH EDUCATION

**❖ FIELD EXPERIENCE ACTION (LOGIC MODEL)** 

**\*** REFLECTION



# FIELD EXPERIENCE



- ❖ Field experience is a type of education strategy in which students engage in sharing information learned in the classroom into the community.
- A cost-effective means to promote healthy behaviors such as improved diet patterns, increased **physical activity**, obesity prevention, and **food safety** promotion.
- **❖** Infectious Diseases and Zoonoses
- **❖** Public Health Nutrition



Areas of

emphasis

# HEALTH EDUCATION



- ❖ Nutrition education: helps to deliver health outcomes to the community.
- ❖ **Obstacle**: Because of the large population of the country, it is unrealistic to expect that a doctor or a health worker could reach every person and educate him about various health problems.
- \* Rural areas: lower incomes, less access to public healthcare.
- ❖ Teens have limitations due to development, vision, hearing and risk perception; more susceptible and vulnerable to injuries.



# FIELD EXPERIENCE & HEALTH EDUCATION



### **Corporation**

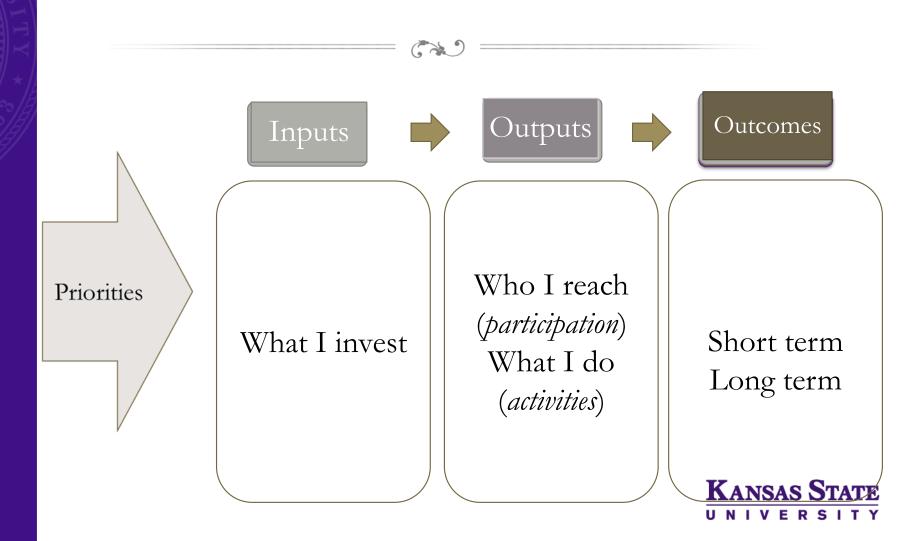
✓ Share nutrition information to community; learn through the evaluation of experience.

#### Solution

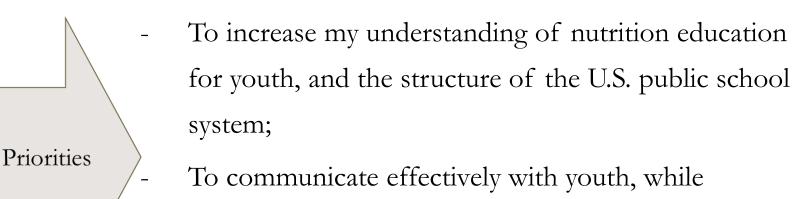
- ✓ Trained volunteers help educate people in rural areas about the basic issues affecting health.
- ✓ They can further spread this knowledge in their own circles. The level of involvement of the people helps tackle various health problems through personal as well as community initiative.



# LOGIC MODEL



## **!** Learning objective:



- To communicate effectively with youth, while respecting cultural diversity; recognize the needs and learning style of targeted audience;
- To experience program coordination and development for a specific population/organization.

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### **Activities to be Performed:**

- To develop an original nutrition education curriculum/mentor program for preteens and teens;

Priorities

To pilot-test three nutrition education lessons and three Chinese food culture lessons.

#### **Product:**

- The development and publication of the curriculum.





- **\*** Why plan to teach Chinese food culture?
- 1<sup>st</sup> step:

<u>Culture</u>: an implicit theory of how to think, conditions one how to feel, and instructs one how to interpret the behavior of others and how to act.

Priorities

How to communicate.

- 2<sup>nd</sup> step:

#### **Chinese** culture:

✓ As school requested





### **\*** Why plan to teach Chinese food culture?

✓ One of the most influential countries both economically and politically, second biggest economy in the world, one-fifth of the world's population, the Chinese is the largest single group of
 Asians in America.

Priorities

✓ Advantage in job competition in terms of building a broad social network and help them to take their career forward to new heights.





- **\*** Why plan to teach Chinese food culture?
- 3<sup>rd</sup> step:

#### Chinese food culture

- ✓ A much simpler way than a cultural overview.
- ✓ Lao Tza, "Governing a great nation is like cooking a small fish."

Require seasoning & adjustment.

- ✓ Teaching effectively
- ✓ Nutrition related





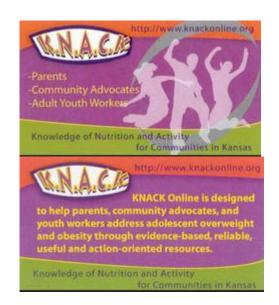
# FIELD EXPERIENCE ACTION -LOGIC MODEL(INPUTS)



### Inputs

What I invest

- **\*** Time:
- ✓ Spring and Fall 2012
- ✓ 240 hours as required
- Money
- **✓** \$50~ (rewards, gas)
- \* Research base Materials
- ✓ Knowledge of nutrition and activity for communities in Kansas (KNACK)
- ✓ Kansas State Research and Extension





# FIELD EXPERIENCE ACTION -LOGIC MODEL(OUTPUTS)



- **❖** Who I reach (participation)
- ✓ Riley county agency: Ginny Barnard, MPH
- ✓ Blue Valley high school- Randolph, Kansas.
- 1 of 5 high schools in the Blue Valley
- ☐ Achieved the Standard of Excellence in reading, mathematics, science, and social studies.
- ☐ Student body makeup is 55% male and 45% female, the minority enrollment is 4%.

# Who I reach

What I do

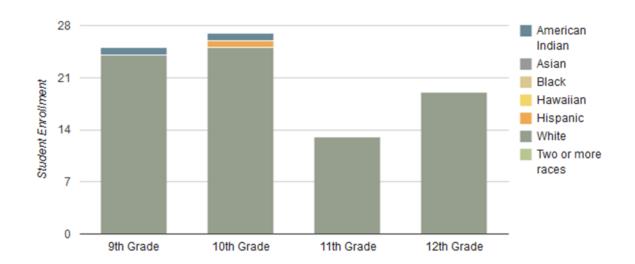




Outputs

Figure 1. Student Enrollment and breakdown of grade 9-12 by ethnic diversity.

Who I reach
What I do



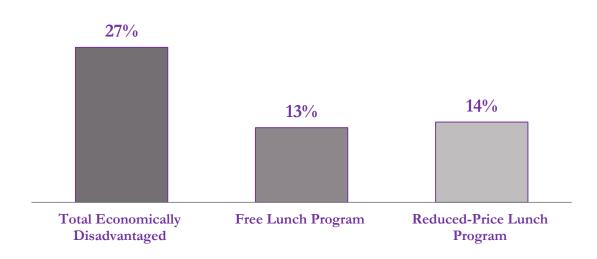




Outputs

Figure 2. The diversity of Economically- Disadvantaged Students

Who I reach
What I do







Outputs

❖ What I do (activities)

preparation

- Meetings
- Teaching materials

Application

- 11th grade,10 students,6 weeks,
- 1.5 hours per course

Who I reach
What I do

Feedback

Development

- Advisor, students, teachers
- Personal experience

• Curriculum



### **CURRICULUM**



Outputs

### Chinese Food Culture and Healthy Eating

Dear Educator,

Who I reach
What I do

This curriculum is based on the field experience for my master's degree of Public Health. The target students of Chapter 1 would be anyone interested in learning about the Chinese culture. Chapter 2 can be used with adolescents 12-15 years of age, but you can modify this chapter and make it more suitable for older students or adults.



#### Overview of Lessons

This curriculum consists of six lessons. Though the lessons can be taught independently, we strongly encourage teaching all six lessons.

Here is a brief overview of each lesson:

#### Chapter 1: Chinese Food Culture

#### Lesson 1- Influence on Food Choice



Lesson 1 aims to introduce the specific qualities associated with food and the diverse roles that food plays in Chinese culture. The course begins with looking at how food choices were influenced by the formation, development, and dissemination of Chinese culture in China. This topic will include dietary rules, social rules of etiquette and banqueting, and regional differences in cuisine.

#### Lesson 2-Table Manners



Lesson 2 introduces how the Chinese civilization develops formal orientation of etiquette thousand years ago. As table manners differ from country to country, it's important to let students as foreigners be informed of some details so as to show their respects to a different culture.

#### Lesson 3- Cooking with Children



Lesson 3 offers educators some practical tips of getting children involved with food preparation and food safety. It will help students to receive the greatest benefit from the diverse cooking methods, help them understand the core spirit of Chinese cooking, and inspire students to cook the dishes with interest and enthusiasm.

## Outputs

Who I reach
What I do

#### Chapter 2: Healthy Eating

#### Lesson 4- Eating Breakfast Activity



Lesson 4 helps students understand the importance of eating breakfast. In addition to highlighting how to make breakfast healthy, students will share common breakfast foods, evaluate those foods and discuss how to improve the quality of their breakfast. Students will also look closely at what people have eaten for breakfast in China.

Outputs

#### Lesson 5- Fruits and Vegetables



Lesson 5 is designed to help teach children to understand the important role of fruits and vegetables in keeping their bodies fit and healthy. It is about fun and easy ways to eat more, and identify the main nutrients of certain fruits and vegetables.

Who I reach
What I do

#### Lesson 6- Food Safety



Lesson 6 explains why food safety is important in maintaining health. It presents the basic concepts of what a food-borne illness is, it states ways to help prevent a food-borne illness from occurring, and it describes safe food handling procedures for every step throughout the food production process.

#### How to use this guide

#### Objectives



Each lesson begins with objectives, which are brief, clear statements of what the teacher will teach and what students will learn by the end of the lesson.

#### Procedure



The procedure provides step-by-step instructions for teaching each lesson. The blue text after each procedure number gives you the main idea and the black text below provides the details. The text in the procedure is consistent with the corresponding Power Points. Be creative and enhance the lessons to make them work for your class.

#### Lesson resources



These include interaction cues, PowerPoint, and handout for teachers. As appropriate, these resources that will help maximize your ability to effectively teach these lessons, give you enough to whet your appetite for further discussion, and prepare you for more exploration.

Outputs

Who I reach
What I do





Outputs

CHAPTER 1: CHINESE FOOD CULTURE

LESSON 3
COOKING WITH KIDS

Who I reach
What I do







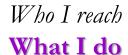
### Outputs





#### Students will be able to:

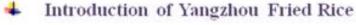
- · Identify the five tastes;
- · Cook the authentic Chinese fried rice;
- Demonstrate the ability to swirl egg with chopsticks.







#### 1. Discussion



#### The origin of Name:

Yangzhou is a famous tourist city. Gardens such as the Shouxi Lake (slide background), He Park, and Wang's Little Garden are all famous tourist attractions in Yangzhou. Poets love living or visiting there. The classic poems make Yangzhou more and more famous.





### Outputs



2. Question

#### Sour, Sweet, Bitter, Salty

For a long time in the West, the four tastes given were simply bitterness, sourness, sweetness, and saltiness. It was thought that these four tastes covered every taste available. Recently, however, the taste umami, which has long been included in Eastern ideas of primary tastes, has been added to the discussion in the West.

## Who I reach

What I do

#### Umami:

Umami is a loanword from the Japanese umami meaning "pleasant savory taste". It is the response to salts of glutamic acid — like monosodium glutamate (MSG) a flavor enhancer used in many processed foods and in many Asian dishes. Processed meats

and cheeses (proteins) also contain glutamate.

- 3. Question
- 4. Tip





### Outputs

#### **Interaction Cues**

#### 1. Discussion:

Have you tried or made Fried rice before?

#### 2. Question:

What are the five tastes?

Most students can give the first four tastes, so we can explain the fifth taste-Umami.

## Who I reach

What I do

#### 3. Question:

For some humans, the first encounter with umami? A: breast milk

#### 4. Tip:

People don't use MSG when cook egg, because same component of MSG is contained in egg.



### Yangzhou Fried Rice Recipe

TOTAL TIME: 30 min

Prep: 20 min Cook: 10 min

YIELD: 4 to 6 servings

#### **Ingredients**

- 1 1/2 rice: cooked, cold rice (preferably precooked half to one day in advance)
- · 4 tablespoons vegetable oil
- 1 cup fresh beans/peas
- 1 cup corn
- 1/4 cup chopped green onion
- 2 eggs: beaten
- 1 teaspoon salt
- 3 Chinese barbecued sausages
- 1/4 teaspoon vegetable oil

#### Optional:

- · Soy sauce
- · Black pepper
- Carrot
- Shrimp
- Onion



Who I reach

What I do



### Outputs

Who I reach
What I do

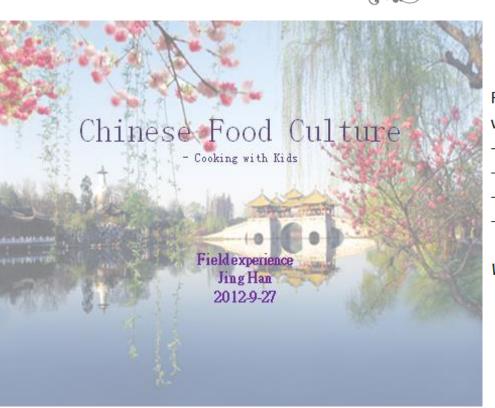
#### Directions

- 1. Heat wok for 2 minutes. When the wok is hot, pour in vegetable oil
- 2. Pour in beaten eggs and scramble slightly
- 3. Get the egg out and repeat step 1
- 4. Put in cooled rice, stirring constantly for another 3 minutes
- 5. Mix in sausage, peas, corns and cook for 3 minutes
- Mix in green onions and salt, stirring continuously until everything is blended evenly
- 7. Turn off heat, ready to serve

#### **Nutritional Information**

Amount per Serving Calories: 484 | Total Fat: 17.5g | Cholesterol: 199mg





#### Five Tastes

For a long time in the West, the four tastes given were simply:

- -Sourness
- -Sweetness
- -Saltiness

What is the fifth one?



Outputs

LESSON 4
EAT BREAKFAST ACTIVITY

♦ OBJECTIVES

#### Students will be able to:

- · Identify the benefits of eating breakfast;
- · Discuss top breakfast for children;
- Identify one goal or action (individually or as a group) related to eating breakfast;
- · Identify the suitable breakfast for morning exerciser.



Who I reach
What I do

LESSON 5
FRUITS AND VEGETABLES

- · Discuss the benefits of fruits and vegetables in diet;
- · Discuss preparation methods for vegetables;
- · Identify the major nutrients of fruits and vegetables;



Identify one goal or action (individually or as a group) related to eating breakfast.

LESSON 6
FOOD SAFETY

- · Define food safety;
- Discuss steps to keep food safety;
- Identify the factors cause food-borne illness





## Outcomes

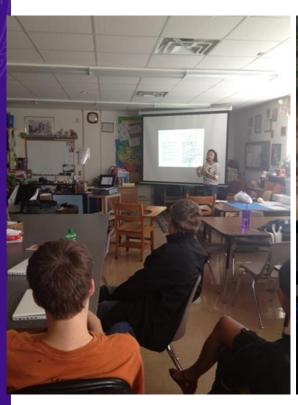
### **Audiences**

Short term: knowledge, attitude, skills, motivations.

Long term: change, choice, healthier eating.

Short term Long term













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# Outcomes

## **❖**Myself

### Short term

- ✓ Attitude: curiosity- advocation
- ✓ Knowledge: "To teach is to learn twice." Joseph Joubert

Short term Long term



LESSON 1
INFLUENCE ON FOOD CHOICE

LESSON 2

TABLE MANNERS

COOKING WITH KIDS

TO SHOW THE REST OF THE PROPERTY OF THE PROPERT

Functional Foods for Chronic Disease Prevention

Science of Food



Nutrient Metabolism

LESSON 5
FRUITS AND VEGETABLES

Research experience



Public Health Nutrition



# Outcomes

## **❖**Myself

### Short term

- ✓ Nutrient Epidemiology writing and reviewing skills
- ✓ Statistics class figures
- ✓ Seminar public speaking

# Short term Long term





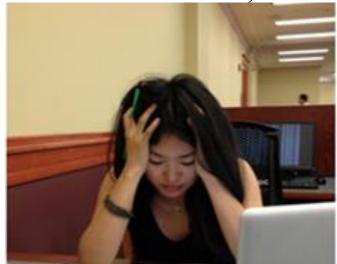
# **\***Myself

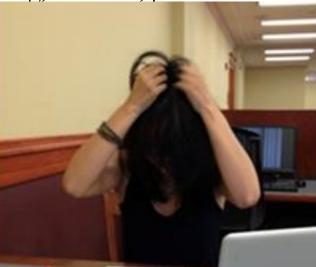
## Long term

✓ Personalities: humble, patient

✓ Skills: communication, coordinating, research, presentation

Short term Long term







Outcomes

**❖**Myself

Long term

✓ Interests:

Short term Long term

- ☐ Education
- ☐ Chinese cuisine in America
- ☐ Chinese immigrants Dietary Pattern





# Outcomes

- ☐ Chinese immigrants Dietary Pattern
- greater awareness, more knowledge about healthy foods increase portion sizes, dined out more frequently, convenience foods, seven-food groups; decrease traditional Chinese foods and Chinese Dietary variety

## Short term Long term

- <u>higher education and income levels</u> larger increase in consumption frequency of grains, vegetables, and fruits.
- <u>resided longer</u>- increase in vegetables, fats/sweets, and beverages.
- <u>better English proficiency-</u> greater increase in grains, fruits,

meat/meat alternatives, and fats/sweets.



# REFLECTION

#### **\*** Learning objective:

 To increase my understanding of nutrition education for youth, and the structure of the U.S. public school system;



- To communicate effectively with youth, while respecting cultural diversity; recognize the needs and learning style of targeted audience;



- To experience program coordination and development for a specific population/organization.





#### \* Activities to be Performed:

- To develop an original nutrition education curriculum/mentor program for preteens and teens;



- To pilot-test three nutrition education lessons and three food culture lessons.



#### **❖** Product:

- The development and publication of the curriculum.





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### (3)

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