

# A Retrospective Analysis of the Acceptability and Effectiveness of Patient Programming at the Yale New Haven Health Teaching Kitchen

Heran Essayas BS, Eileen Lee MD, Max Goldstein MS RDN CDN CCMS, Amy Ralph MS RD CDN CNSC CCMS, Joseph Mendes MS RRT PA-C, Nathan Wood MD MHS Chef DipABLM DABOM

## Background

- The Irving and Alice Brown Teaching Kitchen at Yale New Haven Health opened in 2023 and offers free, hands-on culinary medicine classes to patients
- Patient classes are taught by a registered dietitian-chef and utilize the *Health meets Food* curriculum

## Purpose

- The purpose of this retrospective cohort study was to assess the acceptability and effectiveness of the culinary medicine classes offered to patients in the Teaching Kitchen's first year of operations
- We hypothesized that patients receiving hands-on culinary medicine education in the Teaching Kitchen would rate the classes as enjoyable and acceptable, and class attendance would lead to improvements in their home cooking and eating habits

## Methods

- Patients who attended at least one class between October 12, 2023 and October 11, 2024 were invited to participate in the study. In total, 293 patients were contacted for participation
- A survey was administered electronically and sent to patients using MyChart, a messaging portal available through the electronic health record
- Self-reported outcomes included perceived changes in home cooking frequency, attitudes regarding the connection between diet and health, comfort in and enjoyment of cooking and eating healthy foods, and whether attendance at future classes would be desired. Demographic data were also collected

### Patient Demographics

Age*	
Mean	59 (SD = 12)
Gender**	
Female	81.2%
Male	18.8%
Race**	
White, Non-Hispanic	66.7%
Black, Non-Hispanic	18.8%
White, Hispanic	8.5%
Asian	2.6%
Native American Indian	0.85%
Black, Hispanic	0.85%
Education**	
High School or GED	9.5%
Some college/postsecondary	19%
College (two- or four-year degree)	32.5%
Graduate or advanced degree	39%

\*21 respondents did not provide their age (n = 99)  
\*\*3 respondents did not provide demographic data (n = 117)

### Barriers to Class Attendance

- Of the 120 respondents, 2 did not perceive barriers (n=118). 79 identified barriers to attending classes
- The most common responses were "other events or commitments" (57%), "other" (24%), and "illness" (19%)
- Half of respondents who responded "other" indicated that the timing of the classes prevented them from attending

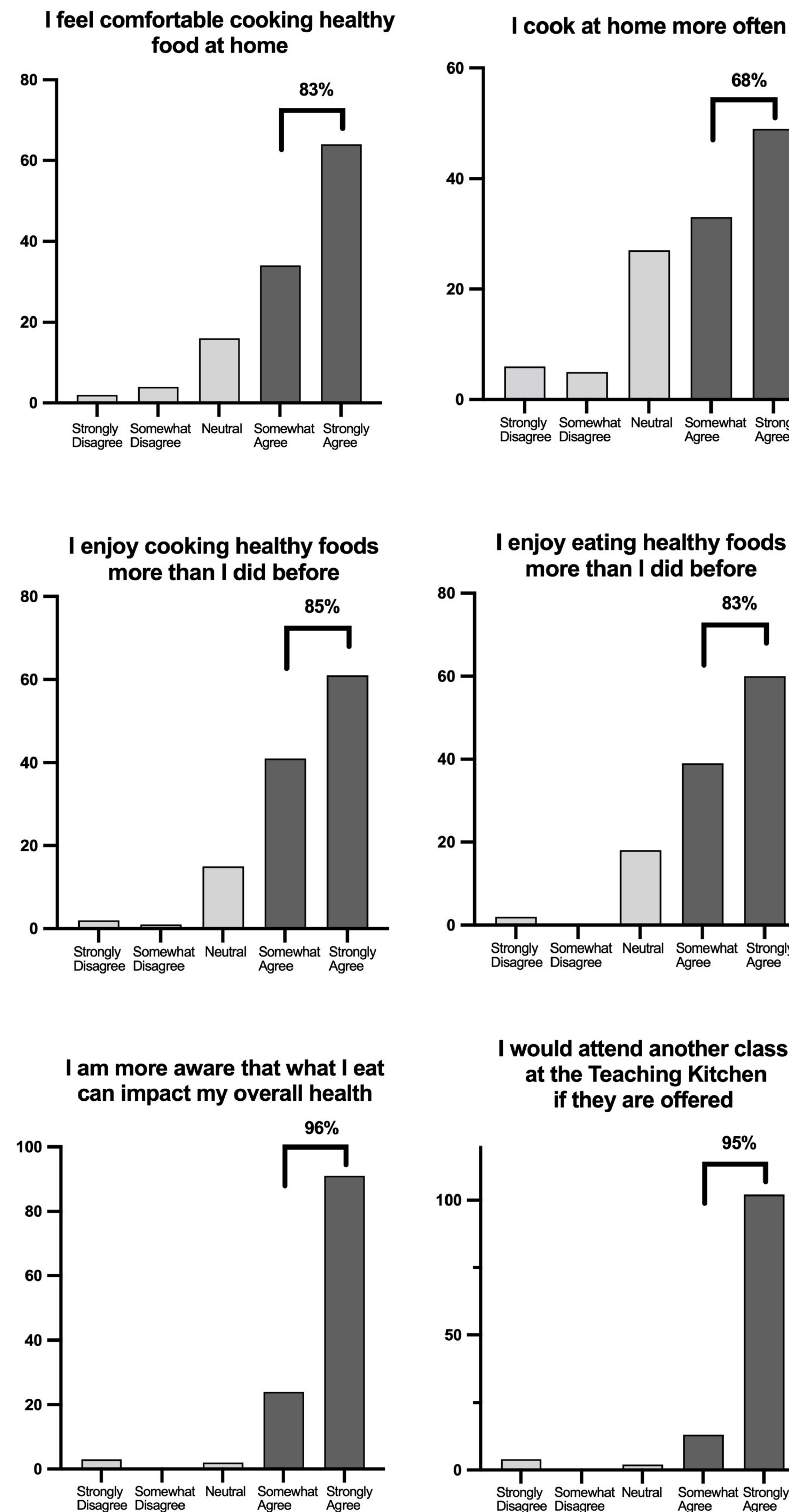
### Barriers to Healthy Eating Addressed by the Teaching Kitchen

n = 118	
Gaining nutrition knowledge	72.6%
Selecting healthy foods at the grocery store	69.2%
Figuring out what to cook and/or meal planning	68.4%
Making cooking more fun	60%
Saving time on cooking	40.2%
Feeling more confident in my ability to cook	38.5%
Successfully executing a recipe	38.5%
Saving money on groceries	18.8%
Other	4.3%

## Results

### Survey Results

120 of 293 patients responded (41% response rate)



### Selected Patient Feedback

- "I got so much out of each class, whether learning about nutrition, how to shop for, prepare, and cook healthy meals, or becoming excited to try new things that I would've never tried before!"
- "The teaching kitchen and Max have helped to make food shopping, cooking and eating healthy and enjoyable experiences. I have incorporated the recipes into my cooking rotation and feel increased confidence in myself as a cook. I am cooking more in line with a Mediterranean Diet and am enjoying doing so."
- "The teaching kitchen class is invaluable. Anyone can give you a piece of paper on what to eat, but showing you how to buy, prepare, cook, and serve gives you the tools to execute."
- "I really enjoyed and benefitted from going to the Teaching Kitchen! I lowered my A1c as a result."
- "This has honestly changed my life. I cannot express enough how impactful these classes have been on my health — down 50 lbs and counting and more importantly opened my world to a new way of cooking."

## Conclusions

- Our results show that patients respond positively to the lessons taught in the Teaching Kitchen and view classes as acceptable and effective
- Using a hands-on educational approach enables patients to feel comfortable executing recipes outside of the Teaching Kitchen and build upon their culinary and nutritional knowledge
- Increasing staffing and variety of times offered for classes may reduce barriers to attendance
- The Teaching Kitchen appears to be a beneficial tool for empowering patients to manage their health and positively change knowledge, attitudes, and behaviors around healthy eating