



A Guidebook To Increase RDNs' Cultural Competence Counseling Chinese Young Adults

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Abstract:

Added sugar is one contributor to young adults/college students gaining unwanted weight. Overweight prevalence for the Asian population increased from 28 to 34% between 2004 and 2018. Many registered dietitian and nutritionists (RDNs) are unaware of the Chinese culture. A Directed Project (DP) allows graduate students to create guidebooks to increase RDNs' cultural competence and humility and focus on sugar-added beverage intake. Given that Los Angeles has a large population of Chinese heritage, RDNs are challenged to be culturally competent to properly serve this population, yet few resources exist. This DP synthesis includes a pre/post evaluation (relevance, format & accuracy) of a draft booklet by 5-7 RDNs giving informed consent to participate. This model is unique and addresses the Academy's inclusion, diversity, equity, access (IDEA) to increase the RDNs' cultural humility and skill to address the Chinese population's nutrition needs.

Introduction:

The California Health Interview Survey indicated that Asian groups had dramatic increases in the prevalence of obesity (Gong et al. 2021). Consumption of sugar-added beverages is one of the contributors to increased young adults and adolescents with obesity because sugar-added beverages are a significant source of calories in this population. Common sugar-added beverages on the market include regular soft drinks, sweetened teas, coffee with creamers, energy drinks, and fruit drinks (AHA, 2022). Asian drinks such as boba milk tea have also become popular between Asian young adults. The use of guidebook has previously demonstrated to be an effective teaching tool. Many health care professionals are trained in western medical educational systems and are not familiar with Chinese Culture. Thus, it is necessary to create a nutritional guidebook regarding sugar-added beverages and Chinese culture to improve the RDNs' cultural competence and humility. This will aid in counseling Chinese young adults to prevent being overweight and obese.

Methods:

- Created the consent form and recruitment email for RDNs.
- The guidebook evaluation processes were completed by an expert panel, which included a total of 5-7 RDNs with at least three Chinese RDNs. The evaluation process included a pre-survey and a post survey.
- The Academy of Nutrition and Dietetic websites to "find an RDN" was used to locate a minimum of 20 RDNs who are employed in California area and contacted via the recruitment email.
- The link to the consent form was attached in the recruitment email, and the RDNs who agreed to participate received the pre-survey in February 2023 and post survey in March 2023 for guidebook evaluation.
- Pre-Survey was the evaluation of the proposed guidebook outline, and included 24 questions regarding accuracy of information, completeness of the content, format and relevancy of the guidebook, and demographics of participating RDNs.
- Post-survey was the evaluation of the completed guidebook. The post survey included ten Likert-scale questions regarding the accuracy, relevancy, completeness, format of the guidebook.
- Guidebook modification were made according to survey responses.

Results**:

N = 33 RDNs were invited to participate, n = 7 signed the consent form, and n = 6 evaluated the guidebook.

Pre-Survey: n = 6 RDNs, n = 2 not familiar with Chinese culture

RDN	Race/Ethnicity	Years being a RDN	Frequencies to encountered with Chinese patients/client	Familiar with Chinese culture	Familiar with Chinese sugar-added beverages
1	Asian/Chinese	10 months	None	4 out of 5	4 out of 5
2	White (Caucasian)	15 years	Rarely	Minimally	Boba tea
3	Taiwanese American	7 years	Not often	A little familiar	Familiar
4	White (Caucasian)	34 years	Infrequently, in recent years.	Some	No
5	White (Caucasian)	25 years	About 5 times a week.	Fair	Fair
6	Chinese	10 years	Weekly	Fair	Pretty familiar

Guidebook Development Results: n = 6 RDNs, 8 questions, all questions with =/> 50% agree/strongly agree, partial list below.

Item	5: Strongly Agree	4: Agree	3: Unsure	2: Disagree	1: Strongly Disagree
Guidebook is beneficial to RDNs.	4 (66.67%)	2 (33.33%)	0 (0.00%)	0 (0.00%)	0 (0.00%)
Short chapters/5-10 pages are effective	2 (33.33%)	4 (66.67%)	0 (0.00%)	0 (0.00%)	0 (0.00%)
4 to 5 healthier beverages are adequate.	3 (50.00%)	1 (16.67%)	2 (33.33%)	0 (0.00%)	0 (0.00%)
Cultural humility and competence questions are helpful.	4 (66.67%)	2 (33.33%)	0 (0.00%)	0 (0.00%)	0 (0.00%)
Adding Chinese popular sugar-added beverages and health beliefs are necessary.	5 (83.33%)	1 (16.67%)	0 (0.00%)	0 (0.00%)	0 (0.00%)

RDN Recommendations: n = 2 of 4 listed below.

1	Why do Chinese consume those sugar-added beverages. Among those people consuming SAB, are there any common traits (age, sex, education, income)? What is the difference in the nutritional fact labels in the US vs China and how will that affect people's ability to choose among the products?
2	I think spending less time on the literature review/cultural competence and more time on understanding Chinese Culture and Healthier Beverage choices will be more beneficial. Could also mention different nuances of Chinese Culture (e.g., Taiwan vs Hong Kong vs the various regions of Mainland China vs Asian Americans vs other Asians).

Post Survey Results: n = 6 RDNs, 10 questions, all questions with =/> 50% agree/strongly agree, partial list below.

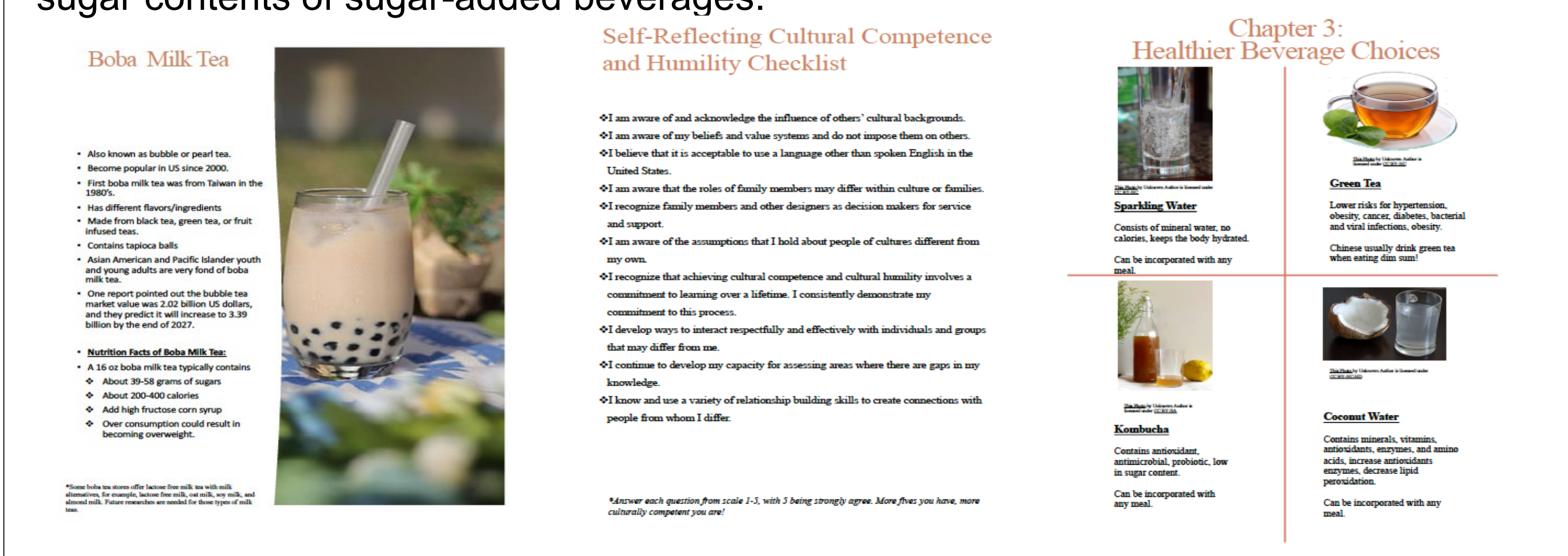
Items	5: strongly agree (#%)	4: agree (#%)	3: unsure (#%)	2: disagree (#%)	1: strongly disagree (#%)
... beneficial for RDNs to use when educating Chinese young adults...	4 (66.67%)	1 (16.67%)	1 (16.67%)	0 (0.00%)	0 (0.00%)
...structure of the guidebook clearly written	2 (33.33%)	3 (50.00%)	0 (0.00%)	1 (16.67%)	0 (0.00%)
The structure ... easy to understand	3 (60.00%)	1 (20.00%)	0 (0.00%)	1 (20.00%)	0 (0.00%)
...easily be administered	2 (33.33%)	2 (33.33%)	2 (33.33%)	0 (0.00%)	0 (0.00%)
Chinese culture is well explained	3 (50.00%)	0 (0.00%)	3 (50.00%)	0 (0.00%)	0 (0.00%)
The cultural competence and humility questions ... appropriate	5 (83.33%)	1 (16.67%)	0 (0.00%)	0 (0.00%)	0 (0.00%)
...number healthier beverages ... sufficient	2 (33.33%)	3 (50.00%)	0 (0.00%)	1 (16.67%)	0 (0.00%)

**Data are still under review for Final DP approval by DP Committee; tentative approval by Chair only.

Discussion:

This guidebook was developed to address the lack of cultural competence among RDNs regarding Chinese culture and sugar-added beverages when counseling Chinese young adults to preventing overweight. RDNs' reviews showed that the guidebook achieved the acceptable agreement goal of at least 50%.

The guidebook consists of three chapters: 1 - presents an overview of the increasing prevalence of overweight among the Asian population, a table of popular sugar-added beverages with their nutrition facts, BMI categories for Asian and non-Asian populations, and a literature review. 2 - introduces the Chinese culture (Taiwan, Hong Kong and Mainland China), cultural competence and cultural humility, and a self-checklist for RDNs' knowledge of cultural competence and humility. 3 - introduces healthier beverage/food options and nutrition labels on U.S. and Chinese products to assist RDNs to educate young Chinese adults on interpreting the carbohydrates/added sugar contents of sugar-added beverages.



Conclusions:

The guidebook met the acceptability goal of at least 50%, based on the RDNs' reviews, and consists of three chapters with topics: sugar-added beverage caloric content, cultural competence and humility, Chinese culture, and healthier beverage recommendations. While the guidebook is intended to improve RDNs' cultural competence and ability to counsel Chinese young adults on preventing overweight, there is room for improvement and further evaluation is encouraged. Future studies may investigate the effectiveness of the guidebook to improve RDNs' cultural competence and the health outcomes of their Chinese clients.

Acknowledgements:

I want to express my appreciation to my committee chair, committee members, participating RDNs, and family for their unwavering support and encouragement throughout my academic and personal journey. Their valuable feedback, guidance, and assistance in helped me achieve my goals.

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