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Asian and Pacific Islander Seafood Consumption Study

Exposure Information Obtained through a Community-Centered Approach

Planning Phase

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TABLE OF CONTENTS

LIST OF APPENDICES

INTRODUCTION

This document is the project report for the first of three phases of an Asian and Pacific Islander seafood consumption study: the planning phase. A substantial amount of work was needed for this phase because, to our knowledge, this is the first effort in the United States in which investigation of this environmental justice issue has been initiated, designed and conducted by the Asian and Pacific Islander (A&PI) community, itself.

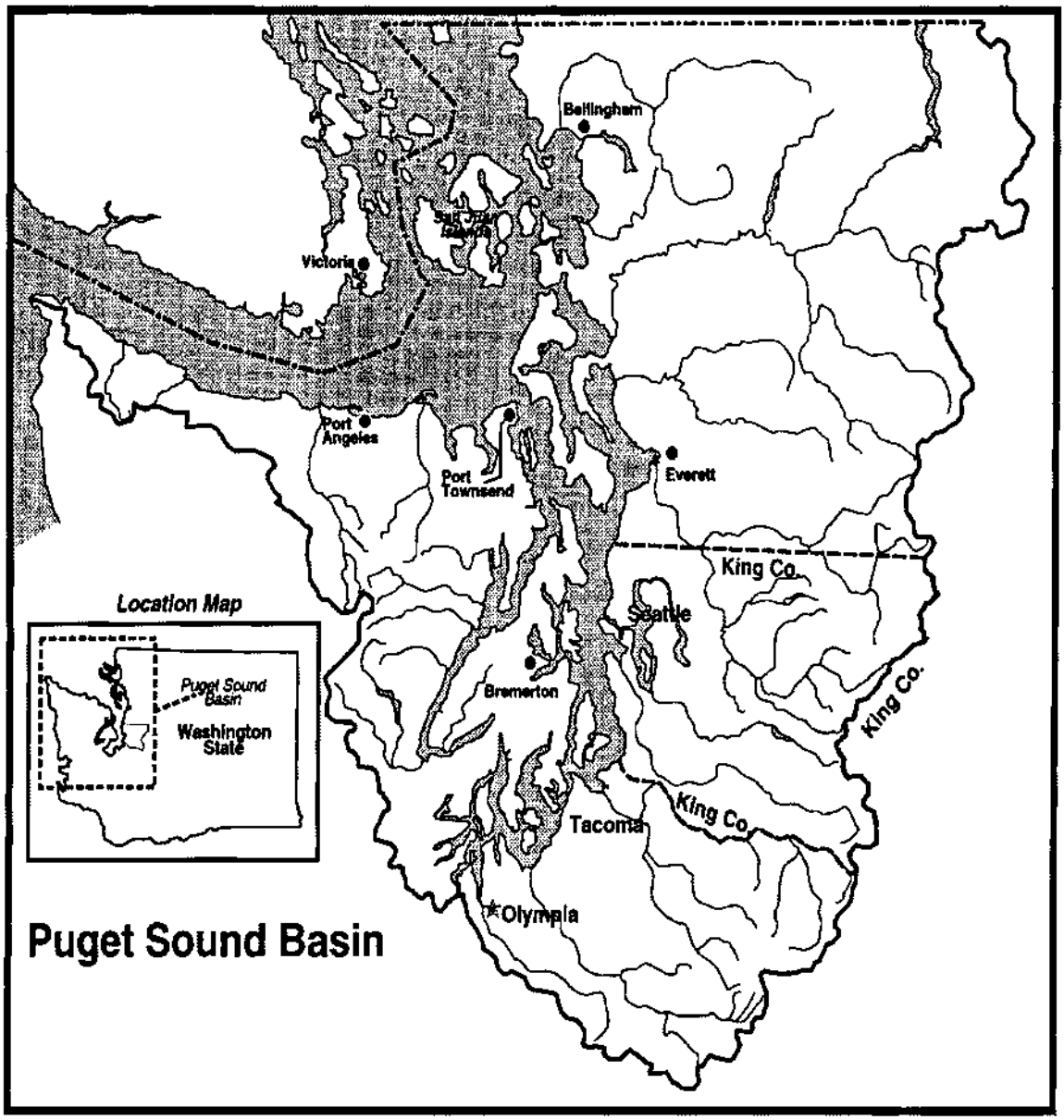
Leadership by the A&PI community is critically important in obtaining accurate data and is the success of the present work. Common diet study approaches and methods used in the United States are insensitive to A&PI culturally determined social behaviors and language requirements. If these unique features are not considered in the design and conduct of the study undetermined biases and inaccuracies will result.

The greater Seattle/Puget Sound area in the state of Washington has a substantial A&PI community. In this region, there is considerable access to a large marine waterbody (Figure 1) where seafoods are readily collected. Representatives of the A&PI community determined that an area of considerable concern is evaluating and communicating the risks from environmental contaminants in purchased and self-collected seafoods.

The purpose of this report is to a) provide documentation to support the need for an A&PI Seafood Consumption Study b) summarize the challenges and triumphs of planning this type of work and c) provide the products of Phase 1.

This project focuses on evaluating A&PI seafood consumption and is unique because the study's purpose and design was developed by members of the A&PI community. Seafoods are an important culturally based food source as well as a potential significant source of environmental contaminants such as methyl mercury and polychlorinated hydrocarbons for A&PI persons living in the United States. The long term goal of this project is to improve the health and well-being of the A&PI communities by empowering the local community with information they can use to develop their own awareness and agenda to address environmental inequities. The project is divided into three phases, Phase 1 focuses on the development of community support and technical expertise including university contacts in order to develop a study tool, a workplan, and a proposal for Phase 2 and Phase 3.

Figure 1. Map of Puget Sound area showing location of the city of Seattle and King County, Washington State



RATIONALE FOR STUDY (Phase 1-3)

Asian and Pacific Islanders represent one of the most diverse and rapidly growing immigrant populations in the United States. From 1980-1990, A&PI populations have increased 107.8% in the United States. In Washington state, there has been a 93.2% increase from 1980-1990. As of 1990, Washington state has the third highest percentage of A&PIs, next to California and Hawaii (US Census Bureau, 1990). The majority of the new immigrants reside in the Puget Sound region in Washington state. King County (the focus of this study) has the largest A&PI population. 55.6% of A&PIs in the United States do not speak the English language very "well"; 39% within King County (US Census Bureau, 1990). 11.6% of the A&PI families are below the poverty level in the United States; 13% in King County. Yet, the A&PI communities are often given very little attention because of erroneous stereotypes and perceptions that these groups are successful and a healthy model for a minority population.

Therefore, it is critical to understand the social and economic characteristics of the susceptible A&PI populations. Among the many issues the A&PI communities confront, language and ethnicity issues are the most challenging. Recent immigrant and refugee populations are considered to be the most vulnerable communities. The vast majority of the refugees in Washington came from Vietnam, Cambodia, and Laos since 1975. It is important to understand that as refugees, they did not choose to move to this country. In an effort to escape war, torture, and the threat of death, the refugees left their war torn countries, arriving in Washington after having spent years in refugee camps. Only a few had the education to compete in an industrial urban market and the majority speak no English. Trauma and stress often make it impossible for refugees to become self-sufficient within a short period of time (personal communication: Asian and Pacific Islander Community Steering Committee).

Recent immigrant populations are considered vulnerable because they are most likely to practice seafood collection, preparation and consumption habits closely resembling those in their native country and which may contribute to increased exposures to environmental contaminants. In this study, the Asian and Pacific Islander Community Steering Committee defined recent immigrant populations as first or second generation inhabitants/residents of the United States. Therefore, the A&PI communities are limited in obtaining adequate access to environmental health-related educational materials and environmental protection. In other words, susceptible Asian and Pacific Islander communities may be defined as a socioeconomically and socioculturally disadvantaged population (Personal communication: Asian and Pacific Islander Community Steering Committee).

The A&PI communities prioritized an environmental health-related agenda to understand seafood consumption exposure risks. Many new immigrant and refugees identify fishing and self-collection of seafood as a way to relate to homelike activity and lifestyle (Landolt et al.., 1985). Refugees and recent immigrants regard seafood harvesting as a coping mechanism to ease the painful and difficult transition from their once familiar country to the US society and life. For example, the Vietnamese community expresses a high obligation to harvest their own

seafood because their origin country is surrounded by water (Personal communication: Asian and Pacific Islander Community Steering Committee). Family gatherings over meals are an important cultural feature of the Filipino community, and an appropriate family meal includes one or more seafoods. Apart from A&PI's homelike lifestyle feature, seafood harvesting and consumption is also popular because of traditional cultural practices. Traditionally, the Japanese community prepares fresh raw seafood more popularly known as "sushi." As a way to maintain good health and longevity, the Chinese community believes in consuming seafood more than any other dietary source. Therefore, many years of cultural practices affecting seafood consumption are deeply rooted and passed on from generation to generation.

Asian and Pacific Islanders collect and consume types of species different from the average American. A study indicated that A&PIs collect seafoods comprised of 50% of non-game invertebrates such as crabs, sea cucumbers, and snails. They collect them for subsistence (Carrey and Kvitek, 1991). Other varieties of seafood enjoyed by the A&PIs are shellfish (clams, oyster, limpid), seaweed, and bottomfish (Personal communication: Asian and Pacific Islander Community Steering Committee). A&PIs tend to consume seafoods such as bottomfish and clam which may have higher tendency to accumulate microbial and chemical contaminants. An example of the a prevailing assumption about what are considered edible seafoods is the Washington State Fish and Wildlife Commission's Sportfishing Guidebook which excludes many of the seafoods, such as the macoma clam, which are commonly considered edible in the A&PI community. A list of the seafood species is included in the Appendix C, and information is provided below.

Shellfish: it is assumed that the A&PIs consume many types of shellfish which non-Asian populations do not commonly consider as edible, such as the macoma clam. This clam is common and popular in the Puget Sound area and believed to be frequently collected by this population (Personal Communication: Asian and Pacific Islander Community Steering Committee). These clams actually ingest sediment and do not filter feed like common littleneck (manila) clams. Therefore, consumption of a macoma clam can lead to exposure to contaminants laden in sediments in the meat of the clam. Some shellfish recreationally collected in Washington State were found to have excessive fecal coliform count. Currently, there are no fecal coliform standards for self-collected shellfish meat (Faigenblum, 1988).

Snails: it was found that A&PI persons consume predatory snails collected from the Puget Sound (Matter, 1994). Because the food of these snails include clams, oysters and/or barnacles, contaminants may be accumulated in the body of the snail. For example, paralytic shellfish toxin which is accumulated by filter-feeding bivalves (bivalves include clams and oysters, but not snails) have been found in tissues of predatory snails (Wekell et al., 1996).

Sea cucumber: according to the A&PI Community Steering Committee, sea cucumber is another favorite seafood which is heavily collected and consumed. In 1991, Kristine Gebbie, secretary of Washington State Department of Health, sent Joseph Blum, Director of Washington State

Department of Fisheries, a memorandum strongly recommending curtailment of harvesting sea cucumbers due to contamination. However, this warning did not reach the A&PI community.

Crab: has a high tendency to accumulate chemical contamination. A typical cultural practice is to consume the crabs whole including the hepatopancreas. Dioxin and furan analysis of Puget Sound crab showed higher concentration in hepatopancreas than in leg meat.

Bottomfish: chemical contaminants in bottomfish reflect in concentration of sediments which they live in. Due to urban runoffs and embayments, sediments are more likely to be contaminated than distant sites. Urban fishing locations are most accessible to A&PI's since there are high populations residing in these areas; therefore, may lead to higher consumption of contaminated bottomfish. Polychlorinated biphenyls and polynucelar aromatic hydrocarbons were higher in rockfish and sole, respectively, collected near urban areas than areas farther away. (Nicola et al., 1987; West & O'Neill, 1995)

In urban embayments in Washington state, A&PI's comprise the majority of non-US born seafood collectors. Species easily collected in urban embayments include all of the above mentioned species. The A&PI Community Steering Committee has confirmed that they are collecting those species (Soukhaphonh, 1996).

Seafood parts: the A&PIs consume many parts of the seafood as well. For example, in American Samoa, many residents eat the entire fish, e.g., muscle, liver, and guts. Other A&PI ethnic groups have similar cultural habits. Consumption of fish skin, fish head and cooking water is common. Other cultural practices are that crabs are cooked whole and both leg meat and the body contents which include the fatty liquor and the hepatopancreas are consumed. Residue analysis of a small sample of crabs from the Puget Sound indicated that contaminants are concentrated in the crab hepatopancreas (USEPA, 1991).

Information, such as the above lead A&PIs to become aware and concerned about seafood issues. Currently, there is limited information on the type of seafoods and the rate of consumption practiced by A&PIs. This study bears significance because of unique language and cultural considerations and a community-based approach to environmental issues of concern. Phase 1 produced the following: 1) a prototype for future initiatives working with sensitive groups for exposure and risk analysis, the first quantitative assessment of fish consumption rates and habits in the A&PI community, 2) effective risk communication methods from A&PI communities to researchers and agencies 3) culturally sensitive and community-driven planning 4) a study tool (i.e. a seafood consumption survey) 5) focus group testing of a study tool 6) a workplan for the implementation of the study tool.

A majority of published fish consumption studies for harvesters are creel surveys because they are relatively easy to perform. However, this method yields erroneous or no information for A&PIs. The A&PI Community Steering Committee advised that a creel survey, a telephone survey, a mail-in survey or a door to door survey are culturally inappropriate. Therefore,

alternate means of obtaining consumption data must be employed. For instance, a creel survey requires survey interviewers to approach anglers directly at the fishing site to questions their consumption habits. A&PIs practice manners of privacy, indirectness, and subtlety and would therefore politely decline to answer any questions or walk away before the interviewer ever reached them. Also, language and literacy issues make creel surveys and mail surveys incompatible and unfeasible considering the culture and needs of the A&PI communities. Language barriers have been noted in a recent study (California Regional Quality Control Board, 1994). Therefore, face to face interviews given in a culturally sensitive manner are the only way to collect reliable information.

The A&PI Community Steering Committee in this study defined a method which is culturally sensitive and compatible with common A&PI social practice. Most A&PI persons are not accustomed to be interviewed without an advance arrangement. Therefore, neither random door to door interviews nor telephone interviews are not appropriate methods. A definite lack of cultural respect is displayed if a study participant is not provided with a bilingual and bicultural interviewer. The interviewer must be highly competent and polite in the opinion of the study participant; therefore, adequate training of the interviewers as well as focus group testing and pilot testing are all important. The process of the interview must include culturally important protocol such as the exchange of appropriate greetings and, perhaps, the offering of a beverage or snack. Study participants should also receive an appropriate form of compensation for taking part in the study. Appropriate compensation may be a check for cash or a certificate for food purchase, but should be determined ahead of time and presented at the conclusion of the interview.

Various existing environmental education and protection tools and methods are available, but are ineffective or non-existent for the A&PI communities. Warnings of environmental hazards and education materials without cultural reference do not reach the A&PI communities. For instance, many A&PIs are unaware of the existing environmental education materials because the materials are inconveniently written or spoken in English only. Census data indicate that in the King County, 39% of A&PIs cannot "perform" English very "well." For instance, American methods such as pamphlets and notices in English language newspapers or telephone hotlines are ineffective.

Multi-language advisory signs are also an ineffective communication tool. Puget Sound has many fishing advisory signs posted up along lakes, rivers, beaches, docks, etc. The issue of advisory signs are that they neglect the needs and concerns of non-US born audiences. The A&PI Community Steering Committee and other members of the A&PI community have stated that advisory signs can often be misunderstood and misinterpreted because 1) the signs are perceived as a form of invitation - that the beach has plenty of seafood available because nobody has been there, 2) there are problems with the clarity and accuracy of the translation of multi-language signs. Oftentimes, they send mild warning messages and can be misleading and 3) not all who need to be aware are able to read.

LONG TERM AIM OF THE STUDY (PHASE 1-3)

The long term aims of the study are to improve the overall health and well-being of A&PI communities in the Puget Sound Region by working to:

~ empower the local community to develop their own environmental justice agenda to identify, reduce, and assess the disproportionate impact of environmental health on their community through collaborative efforts with researchers, agencies
or other interested parties;

~ reduce the risk of disease by educating refugees and immigrants on how to reduce their exposure to fish and seafood pollutants;

~ develop a cadre of environmentally informed refugees and immigrants familiar with all phases of risk identification and communication; and

~ set up formal and informal processes for ongoing communication between researchers, agencies and refugee and immigrant communities.

SPECIFIC STUDY OBJECTIVES (PHASE 1-3)

~ To provide definitive scientific documentation on seafood consumption rates and exposure risks for A&PI communities. This project is the first attempt to document consumption rate, types of species, parts of species, and method of preparation practiced among the A&PI population;

~ develop tools for effective risk communication on environmental justice issues between the A&PI community, researchers, government agencies, university communities, and language relevant groups;

~ develop culturally appropriate strategies and methods that reach sectors of a new community and build community capacity to understand environmental justice issues; and

~ determine obstacles to communication and develop appropriate educational/communication tools and vehicles to reach low-literacy and non-literate populations.

BENEFITS OF THE STUDY

In addition to the completion of the above mentioned objectives, this project provides the following benefits:

~ reduce the risk of disease from environmental exposure;

~ enhance the Refugee Federation Service Centers in-depth knowledge of environmental health issues;

~ establish a solid means of communication and collaboration with researchers; and

~ the researchers and agencies will benefit by exposure to the needs and issues of this minority community.

PRODUCTS OF PHASE 1 (PLANNING PHASE)

Tasks completed in Phase 1 included the following, and each will be addressed in this section.

~ The community organization (Refugee Federation Services Center) hired a qualified project coordinator who was closely tied to the local A&PI community;

~ The Project Coordinator recruited members of three volunteer committees: 1) Asian and Pacific Islander Community Steering Committee 2) Technical Committee 3) Advisory Committee who represent the A&PI community, technical expertise to perform a scientifically sound study and potential stakeholders, respectively;

~ The A&PI Community Steering Committee determined a culturally appropriate method to obtain seafood consumption data from the A&PI community and the Technical Support Committee designed a scientifically sound study method; and

~ A work plan to implement the study method was developed. This included establishing partnership with a local university; and

~ Development of a grant proposal to complete Phase 2 and Phase 3. (This grant has received full funding.)

Refugee Federation Service Center and Seafood Consumption Project Coordinator

The Refugee Federation Service Center (RFSC) was established in 1982 by refugees for the provision of social services with an initial budget of $60,000. Today, the agency is a thriving organization and operates three facilities with a budget over $1 million. The agency is managed and staffed by refugees and remains a community-based organization through its affiliated seven Mutual Assistance Associations (MAA): Coalition of Lao Mutual Assistance Association, East European Association, Ethiopian Community Mutual Association, Khmer Community of Seattle-King County, Vietnamese Friendship Association, Indochina Chinese Refugee Association, and Eritrean Community of Seattle and Vicinity. The RFSC serves as a fiscal agent for MAA programs funded through the City of Seattle, King County, the State and Office of Refugee and Immigrant Assistant, Washington State Department of Social and Health Services. In addition, it works closely with sponsoring agencies who bring refugees into this country

(Volags). MAA's, the Refugee Federation Service Center, and Volags are members of the local Refugee Planning Committee and responsible for the planning, design, and implementation of refugee programs in the local area. At the national level, they attend consultation meetings organized by the Federal Office of Refugee Resettlement in Washington, DC. The Refugee Federation Service Center provides English as a Second Language, Vocational Exploration, Skills Training, Job Placement Services, bilingual/bicultural case management and referral services, etc. All services under this component provide refugees with information, skills, and support that assist them in obtaining self-sufficiency. The majority of the services are provided in the following languages: Amharic, Chinese, Cambodian, Lao, Mien, Somali, Russian, Tigrigna, Polish, Ukrainian, Vietnamese, Spanish, Thai, Oromo, and Slovakian.

The agency's most unique aspect is that the bilingual/bicultural staff and volunteers provide comfort that comes with speaking the native tongue and true understanding of what it means to be a refugee and an immigrant. The staff are familiar with the difficult transition to life in the US., culturally specific coping mechanisms, and specific concerns of their communities. In 1995 the Refugee Federation Service Center identified seafood consumption and subsequent contamination as a chief environmental justice issues of the A&PI community.

Important characteristics of the Seafood Consumption Project Coordinator included good speaking and presentation skills, skill in group consensus building and meeting facilitation, close associations with the local A&PI community, being bilingual/bicultural, understanding environmental justice issues, project management skills and ability to be a liaison between the A&PI community and scientific experts.

The project coordinator, a third generation Japanese-American who was raised and currently resides in an A&PI neighborhood of Seattle (King County) was hired by the RFSC as the Project Coordinator. This person had previously worked for local political representatives of her community, for a local environmental activist organization and had been an intern in the local US. Environmental Protection Agency regional office. Her resume is included in the Appendix A to this report.

In addition to the function of organizing and facilitating the various Committees' work, the Project Coordinator personally visited local beaches to gain a better understanding of the issue. Field work included taking photos and attempting to talk with harvesters and other individuals. There were two key observations:

June 3, 1995

Off the piers at Alki Beach, two individuals, identified as a recent refugee from Cambodia, were interviewed. The first was fishing for salmon using a herring bait. The other fishing for sun perch using worms. Both were very limited in English. Though the Project Coordinator posed as a tourist, their body language conveyed that they were feeling threatened or intimidated. Just directly across the piers are heavy industrial sites.

June 9, 1995

Project Coordinator interviewed Paul Salon. Salon, a first generation Filipino American in his early 80's, enjoys collecting clams to share with friends at parties and frequently sells his clams to friends. He also sees it as a form of exercise. Also claims that clams are an excellent source of lowering his high cholesterol level. He was mainly collecting manila clams, moon snails, and seaweed. Preparation method is boiling and mixing his clams with dandelion leaves. Harvest location was next to the Vashon Island ferry docks at Lincoln Park Beach.
It was also important for the Project Coordinator to disseminate information about this project. Below is a summary of these contacts:

International Examiner: is a non-profit newspaper that provides the A&PI community news journal biweekly. In early June 1995, the Project Coordinator was invited to a newspaper interview regarding the Refugee Federation Service Center's seafood consumption study. The front page article focused on how the study is community based, not government conducted.

Asian and Pacific Environmental Network (APEN): San Francisco, California based and first organization in US to focus on A&PI environmental justice issues. Several discussions were held with the organization. Meetings were held with the Project Coordinator about similar projects conducted to assess and compare the relativeness of each other's projects. The Refugee Federation Service Center and APEN have established a strong ongoing communication and partnership.

The Seattle Times: Seattle, Washington's most widely read newspaper contacted the Project Coordinator to do a story on the seafood consumption study in June 1995. At the time, the study was picking up momentum, so an interview was not conducted. The newspaper heard about the study through the International Examiner story coverage.

President's Commission on Risk Assessment: in early July 1995, testimony was provided to the President's Commission on Risk Assessment. Project Coordinator spoke to delegates and audience of the commission to present the significance and demand of the seafood consumption study of A&PI. This information was included in the Commission's report (Commission on risk Assessment and Risk Management, 1996).

In late January, a meeting with Steven Gilbert, Ph.D. and Virginia McFerran (Environmental Health Department within the National Institute of Environmental Health Sciences) was held to discuss a partnership to address a U.S.EPA University/Community Partnership grant opportunity. A Memorandum of Agreement was established and it was decided that the University of Washington would subcontract the award to the Refugee Federation Service Center, if award is granted. The amount of $201,000 has been requested. This grant has been fully funded

Leadership Tomorrow (LT): an organization comprised of professionals and business leaders whose goal is to give back to the community through volunteerism. Their theme this year was environmental equity. In March, Laura Walker (Walker Company) and Phyllis Alleyne (King County) conducted a needs assessment with agencies currently serving specific immigrant communities to develop an understanding of environmental related issues and activities and link those agencies with People for Puget Sound. Their main goals was to develop collaborative approaches to developing environmental awareness of sources in the region. The A&PI Seafood Consumption Study intrigued the Leadership Tomorrow and recruited Project Coordinator to do a presentation which they were organizing for May 17, 1996.

The goal of the forum was to exchange ideas on how to raise environmental awareness in the community. Two key speakers were Pam Johnson (People for Puget Sound) and Connie Nakano (Project Coordinator, Refugee Federation Service Center). Audience was impressed and amazed with the community based structure which makes the seafood study so successful. Not only is it community based, but the Refugee Federation Service Center have developed strong partnerships with government agencies, community organizations, medical professionals, and others. Those who attended were still thinking about putting advisory signs and translating them into several languages. Project Coordinator explained the reasons why those methods are ineffective. The presentation was so successful that LT requested copies of the Project Coordinator's presentation notes.

Community Coalition for Environmental Justice: is a Seattle based non-profit environmental organization. Allen Forsberg, Program Coordinator, called to schedule a meeting to learn more about the seafood consumption study and community based structure. Main question he is interested in is "how to develop a culturally appropriate curriculum and environmental awareness activities." Forsberg interviewed the Project Coordinator to write an article in their newsletter in July 1996.

Puget Soundkeepers Alliance: The Project Coordinator reviewed a Tagalog language video at the request of the Puget Soundkeeper's Alliance and discussions were initiated regarding how this non-A&PI organization and the A&PI community can coordinate and enhance each other's activities.

USEPA Symposium on Susceptibility and Risk, Durham, North Carolina: Refugee Federation Service Center was invited to present a poster, titled the Asian and Pacific Islander Seafood Consumption Study at the forum. The forum was originally scheduled for February 1996, it is rescheduled for September 1996.

Forming of the Committees

In Phase 1 of this project, the Refugee Federation Service Center, a community-based organization, has accomplished substantial amount of work toward developing a work plan and study tool for the A&PI Seafood Consumption Study. Funding provided by the Region 10 office

of the U.S. Environmental Protection Agency and the U.S.EPA Office of Emergency Response and Remediation supported Phase 1 of this project. The planning operation encompassed the recruitment, establishment, and staffing of three committees: a) A&PI Community Steering Committee b) Technical Committee c) Advisory Committee. See Appendix A for details on committee function and membership.

The Project Coordinator was responsible for facilitating and maintaining written records of each committee meeting. The Project Coordinator also served as a liaison between the three committees to ensure that the study's goals and objectives are developed and designed. The study, which targets ten A&PI communities, derived its support from various active community organizations, such as the Vietnamese Friendship Association, Khmer Community of King County, Indochinese Refugee Association, as well as through linkages with traditional A&PI communities (i.e. Filipino, Samoan, Chinese, Korean, and Japanese).

The Committees include high ranking experts from US Environmental Protection Agency, University of Washington Fisheries, WA Department of Health, WA Department of Epidemiology, WA Department of Toxics Substance, WA Department of Ecology, The Boeing Company, National Oceanic and Atmospheric Administration, First Hill Clinic and Seattle/King County METROPOLITAN. Please see Appendices A and D for a list of the impressive array of experts committed to this project and selected resumes.

Committee Meetings

To meet the A&PI's goals and objectives, each committee meet on a regular basis for a total of over 20 meetings:

Community Steering Committee
1) 7/1/95 2) 8/21/95 3) 8/28/95 4) 9/25/95 5) 10/19/95 6) 11/13/95 7) 12/13/95 8) 1/22/96 9) 2/21/96

Technical Committee
1) 8/14/95 2) 9/11/95 3) 10/30/95 4) 11/29/95 5) 1/10/96 6) 1/31/96 7) 2/28/96

Advisory Committee
1) 9/18/95 2) 10/24/95 3) 12/11/95 4) 1/29/96

The outcome of these meetings was to develop solid working relationships, gain respect for each others expertise and knowledge, and develop an agreed upon work plan.

The composition of the Community Steering Committee is multi-ethnic. The study targets ten A&PI communities, therefore, the committee reflects the target population. The committee involves members of the Japanese, Filipino, Chinese, Samoan, Vietnamese, Cambodian, Lao

(Mien and Hmong), and Korean communities. Ten communities were selected because they wanted to be involved in this project and no single ethnic group could be identified that was more affected or more concerned than the others.

The A&PI Community Steering Committee determined the manner in which the other two committees could help this project by developing the following mission statement for this project:

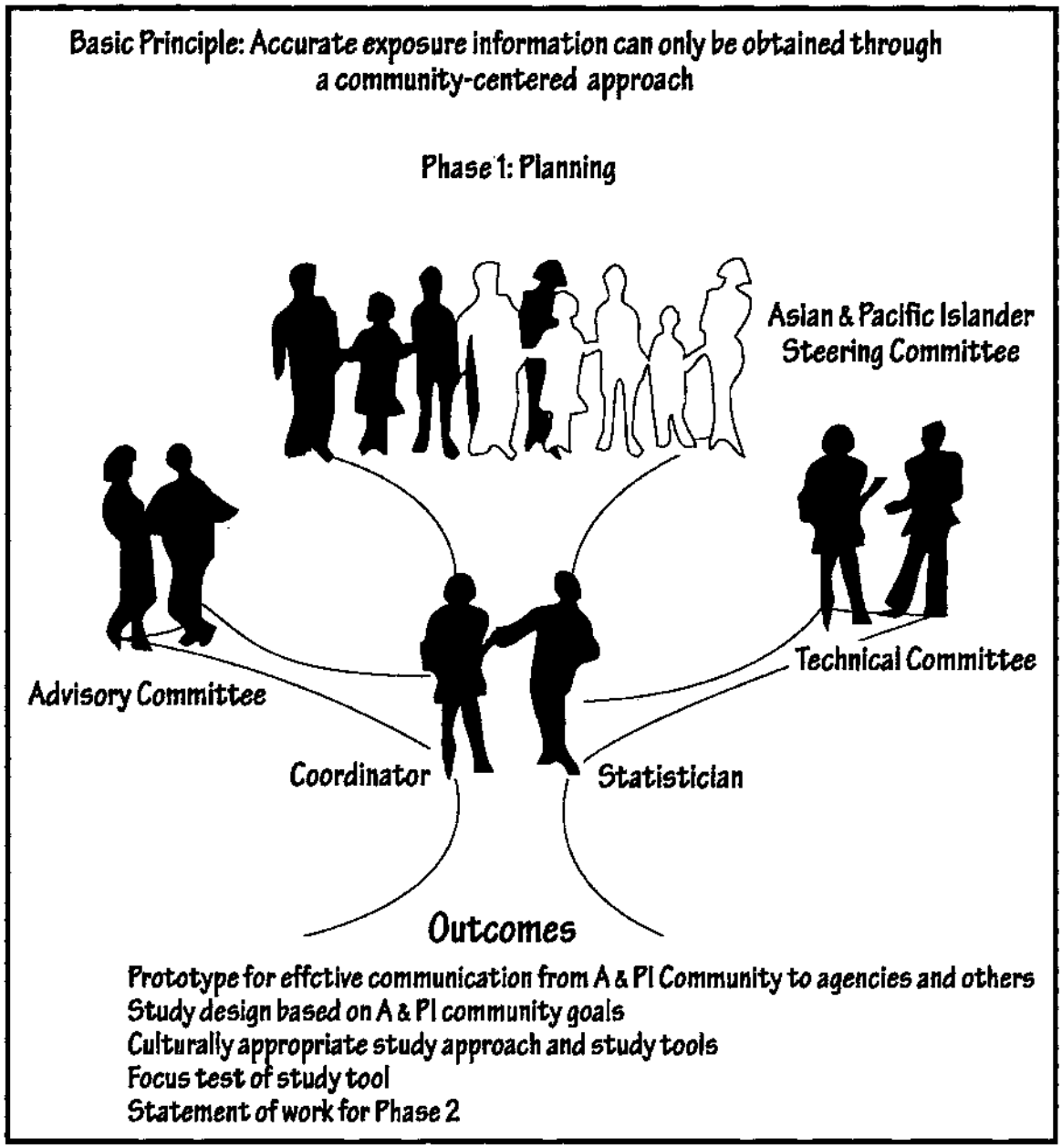
> "The seafood consumption study is a community based project, planned and carried out by the A&PI communities. The project's goals and objectives will be developed by an A&PI Community Steering Committee with feedback and the help of the Technical Committee and Advisory Committee. The project's goals should reflect the interests and concerns of the A&PI communities. Goals and objectives that do not reflect the interests of the majority of A&PI committee members are in conflict with the project's purpose to be a community based project."

The A&PI Community Steering Committee determined the manner in which the other two committees could help this project by developing the description of responsibilities for each of the committees.

Members of all the Committees were volunteers, and many hours of hard work were contributed to this project by everyone over many months. Consistent participation by these volunteers demonstrated the high level of concern for this issue and interest in accomplishing the seafood consumption study.

The Project Coordinator and the statistician were the only paid positions in this study. It was very important to have the statistician participate throughout the design of the study. Both the A&PI Community Steering Committee and the Technical Committee needed clarification of statistical constraints while developing the hypothesis, goals and questionnaire for the study. The interactions of all the groups is illustrated in Figure 2.

Figure 2. Model and Concept of the Asian and Pacific Islander Seafood Consumption Study



Planning Committees and Individuals

US EPA Intern

Refugee Federation Service Center worked with an intern from the Regin 10 U.S.EPA office to assist the part-time study coordinators move the project forward. The intern tasks included mobilizing committees, conducting outreach, and conducting meetings. The intern was later hired by the RFSC to take over as the full-time project coordinator upon completion of the internship. Length of internship was two and a half months.

Project Coordinator

The coordinator, Connie Nakano, was responsible for the overall management of the study. Tasks included: 1) being the chief liaison, coordinator, and direct community contact between the A&PI communities and all involved parties (i.e. Technical, Advisory, and Community Steering Committees) ; 2) hire, train, and supervise contract employees (i.e. study consultants, statisticians, focus group members, and translators) 3) prepare for and supervise the questionnaire implementation in Phase 2 and write the final study report. See appendix for resume.

Asian and Pacific Islander Community Steering Committee

The Community Steering Committee is responsible and committed 1) to provide the necessary cultural elements and approaches (i.e. language and ethnicity issues) to the development of the study 2) provide community contacts which will enable networking and outreach efforts 3) meet on a monthly basis, or as needed. Each member of the committee is affiliated with their respective ethnic community. The A&PI communities feel they are connected, understood, and share common barriers, such as language and ethnicity.

Technical Committee

The Technical Committee is responsible for the following: 1) design of a scientifically sound questionnaire while taking into account the cultural and language characteristics identified by the Community Steering Committee 2) provide technical assistance and methodology to the Community Steering Committee for the feasibility and planning of the study 3) meet monthly. The majority of members are survey experts and provide extensive fish consumption study experience to the seafood consumption study.

Advisory Committee

The Advisory Committee is comprised of industry, health care, and regulatory representatives with awareness of or interest in A&PIs. They provide recommendations to ensure the final

scientific documentation can be applied toward their respective industry, business, medical field, and regulatory agency.

Statisticians

The statistician team (Drs. Shiquan Liao and Nayak L. Polissar) consult on the data analysis content and procedures of the study. Main areas such as the sampling plan, data analysis, attending monthly meetings with the Community Steering Committee, and writing statistical sections of reports were their responsibilities. The team previously provided statistical consultation on the Tulalip and Squaxin Island Fish Consumption Study. See appendix for curriculum vitae.

Study Consultants

Kelly Toy and Gillian Mittelstaedt consulted on the design, development, strategy, and methods of the questionnaire. Kelly Toy also consulted on the development and implementation of the seafood models. Both study consultants were Project Coordinators of the Tulalip and Squaxin Island Fish Consumption Study (Toy et al., 1996). See Appendix A for resume.

Translators

The translator tasks were to translate the questionnaire developed and designed by the three key committees (i.e. Community Steering, Technical, and Advisory Committees) into 9 targeted languages. There was one translator for each language. After its translation, a Focus Group reviewed the materials for translation accuracy, cultural appropriateness, and clarity of questions.

Focus Group

The goal of the Focus Group was to review the translation accuracy, cultural appropriateness, and clarity of the questions in the questionnaire. Focus Group composed of 6 individuals (Cambodian, Lao, Samoan, Korean, Filipino, Vietnamese); one for each of the represented ethnic communities. Representatives from the Mien, Hmong, Chinese, and Japanese were unavailable. For explanation, please see "Lessons Learned."

Development of the Study Tool

A scientifically sound and culturally appropriate questionnaire was developed by the A&PI Community Steering Committee, Technical Committee, and Advisory Committee. The questionnaire was developed by all committees by meeting on a monthly basis. The Tulalip and Squaxin Island Fish Consumption Study was used as a model to develop the RFSC's study tool (Toy et. al., 1996). Please see Appendices I through R for versions of English and translated questionnaires.

The Community Steering Committee also considered the target audience for the study's results. Upon public release of the final seafood consumption study documents, the results will be available to all interested agencies. The study will be available to the A&PI communities, government agencies responsible for public health protection, researchers, universities, and the public. The results will provide essential information to target groups, as well as improve the ability to communicate relevant health related information.

Statement of Hypothesis

While the study will provide many kinds of data, the key hypothesis developed by the A&PI Community Steering Committee to be tested is that King County A&PI communities consume more seafood (both self-collected and purchased) than the typically expected amount of 6.5 grams per day. Consumption of 6.5 grams per day is the default assumption used to develop human health ambient water quality criteria under the Clean Water Act (U.S.EPA, 1980). This rate is estimated for the general population across the United States and does not take into consideration the dietary and cultural difference among different ethnic populations. In the A&PI Seafood Consumption Study, we will compare the study results to test whether the seafood consumption rate for A&PI communities as a whole in King County is greater than 6.5 grams per day. In 1996, revisions to the human health methodology for developing ambient water quality criteria are being considered. If proposed or final revisions are available during the data analyses in Phase 2, it will also be tested whether the A&PI consumption rate is greater than the revised default value for the typical person.

Also, we will test to see whether different ethnic groups in the A&PI communities have different seafood consumption rates for those ethnic groups with more than twenty respondents (expected to be Chinese, Japanese, Filipino, Vietnamese, and possibly Korean).

Target Population of Study

The Committees cooperatively decided the following attributes of the target population for this study. A unique feature is that the ten largest A&PI groups are included. The cultural considerations in this choice are discussed in the Lessons Learned section. This choice represents the consensus of the A&PI community and while it presents statistical challenges it may also present the future opportunity to develop hypotheses about the seafood consumption patterns of other diverse A&PI communities. The target population are as follows:

> Must be Lao, Mien, Hmong, Vietnamese, Cambodian, Chinese, Korean, Japanese, Filipino, or Samoan. These are the ten largest A&PI ethnic groups in Washington state.
>
> Must be a first or second generation US resident or inhabitant.

Must be residents or King County, which has the largest A&PI population in Washington State.

Must be seafood consumers; the percent of non-consumers will also be tabulated, but non-consumers will not be included in general consumption rates.

Participants must be 18 years of age or older due to 1) access through guardians 2) less accuracy from children or care takers 3) transportation problems.

After deciding that a face-to-face interview was the only way to obtain reliable information. The A&PI Community Steering Committee reviewed the questionnaire used in the Tulalip and Squaxin Island Native American Fish Consumption study. The A&PI Community Steering Committee decided that this questionnaire was a good tool to start with because these Native American tribes are also located along the Puget Sound in the state of Washington, have similar concerns about contaminated seafoods and have successfully used this tool in a study of their own (Toy et. al., 1996). Modifications to enhance the cultural relevance and address the A&PI community's hypothesis were made by the Committees in Phase 1.

The 200 sample size will be proportionally allocated to each of the ten ethnic groups based on the percentage of the population size of each group. It is anticipated that some of the ethnic groups (for example, Filipino, Chinese, Japanese, Korean, and Vietnamese) will have sufficient number of respondents for ad hoc analysis within each group. If the result of this study indicates significant difference in terms of seafood consumption among ethnic groups, future in-depth studies may be planned for those ethnic group or groups within the community of A&PIs. However, such in-depth studies are beyond the scope of this study and it is left for future discussion.

Questionnaire

The questionnaire was designed to focus on the frequency (number of seafood meals consumed per day, per week, per month or year, over the period of one year) and portion size of each meal. Respondents will be asked to consider the seasonal variations in seafood consumption: in season (fresh) or out of season (frozen). The questionnaire will distinguish between self-collected and purchased seafoods.

There are 43 different seafoods included in the questionnaire. Seafoods are divided into the following categories: A-anadromous, B-pelagic, C-freshwater, D-bottom, E-shellfish, and F-plants. Grouping of seafood species was based on their life history and distribution within the water column.

RFSC hired translators to translate the English version of the questionnaire into 9 languages. The questionnaire, however, was not translated to Japanese. The recruitment of the three positions was aided by the Community Steering Committee and included announcing job

positions in local A&PI newspapers and social service organizations around King County (see Appendix G). There was one translator for each language. After its translation, a Focus group reviewed the materials for translation accuracy, cultural appropriateness, and clarity of questions. Correspondingly, the Focus Group comprised of nine individuals; one for each of the represented ethnic communities. An additional task of the translators was to conduct an interview/test with Focus Group members to discuss specific issues and parts of the draft questionnaire. The questionnaire was revised based on the recommendations provided by the Focus Group. Translators worked one on one with the appropriate Focus Group members. Please see Appendix B for Focus Group evaluation questionnaires and Appendices I through R for translated and English questionnaires.

Some segments of the A&PI community, such as the Mien and Hmong have a written language of which only a small portion of the population is aware; therefore, the production of bilingual written materials may be inappropriate. Instead, communication tools such as video or slide productions are more appropriate and will be used in this study.

The questionnaire was not translated to Japanese because of budget constraints. The decision was left up to the Community Steering Committee. Their assessment was based upon the observation, knowledge, and experience within the A&PI community. They felt that the Japanese community were not a priority community with language barriers or issues. Seafood consumption was not a factor in determining whether or not to translate and Focus Group test the Japanese community.

Each translator was allowed two weeks to translate the 19 page questionnaire. There were nine translators, one from each ethnic population. Translators were recruited directly from the local A&PI community. Initially, all translators were required to participate in the Focus Group testing; however, because of time constraints the Mien, Hmong and Chinese translators were not available for Focus Group testing.

Sampling Procedure

Asian and Pacific Islanders consist of approximately 5% of the King County population. There is no sampling frame for this population. A probability sampling scheme prohibitively expensive. However, non-probability sampling has been successfully used in a number of fish consumption surveys (Landolt, et al., 1985; McCallum, 1985; Pierce, et al., 1981). Most of these studies used the method of "creel surveys" obtained by interviewing people fishing at public locations. Our survey will be a random sample from volunteers and persons listed on ethnic community rosters. Thus, it will be closer to a community sample than the creel surveys. The statistical analysis can be carried out in the usual manner with means, medians, confidence intervals, standard deviations, and standard errors. However, inference to the source population is less clear than in a community-wide probability sampling situation. There is potential bias in the estimates. The bias can partially be controlled by statistical methods: 1) from among the volunteers and names listed on rosters select a sample that reflects the age, gender and ethnic

composition of these ethnic groups in King county; 2) statistically model the influence of covariates on the consumption rate and use such covariates (for example, income) to adjust the estimated consumption rates to reflect a population profile that is more similar to that in the entire county. While this survey does not allow direct inference to the source population as a probability-based sampling scheme, it is far superior to the complete lack of information which is the present status of this community.

The sample will be collected from volunteers recruited through flyers at community locations with a high traffic or usage by the specific ethnic groups, as well as by drawing from rosters of these ethnic groups retained by churches, refugee organizations and ethnic community organizations (see Appendix H). We anticipate that the combination of volunteers and the partial rosters will have a fair coverage of the target population and the combined list of such individuals will be considerably larger than the sample size for this study. We will randomly select from the 1) group of volunteers and 2) the group of rostered individuals (50% for each source). Thus we will also compare selected individuals drawn from rosters with those drawn from the volunteer list. If there is agreement between the consumption rates for these two groups, then we will have greater confidence that the estimated consumption rates for the source population are unbiased or biased in the same direction.

In summary, confidence intervals, standard errors and other inferential statistics will be developed, and hypothesis tests will be carried out, but these will always need to bear the caveat that the population represented by the sample is only an approximation to the population of ultimate interest. The selected sample will be screened for inclusion requiring that: 1) they consume at least some form of one of the fish species of interest, and 2) they fit the demographic profile for the sample and as selection proceeds, increasingly stringent requirements will be set in order to match the demographic profile of the ethnic groups in the county population. Ethnic groups will be considered based on the ten ethnic groups which are targeted in the study, which was determined by the Community Steering Committee. For a list of requirements to be selected to participate in the study, please see section titled Target Population of Study.

Focus Group Testing

Through the week of April 29-May 3, 1996, Focus Group sessions took place for the following ethnic communities: Korean, Samoan, Filipino, Cambodian, Vietnamese, and Lao. Focus Groups were critical in reviewing and assessing the content, format, cultural elements, and effectiveness of seafood visual aids. Actual seafood models were unavailable. All Focus Group testings occurred at the Refugee Federation Service Center. The one on one sessions lasted between 2.5-3 hours. Morning and afternoon sessions were available. Translators were paired with a Focus Group member of the same ethnic community to conduct a practice interview. The goal of the session was to result with a final draft questionnaire product that is scientifically sound, culturally appropriate, and approved by the representative community member

Half of the sessions involved reviewing, correcting, and recommending changes and additions to the questionnaire. The second half involved conducting a one on one practice interview implementing the visual aids and recommendations. The final tasks required the translator and Focus Group member to complete a written evaluation form to critique the resulting questionnaire (see Appendix B). Discussions followed if necessary.

Focus Group Results

The first group was the Korean community. Recommendations and comments generated during session are the following:
-Problems in accurately translating the names of species in Korean language;
-Difficult to reach consumption chart such as the one on page 3 of the questionnaire. Interviewer and interviewee confused to how to answer the questions;
-Korean translations were fine-tuned to read more smoothly;
-Under the questions asking how individuals prepare seafoods - suggested "marinate" to be included;
-Questions relating to individual's income - are we asking for gross or net income?

Overall, the questionnaire was rated as excellent. The language, translation, questions, and format are excellent.

Samoan

-Consumption chart on page 14 asks if the species are consumed whole, whole with stomach removed, etc. -commented that "whole" literally implies the entire clam (shell included) - change to "whole meat;"
-Income questions are too personal - what is the relevancy of asking it;
-Location questions on page 4 (no. 2 & 3) should include Puget Sound, surrounding lakes, salt water, freshwater, etc. - should be specific as possible;
-The map used during the Focus Group did not include Whidbey Island - during actual interview, Whidbey Island and wider Puget Sound should be included.

Questionnaire is rated excellent, although interview's directions are too lengthy at times.

Lao

Comments and recommendations were very few. Focus Group session took the shortest time among the ethnic communities. Page 10, no. D3 should add a Lao cultural preparation method - uncooked salad. The questionnaire is excellent.

Vietnamese

Two Focus Group members and one translator participated in the Focus Group Testing. Community Steering Committee advised that cultural and language elements are strict and should be examined very closely. The names of species are complicated to translate to Vietnamese language. Also, the group had difficulty in identifying the species, even though actual models of clams and fish were provided. For instance, in Vietnam, the cockle shells are half of the size of the ones collected in Puget Sound. The group avoided to quickly respond to consuming such seafood because they look unfamiliar. This may become a problem during the actual questionnaire implementation; may lead to inaccurate data. The evaluation forms which the group completed at the end of session may also be inaccurate because they all responded similarly; they may have shared their responses.

Cambodian

According to the translator, the questionnaire was difficult to translate because many of the species asked are unfamiliar to Cambodia and its culture. Many times, the English words remain as a substitute; it should not be a problem if the seafood models are used. Overall, the questionnaire was rated excellent and no other major problems

Filipino

Focus Group testing was very useful in this case because there needed to be lot of translation adjustments and corrections. The questionnaire is translated into Tagalog. However, because the Illocano is the translator's first dialect, the Tagalog translation was inaccurate at times. The same issue of having difficulty in translating some names of species to Tagalog occurred. Species were left in English.

Focus Group testings were not conducted on Mien, Hmong, Chinese, and Japanese communities. For explanation, please see "Lessons Learned."

CONDUCTING THE PHASE 2 STUDY

Workplan

Phase 2 Specific Objectives

~ Implement seafood consumption survey
~ Construct working relationships and structures between community members and researchers
~ Analyze data results

~ Produce draft scientific documentation
~ Production of final scientific documentation
~ Circulate scientific documentation

Target Population and coverage

The ethnic groups listed in the Target Population of Study section under the Development of Study Tool section of this proposal are the largest A&PI communities in Washington State. All participants of the study must reside within King County, Washington. The study participants must be seafood consumers; the percent of non-consumers will also be tabulated, but non-consumers will not be included in the general consumption rates. Participants must be 18 years of age or older. Ethnic population totals (all ages) for King County from the 1990 Census are: Chinese 25,710; Filipino 24,558; Japanese, 11,030; Cambodian, 4,983; Lao, 4,328; Samoan, 2,251; totaling 72,860.

Sample Size and Precision

The sample is not strictly a random sample as discussed above. However, the notions of precision and width of confidence intervals related to probability samples can be used as a guide for sample size. The driving factor in sample size precision is the standard deviation of the response. We note that in a number of previous surveys (those from the references cited above) a standard deviation on a logarithmic scale implied by 5th and 95th percentiles reported in each of the studies was quite constant: 1.02-1.22. In calculating the sample size, we use a standard deviation of 1.15 log scale as a guide for sample size. Our goal will be to interview 200 individuals, justified as follows: a sample size of 200 and a logarithmic standard deviation of 1.15 yields an expected width of a 95% confidence interval of +/- 17% of the mean. This is moderate precision and acceptable, given the resources available. In order to interview 200 respondents, we will need to contact 268 individuals, allowing for a 20% non-response rate and a 5% missing data rate for interview individuals.

Pilot test

A Pilot test will be carried out to provide feedback on the questionnaire, interviewing procedures and effectiveness of the display models, photos and maps. Please see the Display Models section for more information.

We will select 10 respondents (with at least one from each ethnic group). Pilot test results will not be included in the final analysis. The pilot test members will be selected from the list of volunteers and rosters in order to give the questionnaire a 'workout' in encountering a number of

situations that may occur in practice. The pilot sample will consist of the following representation: (one person may satisfy more than one requirement)

~ At least one member of each ethnic group
~ At least one person from each of the age groups 18-39, 40-64, 65+
~ Approximately one-half males and one-half females
~ At least 3 members each of first and second generation
~ At least 2 people for whom fishing or collecting is a major source of seafood consumption

Following the field pilot test, the questionnaire will be revised and re-translated, if needed, based on feedback from the interviewers. The revised questionnaire will be used in the final study.

Data Collection Method

A letter announcing participant selection will be sent out at least 2 months prior to the actual interview. After the notices have been sent, interviewers will conduct follow-up telephone calls to screen candidates. If candidates meet the study targeted population criteria, interviewers will schedule appointments. Face-to-face interviews will be conducted. Interviews will take place at several convenient community locations chosen by the survey participant (respondent's residences, churches, agencies, etc.) within King County, Washington and conducted by trained interviewers who are fluent in English and one of the targeted ethnic languages. The interviewer will read from the translated questionnaire and record the participant's answers. The completed questionnaire will be reviewed by the Project Coordinator and feedback will be provided frequently to the interviewers to maintain a high level of quality. The interview is expected to take 5-60 minutes. The appropriate compensation for taking part in the study is a check for cash or a certificate for food purchase and will be presented at the conclusion of the interview.

Interviewers and training

The qualifications of each interviewer is critical to the study. All interviewers must have strong bilingual and bicultural capabilities. Training will consist of extensive review of the questionnaire and training given by a qualified individual. The Trainer will frequently consult with the Technical and Advisory committee members to ensure adequate understanding of the scope and nature of the project and data collection procedures. Finally, a series of mock training interviews to ensure accurate and standardized data collection procedures.

Quality Control

In addition to the double key-entry, data will be subject to on-screen edit checks (within field checks for values in the possible range during data entry and between-field checks for impossible relationships). 10% of the respondents will be re-interviewed either in person or by telephone on

a subset of the questions by an interviewers other than the original interviewer. In addition, the data will be reviewed for plausibility during data analysis (yielding detection of outliers and unusual results).

Data Analyses and Statistical Procedures

As discussed in the Statement of Hypothesis section, the default rate of seafood consumption is 6.5grams/day (U.S.EPA, 1980; Javitz, 1980). However, this rate was estimated for the general population across the United States and the study design did not take into consideration the imortance culture features of ethnic populations. Studies on minority populations in the Pacific Northwest found that they consume more seafood than the default value of 6.5 grams/day (CRITFC, 1994; Toy, et al., 1996). In this study of A&PI seafood consumption, we will compare the study result and test whether the seafood consumption rate for A&PI communities as a whole in King County is greater than 6.5 gram/day. If available, the revised default rate for the typical person will also be tested.

We will carry out tests to determine if different ethnic groups in the A&PI communities have different seafood consumption rates and compare the difference in consumption rates for those ethnic groups with more than 20 respondents (expected to be Chinese, Japanese, Filipino, Vietnamese, and possibly Korean).

Descriptive statistics calculated from this self-weighting sample will be the mean, median, and 5th, 25th, 75th, and 95th percentiles of consumption. The consumption will be expressed as grams/kilogram of body weight/day. 95% confidence intervals for the mean consumption rate (subject to the interpretation noted above) will be calculated based on t-statistics. We expect that the data will be lognormally distributed, as has been found in previous surveys, and analysis will be typically carried out on logarithmically transformed data.

Consumption rates for the combined group will be presented by age, gender, and income group. We will build a multivariate model for fish consumption using these covariates along with ethnicity and any other key variables. During the sampling procedure we will control for age, gender, and ethnicity in sampling to create a sample that is similar in profile to the relevant King County ethnic population. We will not be able to control for income during the sampling. The multivariate model may help to adjust for income and other factors that may affect consumption rates.

Results of the survey will be presented in tabular and graphical form. The tabular results will include the mean, median, percentile, standard deviation, standard error and confidence intervals for the whole group and subgroups noted above. Graphical displays will include histograms of fish consumption as well as box plots when consumption is compared across subgroups.

In summary, statistical analysis will produce, per ethnic group with at least 20 members:

~ mean, median, standard error of the means, and percentiles of fish consumption
~ confidence intervals for the mean

For combined ethnic groups:

~ mean, median, standard deviation, standard error of the means, and percentiles of consumption rates
~ confidence intervals for the mean
~ consumption rates by age, gender, and income
~ test of the hypothesis that consumption rate = 6.5grams/day
~ test of hypothesis that all ethnic groups have the same consumption rate
~ multivariate model for consumption rate
~ model-based estimated consumption rate adjusted for important covariates

Display Models

A workshop was held with the Project Coordinator of the Tulalip and Squaxin Island Fish Consumption Study, to demonstrate the making of the seafood models with the Community Steering Committee. The workshop lasted for two and a half hours.

Physical display models will be used to aid the study respondents in identifying and estimating the amounts of seafood consumed. Physical display models will include the following uncooded seafoods: salmon, herring, tilapia, perch, crab, sea urchin, sea cucumber, seaweed, kelp, moon snail, abalone, shrimp, mussels, oysters, scallops, cockles, macoma clams, razor clams, horse clams, butter clams, manila clam, and littleneck clams. A surrogate model for the geoduck and lobster will be used. The horse clam model, which resembles a young geoduck clam will be used as the geoduck model. The shrimp model will be used as a lobster model. There will be no bullfrog model. A list of seafood species is included in Appendix C. There will be two types of physical display fish models. One is a fillet and the other is a bowl of chopped/minced fish. It would be weighed at 4 ounces. The models will aid the study respondents in identifying the amount of fish used in cooking or preparation.

In the Pilot Test, the effectiveness of the display models will be evaluated. It will be determined whether the models are correctly recognized for what they represent and whether using uncooked examples (instead of cooked) are the best to aid participants judge amounts consumed.

Fish models

A one pound salmon fish fillet will be weighed and measured using a food scale and calipers. The fish fillet will be created by wrapping a fish fillet in cellophane and cameo plaster wrap and applying it to the fish to create a mold. When the mold hardens, the fish will be removed. The

mold will then be filled with a plaster mixture and allowed to dry. After drying, the mold will be painted to resemble a salmon fillet. The salmon fillet is used for all fish models except for herring, tilapia, and perch. The same process will be used to create the other fish models. Excluding the salmon fillet, all models will be weighed in grams with a beam balance.

Shellfish models

Scallops, mussels, sea cucumber, sea urchin, oysters, squid, shrimp, and crab models will be obtained at a grocery store. Abalone, moon snail, macoma clams, cockles, razor clams, manila, littleneck, seaweed, kelp, butter and horse clams will be collected at a local beach in the Puget Sound area of Seattle, Washington. Meat will be removed and shells will be glued together and mounted on foam core board. A single estimate of meat weight for each species was determined by weighing the most common parts eaten. Average meat weight for mussels, manila and littleneck clams were determined by measuring the average length of all collected animals and comparing it with the meat weight of animals of that size. Six clams or six mussels will be considered one portion size. Interview technicians will show four portions of clams and three portions of mussels when conducting the interview. Fresh crab and squid will be kept frozen until needed by the interviewers.

Use of Photographs

Photographs will also accompany all seafood models to identify the specific seafood. For several A&PI populations, they do not identify certain seafood by a particular name. For instance, clams such as butter clam and razor clam may not be broken down into specific names by the A&PI consumer.

Use of Maps

Maps will be used during the interview so study respondents can determine whether they collect their seafood within the Puget Sound. Many respondents will not know what body of water they collect from without a visual aid to help them locate their usual site of collection.

LESSONS LEARNED (TRIUMPHS AND CHALLENGES)

One of the challenges of this project was developing linkages within all A&PI communities and involving all ten targeted communities to develop a feasible and focused study. This challenge required considerable outreach, planning, and networking which was accomplished through trust with the community members. Within the A&PI Community Steering Committee, ten targeted communities are involved in developing a culturally relevant study. It is especially a challenge because not all A&PI communities think and operate alike. Therefore, the Community Steering Committee employed a "consensus" form of decision-making, requiring all members on the

committee to come to 100% agreement in order for any decisions to pass. Community Steering Committee developed a consensus among all members about plausible approaches. Decisions were built upon existing expertise and knowledge within the community.

The A&PI Seafood Consumption Study Phase 1 took a long time to complete because when the study first took off, the Refugee Federation Service Center only had a part time project coordinator. The study began to pick up momentum once a full time coordinator was hired. It was found that a considerable amount of personal contact was needed in order to recruit and coordinate with the Community Steering Committee.

The Community Steering Committee felt comfortable with the Project Coordinator because she understood and identified with the issues and concerns of the A&PI communities. Phase 1 was successful because the Project Coordinator was a recognized member of the local A&PI community. Early unsuccessful attempts to make contacts with the A&PI community included a Filipino-American who was technically skilled but not connected with the local A&PI community, then a Caucasian who was involved and well known to the local A&PI community.

The statistician for this project was Chinese American. The Community Steering Committee trusted and would listen to the statistician. He was invited to all the monthly Community Steering Committee meetings. His involvement with the Community Steering Committee was very important because the Community Steering Committee's concepts sometimes challenged the study design.

Another challenge encountered was that the environmental movement is new to the Seattle area A&PI community. When considering the refugee and immigrant communities, environmental issues are thought about only after housing, employment, language, and cultural shock have been addressed. The A&PI community did not know that they could do anything about their environment and were enthusiastic when they understood they could.

As mentioned earlier, Focus Group testings were not conducted for Mien, Hmong, Chinese, and Japanese communities. Translation nor Focus Group testing was conducted for the Japanese community. For an explanation, please see "Target Population of Study." The following are the reasons why Mien, Hmong, and Chinese were not Focus Group tested: low Focus Group wage; limited work hours; and inconvenient work hours. The Focus Group wage was $8 an hour for three hours of work (a total of $24). Focus Group occurred during the hours of 9-5 PM on weekdays. Many participants were interested and given the option of attending the morning or afternoon session. Nevertheless, the hours were inconvenient because most were employed and were unable to take time off of their jobs. For those who were interested and unemployed felt that $8 an hour was not appealing or worth their time for a limited three hour job offer. Finally, there were individuals who have previously translated and participated on Focus Groups who felt that this type of job demanded a much higher wage

THE FUTURE: NEXT STEPS

Community/University Partnership

In order to implement the study method designed in Phase 1, the Refugee Federation Service Center and the University of Washington, Department of Environmental Health developed a Memorandum of Agreement (MOA) to explain the responsibilities and tasks required from the two agencies. Both agencies have agreed to conduct research to understand and communicate seafood consumption risk to the A&PI communities. The MOA is effective during Phase 2 and Phase 3. A copy of the MOA is included in the Appendix E.

Phase 3 - Communication/Outreach

Future plans for the study includes an educational/awareness curriculum. This third and final phase unites the study plan, community input, and science to produce the educational tools and teaching efforts of the community and university team.

Phase 3 Objectives

~ Plan, develop, draft educational/communication tool based on scientific documentation
~ Build relationships between research scientists and community members
~ Conduct assessment of educational/communication tool
~ Circulate educational/communication tool
~ Evaluate whether the project goals were met

Education/Communication Tools

Slide show tool: A&PI communities advocate the development and design of a culturally appropriate slide show tool as an effective and appropriate educational module because a slide show tool can reach populations with low or no literacy. Some segments of the A&PI community, such as the Mien and Hmong have a written language of which only a small portion of the population is aware; therefore, the production of bilingual written materials may be inappropriate. The slide show will be available to government agencies and other community groups as well.

Development of educational tool - planning and designing: The design and planning of the informational slide show tool will include participation from the intended population, the A&PIs, and environmental research scientists. Members who served on Phase 1's A&PI Community Steering Committee will staff Phase 3's educational planning committee. University of Washington communication experts will work directly with the community (Community Steering Committee) to recognize issues related to seafood gathering and consumption among A&PIs. Facilitation of the educational planning tool will depend on the results of the Seafood Consumption questionnaire, implemented in Phase 2. A draft of the slide presentation will be

routed to local A&PI health clinics, educational institutions, hospitals, social service agencies, and churches appropriateness. The Community Steering Committee and University of Washington researchers will modify the tool according to the responses from the testing agencies - refer to previous "Lessons Learned", as described earlier.

Scientific documentation: The documentation will act as an educational tool, but will target regulatory agencies, university researchers, risk assessors, and other professionals. It will include findings on consumption rates, species types, parts of species, and methods of preparation. This documentation will be distributed by means of the Internet and hard copy.

Proposed Schedule

The following details a month by month outline of activities foreseen for Phase 2 and 3.

Months 1-4

~ Recruit and hire interviewers from the A&PI community
~ Recruit researchers from the University of Washington for Technical Committee
~ Mail letters and post fliers to recruit sample selection
~ Begin Focus Group testing

Months 5 and 6

~ Conduct final Focus Group pilot testing
~ Train interviewers
~ Select sampling frame and a random sample of subjects

Months 7-12

~ Implement survey interviewing: begin interviewing community members
~ Recruit and increase the membership of the Community Steering Committee for educational planning
~ Conduct re-interviews for validity check
~ Connect with researcher to discuss progress of questionnaire implementation

Months 13-15

~ Analyze data collected through questionnaire
~ Write draft report on seafood consumption
~ Circulate report for critical review

~ Begin detailed planning for Phase 3 (education)
~ Draft educational/communication tools

Months 15-16

~ Finalize report on fish consumption and circulate for comments on educational implications
~ Finalize educational tool materials

Months 17-20

~ Finalize draft of educational/communication tools
~ Circulate draft for comments
~ Develop plans for translation and distribution
~ Conduct Focus group testing for tools

Months 20-21

~ Finalize tools

Months 22-24

~ Circulate the education and development tools
~ Hold committee meetings and focus groups to evaluate effectiveness
~ Evaluate Outreach efforts
~ Final report submitted

Phase 2 & 3 Budget

Please see Appendix F.

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Washington State Department of Health. (1991)(1991). Memorandum from DirectorKristine Gebbie to Joseph Blum, Director of Fisheries. "Memorandum Concerning Contamination in Sea Cucumbers" Olympia, WA.

Wekell, John C., Lorenzana, Roseanne, Hogan, Mara and Barnett, Harold (1996). Survey of Paralytic Shellfish Poison in Puget Sound Predatory Gastropods. Journal of Shellfish Research 15 (2): 231-236.

West, James E., and O'Neill, Sandra (1995). Accumulation of Mercury and Poly Chlorinated Biphenyls in Quill back Rockfish from Puget Sound; Proceedings from Puget Sound Research; Puget Sound Water Quality Authority, Olympia, Washington.

Appendix A.

Qualifications of Committees and Individuals

BIOGRAPHICAL SKETCH

Connie Yuki Nakano **Project Coordinator**

Seattle Central Community College, Seattle — Grantsmanship Training, 1995
University of Washington, Seattle — Baccalaureate in English Literature, 1994

Employment

- **Refugee Federation Service Center, Seattle, WA (8/95 - present)**
  Project Coordinator

Establish and organize community-oriented communication network between all functioning committees and personnel involved in the current phase of the Asian and Pacific Islander Seafood Consumption study. Supervise and facilitate the development of a draft scientific and culturally appropriate questionnaire. Conduct monthly discussions with participating committees. Identify and coordinate activities and resources with other Asian and Pacific Islanders throughout the US to determine similar projects. Prepare monthly written and oral reports and records to the US Environmental Protection Agency.

- **Washington Toxics Coalition, Seattle, WA (12/94 - 4/95)**
  Logistics Coordinator

Developed and implemented logistical strategies in the coordination of a regional three day environmental justice, social justice, and labor conference.

- **Velma Veloria for Washington State Representative Campaign, Seattle, WA (5/94-12/94)**
  Volunteer and Development Coordinator

Supervised the coordination and recruitment of volunteers from Asian and Pacific Islander community, organizations, university level students, and others. Managed campaign fund raisers resulting in an increase of donations to campaign.

- **American Civil Liberties Union, Seattle, WA (8/95-5/94)**
  Legal Complaint Counselor

Performed counseling, complaint assessments, and referral and information intake.

Experience

- **US Environmental Protection Agency, Region Ten, Seattle, WA (5/94-8/94)**

Interacted with and gained understanding of US EPA environmental justice strategies related to seafood exposure in Region Nine and Ten. Provided support to the Refugee Federation Service Center in planning and development of the Asian and Pacific Islander Seafood Consumption Study.

Shiquan Liao, Ph.D.
StatPro Consultants
7127 NE 167th Street
Bothell, WA 98011
(206)489-0528

Ms. Connie Nakano
Project Coordinator
Seafood Consumption Study
of Asian and Pacific Islander Community
7101 Martin Luther King Jr. Way South
Seattle, WA 98118

Dear Ms. Nakano,

I am writing to express my support for the proposed Seafood Consumption Study of Asian and Pacific Islander Community. I will function as a statistical consultant on behalf of StatPro Consultants in the area of survey design, data analysis, and the production of final report.

Sincerely,

Shiquan Liao, Ph.D.

Enclosure: CV

Shiquan Liao, Ph.D. **Statistician/Research Analyst**

Yunnan University, Kunming, China	B.S.	1982	Mathematics
University of Washington, Seattle	M.S.	1987	Quant. Resource Mngmt
University of Washington, Seattle	Ph.D.	1994	Quant. Science/Biostat

- *Statistical Consultant - Statistics and Epidemiology Research Corporation, Seattle (1990 -)*
- *Statistical Consultant - The Mountain-Whisper-Light Statistical Consulting, Seattle (1990 -)*
- *Biostatistician - Northwest Hospital, Seattle (1994 - 1995)*
- *Research Associate/Biostatistician - Children's Hospital and Medical Center, Seattle (1989 - 1995)*
- *Statistical Consultant/Data Analyst - Skalski Statistical Service, Seattle (Summer only, 1990 - 1994)*
- *Research Assistant - The University of Washington, Seattle (1988 - 1994)*
- *College Lecturer of Mathematics and Statistics, Beijing Forest University, China (1982 - 1985)*

Publications

1. Shumway-Cook, A., Wm. Gruber, M. Baldwin and S. Liao. The Effect of Exercise on Balance, Mobility and Fall Risk in Community Dwelling Older Adults. (submitted).
2. Rivara, J., K. Jaffe, N. Polissar, G. Fay, S. Liao and K. Martin. Predictor of Family Functioning and Change Three Years Following Traumatic Brain Injury in Children. (submitted).
3. Massagli, T., K. Jaffe, N. Polissar, S. Liao and G. Fay. Neurobehavioral Sequelae of Severe Pediatric Traumatic Brain Injury: A Cohort Study. *Arch Phys Med Rehabil.* (in press).
4. Jaffe, K., N. Polissar, G. Fay and S. Liao. Pediatric Traumatic Brain Injury: Recovery Trends over Three Years. *Arch Phys Med Rehabil.* 1995; 76:17-26.
5. Fay G., G. K. Jaffe, N. Polissar, S. Liao, J. Rivara and K. Martin. Outcome of Pediatric Traumatic Brain Injury at Three Years: A Cohort Study. *Arch Phys Med Rehabil.* 1994; 75:733-741.
6. Rivara, J., K. Jaffe, G. Fay, N. Polissar, K. Martin, H. Shurtleff and S. Liao. Family Functioning and Injury Severity as Predictors of Child Functioning One Year Following Traumatic Brain Injury. *Arch Phys Med Rehabil.* 1994; 75:369-379.
7. McDonald C., K. Jaffe, G. Fay, N. Polissar, K. Martin, S. Liao, and J. Rivara. Comparison of Indices of Traumatic Brain Injury Severity as Predictors of Neurobehavioral Outcome in Children. *Arch Phys Med Rehabil.* 1994; 75:328-337.
8. Polissar, N., G. Fay, K. Jaffe, S. Liao, K. Martin, H. Shurtleff, J. Rivara and H.R. Winn. Mild Pediatric Brain Injury: Adjusting Significant Levels for Multiple Comparisons. *Brain Injury* 1994; Vol. 8, No. 3:249-264.
9. Rivara, J., K. Jaffe, G. Fay, N. Polissar, K. Martin, H. Shurtleff and S. Liao. Family Functioning and Children's Academic Performance and Behavior Problems in the Year Following Traumatic Brain Injury. *Arch Phys Med Rehabil.* 1993; 74:1047-1055.
10. Fay G., K. Jaffe, N. Polissar, S. Liao, K. Martin, H. Shurtleff, J. Rivara and H.R. Winn. Mild Pediatric Brain Injury - A Cohort Study. *Arch Phys Med Rehabil.* 1993; 74:895-901.
11. Toy, K., G. Gawne-Mittelstaedt, N. Polissar and S. Liao. 1995. A Fish Consumption Survey of the Tulalip and Squaxin Island Tribes of the Puget Sound Region. Tulalip Tribes, Natural Resources Department, 7615 Totem Beach Road, Marysville, WA 98271, Technical report.

BIOGRAPHICAL SKETCH

Give the following information for the key personnel and consultants listed on page 2. Begin with the Principal Investigator/Program Director. Photocopy this page for each person.

NAME	POSITION TITLE	BIRTHDATE *(Mo., Day, Yr.)*
Nayak Lincoln Polissar, Ph.D.	Biostatistical Consultant	8/30/39

EDUCATION *(Begin with baccalaureate or other initial professional education, such as nursing, and include postdoctoral training.)*

INSTITUTION AND LOCATION	DEGREE	YEAR CONFERRED	FIELD OF STUDY
University of California, Berkeley	B.A.	1966	Mathematics
Princeton University, New Jersey	M.A.	1968	Statistics
Princeton University, New Jersey	Ph.D.	1974	Statistics

RESEARCH AND/OR PROFESSIONAL EXPERIENCE: Concluding with present position, list in chronological order previous employment, experience, and honors. Include present membership on any Federal Government Public Advisory Committee. List, in chronological order, the titles and complete references to all publications during the past three years and to representative earlier publications pertinent to this application. DO NOT EXCEED TWO PAGES.

Professional Experience:

Demographic Intern, The Population Council, New York City, 1967
Statistical Consultant, New Jersey Neuro-Psychiatric Institute, 1967-1968
Computer Clinic Consultant, Princeton University Computer Center, 1967-1968
Research Assistant, Statistics Department, Princeton University, 1968
Field Associate, Thailand and Indonesia, The Population Council, 1969-1971
Teaching Assistant, Statistics Department, Princeton University, 1974
Assistant Member, Fred Hutchinson Cancer Research Center, Seattle, Washington, 1974-1982
Associate Member, Fred Hutchinson Cancer Research Center, Seattle, Washington, 1982-1989
Assistant Professor, Department of Biostatistics, University of Washington, 1974-1982
Associate Professor, Department of Biostatistics, University of Washington, 1982-1988
Affiliate Associate Professor, Department of Biostatistics, University of Washington, 1989-
Senior Consultant, Statistics and Epidemiology Research Corporation, 1989-
CEO, The Mountain-Whisper-Light Statistical Consulting, 1989-

Honors

California State Scholarship, 1957
Navy Training Scholarship, 1957
NIH Traineeship, 1966-68
Distinguished Honorary Citizenship, Washington State, 1983

Selected Journal Publications (out of 70):

Boatman ES, Merrill T, O'Neill A, Polissar L, Millette JR: Use of quantitative analysis of urine to assess exposure to asbestos fibers in drinking water in the Puget Sound region. Environ Health Persp 53: 131-9, 1983.

Polissar L, Severson RK, Boatman ES: A case-control study of asbestos in drinking water and cancer risk. Am J Epidemiol 119:456-71, 1984.

Woods JS, Polissar L, Severson RK, Heuser LS: Soft tissue sarcoma and non-Hodgkins lymphoma in relation to phenoxy herbicide and chlorinated phenol exposure in Western Washington. JNCI 78(5): 899-910, 1987.

Hughes J, Polissar L, van belle B: Power of health effects studies of communities surrounding arsenic producing industries. International J of Epidemiology 17: 407-13, 1988.

Woods J, Polissar L: Non-Hodgkins lymphoma among phenoxy herbicide-exposed farm workers in western Washington state. Chemosphere 18: 401-6, 1989.

DiGuiseppi CG, Rivara FP, Koepsell TD, Polissar L: Bicycle helmet use by children; evaluation of a community-wide helmet campaign. J Am Med Assoc 262: 2256-61, 1989.

Polissar L, Lowry-Coble K, Kalman DA, Hughes JP, van Belle G, Covert DS, Burbacher TM, Bolgiano D, Mottel NK: Pathways of human exposure to arsenic in a community surrounding a copper smelter. Environmental Research 53: 29-47, 1990.

Kalman DA, Hughes J, van Belle G, Burbacher T, Bolgiano D, Coble K, Mottel NK, Polissar L: The effect of variable environmental arsenic contamination on urinary concentrations of arsenic species. Environmental Health Perspectives 89: 145-51, 1990.

Rivara JB, Fay G, Jaffe KM, Polissar NL, Martin K: Predictors of family functioning one year following traumatic brain injury in children. Arch Phys Med Rehabil 73(10): 899-910, 1992.

Swenson ER, Robertson HT, Polissar NL, Middaugh ME, Hlastala MP: Conducting airway gas exchange: diffusion related differences in inert gas elimination. J Appl Physiol 72: 1581-8, 1992.

Selected Publications (continued):

Jaffe KM, Fay G, Polissar NL, Martin K, Rivara JB, Winn HR: Severity of pediatric brain injury and neurobehavioral recovery at one year: a cohort study. Arch Phys Med Rehabil 74: 587-595, 1993.

Fay GC, Jaffe KM, Polissar NL, Liao S, Martin K, Shurtleff H, Rivara J'M, Winn HR: Mild pediatric traumatic brain injury - a cohort study. Arch Phys Med Rehabil 74: 895-901, 1993.

Rivara JB, Jaffe KM, Fay GC, Polissar NL, Martin KM, Shurtleff H, Liao S: Family functioning and injury severity as predictors of child functioning one year following traumatic brain injury. Arch Phys Med Rehabil 74: 1047-55, 1993.

Domino KB, Swenson ER, Polissar NL, Lu Y, Eisenstein BL, Hlastala MP: Effect of inspired CO2 on ventilation and perfusion heterogeneity in hyperventilated dogs. J. Appl. Physiol. 75(3): 1306-14, 1993.

Jaffe KM, Massagli T, Martin K, Rivara J'M, Fay G, Polissar NL: Pediatric traumatic brain injury: acute and rehabilitation costs. Arch Phys Med Rehabil 74:681-686, 1993.

Malins DC, Holmes EH, Polissar NL, Gunselman SJ: The etiology of breast cancer: characteristic alterations in hydroxyl radical-induced DNA base lesions during oncogenesis with potential for evaluating incidence risk. Cancer 71(10): 3036-3043, 1993.

Polissar, NL: Asbestos in drinking water: health issues. In Health Risks from Exposure to Mineral Fibres: An International Perspective, Gibbs GW, Dunnigan J, Masamitsu, K, Higashi T. Captus University Publications, North York, Ontario, 1993.

Willoughby SB, Obermiller T, Polissar NL, Mendenhall JM, Butler J, Lakshminarayan S: 15m microspheres reflux up the pulmonary veins during pulmonary artery occlusion. Microvascular Research 45: 262-268, 1993.

Polissar NL, Jaffe KM, Fay GC, Liao S: Mild pediatric traumatic brain injury: adjusting statistical significance for multiple comparisons. Brain Injury 8(3): 249-264, 1994.

Fay GC, Jaffe KM, Polissar NL, Liao S, Rivara JB, Martin KM: Outcome of pediatric traumatic brain injury at three years: a cohort study. Arch Phys Med Rehabil 75: 733-41, 1994.

McDonald CM, Jaffe KM, Fay GC, Polissar NL, Martin KM, Liao S, Rivara JB: Comparison of indices of traumatic brain injury severity as predictors of neurobehavioral outcome in children. Arch Phys Med Rehabil 75: 328-37, 1994.

Rivara JB, Jaffe KM, Polissar NL, Fay GC, Martin KM, Shurtleff H, Liao S: Family functioning and children's academic performance and behavior problems in the year following traumatic brain injury. Arch Phys Med Rehabil 75: 369-79, 1994.

Malins, DC, Polissar NL, Nishikida K, Holmes EH, Gardner HS, Gunselman SJ. The etiology and prediction of breast cancer: fourier transform-infrared spectroscopy reveals progressive alterations in breast DNA leading to a cancer-like phenotype in a high proportion of normal women. Cancer 75(2): 503-517, 1995.

Greenwald HP, Polissar NL, Borgatta EF, McCorkle R: Detecting survival effects of socioeconomic status: problems in the use of aggregate measures. J Clin Epid 47(8): 903-909, 1994.

Souders JE, George SC, Polissar NL, Swenson ER, Hlastala MP: Tracheal gas exchange: perfusion-related differences in inert gas elimination. J Appl Phys 79(3):918-928, 1995.

Glenny RW, Polissar NL, McKinney S, Robertson HT: Temporal heterogeneity of regional pulmonary perfusion is spatially clustered. J Appl Phys 79(3): 986-1001, 1995.

Buntain-Ricklefs JJ, Rivara FP, Donovan DM, Salzberg PM, Polissar NL: Differentiating "bad drivers" with and without a DWI. J. Stud. Alcohol 56: 356-360, 1995.

Jaffe KM, Polissar NL, Fay GC, Liao S: Recovery trends over three years following pediatric traumatic brain injury. Arch Phys Med Rehabil 76: 17-26, 1995.

Warth DC, Leon MB, O'Neill W, Zacca N, Polissar NL, Buchbinder M: Rotational Atherectomy Multicenter Registry: Acute results, complications and six-month angiographic followup in 709 patients. J American College of Cardiology. In Press.

Smith J, Frawley PJ, Polissar NL: Six and twelve-month abstinence rates in inpatient alcoholics treated with either foradic aversion or chemical aversion compared with matched inpatients from a treatment registry. J Addictive Diseases. In Press.

Greenwald HP, Polissar NL, Dayal HH: Race, socioeconomic status, and survival in three female cancers. Ethnicity & Disease. In Press.

Bernard SL, Glenny RW, Polissar NL, Luchtel DL, Lakshminarayan S: Distribution of pulmonary and bronchial blood supply to airways measured by fluorescent microspheres. J Appl Phys. In Press.

Rivara JB, Jaffe KM, Fay GC, Polissar NL, Martin KM, Shurtleff HA, Liao S: Family functioning and injury severity as predictors of child functioning one year following traumatic brain injury. Arch Phys Med Rehabil. In Press.

Malins DC, Polissar NL, Gunselman SJ. Progression of human breast cancers to the metastatic state is linked to hydroxyl radical-induced DNA damage. Proceedings of the National Academy of Sciences. In Press.

Greenwald HP, Borgatta EF, McCorkle R, Polissar NL: Explaining reduced cancer survival among the disadvantaged. Milbank Quarterly. In Press.

Massagli T, Jaffe KM, Fay G, Polissar NL, Rivara JB: Neurobehavioral sequelae of severe pediatric traumatic brain injury: a cohort study. Arch Phys Med Rehabil. In Press.

Miller JS, Polissar NL, Haas M: A radiographic comparison of neutral cervical posture with cervical flexion and extension ranges of motion. J of Manipulative and Physiological Therapeutics. In Press.

Kelly Toy
3516 NE 113th St.
Seattle, WA 98125

Education:

1993-	B.S. Fisheries, University of Washington
1993-	B.A Anthropology, University of Washington
Currently-	Masters Program (Second year), University of Washington

Publications:

Toy, K.A., Gawne-Mittlestaedt, G.D., Polisar, N.L., Liao, S., (1995) A fish consumption survey of the Tulalip and Squaxin Island Tribes of Puget Sound. EPA Draft Report.

Conference Presentations of Fish Consumption Survey:

June 1995. International Congress on Hazardous Waste: Impact on Human and Ecological Health. Atlanta, Georgia

September 1995. King County Department of Metropolitan Services. Seattle, Washington.

October 1995. 49th Annual Meeting of the Pacific Coast Oyster Growers Association and National Shellfish Association Pacific Coast Section. Lynnwood, Washington.

December 1995. The Society For Risk Analysis and Japan Section of SRA: Learning From Cross-Cultural Comparison. Honolulu, Hawaii.

Professional Experience:

1993 to present: Survey Coordinator for the Tulalip and Squaxin Island Tribes fish consumption study. Tasks included research, design of survey questionnaire, hiring and training of survey interviewers, survey implementation, data entry, and writing reports.

1994 to present: Shellfish Biologist for the Tulalip Tribes.

Gillian D. Mittelstaedt
1725 174th Pl. SE
Mill Creek, WA 98012 **(206)481-0756**

Education:

Maxwell School of Citizenship & Public Affairs, Syracuse University
Masters in Public Administration, July, 1991
Concentration in Environmental Management
Coursework in statistics, economics, organizational theory, policy analysis, development administration, international environmental policy.

University of Puget Sound
Bachelor of Arts, Political Science, June, 1988
Honors: Pi Sigma Alpha, Political Science Honor Society; Mortar Board

Experience:

Environmental Program Analyst
Tulalip Tribes Natural Resources Department, Marysville, WA
December, 1991 to present

Responsible for developing a coordinated approach to water quality protection on the Tulalip Indian Reservation. Major duties include:
1. Develop tribal administrative program to coordinate tribal water quality policies with local, state and federal programs.
2. Draft water quality ordinances and regulations to protect on-reservation water resources.
3. Develop, supervise and implement specific water quality programs.
4. Supervise the design and implementation of tribal fish consumption study.
5. Represent Tribes on local, state and federal water quality forums.

Coordinator, Policy Analyst - Intern
Shangraw & Associates Consulting, Washington, D.C.

Participated in the development of a 30-year clean-up plan for the Department of Energy's Office of Environmental Restoration and Waste Management. Chaired student research group; acted as liaison between faculty, research group and Department of Energy.

Activities:

Member - American Water Resources Association
Member - Planning Association of Washington
Member - International City/County Management Association
Student Body President, University of Puget Sound, Tacoma, WA

ສະມາຄົມລາວ ປະສົມສ່ວຍເຫຼືອກັນ ລັດວໍຊິງຕັນ
The Coalition of Lao Mutual Assistance Association of Washington State
*4714 Rainier Ave South Suite 108, Seattle WA 98118 * (206) 723-8440*

Connie Nakano
Project Coordinator
Refugee Federation Service Center
7101 Martin Luther King Jr. Wy. So
Seattle, Wa. 98118

Dear Ms. Nakano:

It is with pleasure I will continue to provide service on the Laos Committee on the Asian and Pacific Islander Seafood Consumption Study. I will provide in-kind match time to the life of the grant through Phase 2 of this study to its completion.

The study is greatly beneficial to the Asian and Pacific Islander community because they are believed to consume and prepare seafood in many ways which may contribute to contaminant exposure and health risks.

I am pleased to see the progress of the study so far and look forward to providing further support to the next part of the project.

Sincerely,

Chanthone Chin.

OPERATIONAL
EMERGENCY
CENTER

3800 South Myrtle, Suite A
Seattle, WA 98118
(206) 725-2100
FAX (206) 723-8780

PROGRAM SERVICES
Emergency Assistance

- Information & Referral
- Crisis Intervention
- Services in Food Shelter & Clothing
- Infant Supplies

Junior Helpers

- Youth Employment
- Job Placement & Reffeal
- Work Ethic Orientations
- Youth-at-risk Counseling

Ex-Offender / Employment Assistance

- Job Placement & Referral
- Community Relations & Sponsorship
- Re-entry Counseling

Connie Nakano
Project Coordinator
Refugee Federation Service Center
7101 Martin Luther King Jr. Way So.
Seattle, WA 98118

Dear Ms. Nakano:

It is with pleasure I will continue to provide service on the Community Steering Committee of the Asian and Pacific Islander Seafood Consumption Study. I will provide in-kind match time to the life of the U. S. Environmental Protection Agency grant through Phase Two of this study to its completion.

As a Filipino American, I believe that the study is greatly beneficial to the wider Asian and Pacific Islander community because we are believed to consume and prepare seafoods in ways which may contribute to contaminant exposure and health risks.

I am pleased to see the progress of the study and look forward to provide further support to the next part of the project.

Sincerely,

Edwin Obras
Community Steering Committee Member

VIETNAMESE FRIENDSHIP ASSOCIATION OF GREATER SEATTLE

4860 Rainier Avenue S. 1st floor, Seattle, WA 98118
Phone (206) 722-2955

February 8, 1996

Connie Nakano
Project Coordinator
Refugee Federation Service Center
7101 ML King Jr Way S.
Seattle, WA 98118

Dear Ms. Nakano:

It is with pleasure I will continue to provide service on the Community Steering Committee of the Asian and Pacific Islander Seafood Consumption Study. I will provide in-kind match time to the life of the U.S Environmental Protection Agency grant through Phase Two of this study to its completion.

As a Vietnamese American, I believe that the study is greatly beneficial to the wider Asian and Pacific Islander Community because we are believed to consume and prepare seafoods in ways which may contribute to contaminant exposure and health risks.

I am pleased to see the progress of the study and look forward to provide further support to the next part of the project.

Sincerely,

Oanh Tran
Community Steering Committee Member

OANH TRAN
19019 8TH AVE S.
SEATTLE, WA 98148
(206)243-5153

OBJECTIVE:

Seeking a position as Office Administrative Assistant. To secure a permanent position utilizing my experience and skills with opportunities for advancement in accounting and business career.

EDUCATION:

Associate of Art Degree in Accounting, South Seattle Community College
Seattle Washington - 1993
Associate of Art Degree in Office Administration, South Seattle Community College
Seattle Washington - 1995

WORK EXPERIENCE:

2/1995 To Present **Vietnamese Friendship Association**- Program Coordinater
7101 ML King Jr #214, Seattle WA 98118

* Provide counseling service to refugees
* Prepaid and organized the classes schedule for new project
* Provide clerical duties that include sorting mail, typing, filing and answering phone.

6/92 To 12/94 **South Seattle Community College/Financial Aid Office-** Office Assistant
6000 16TH Ave. SW - Seattle, WA 98106

* Providing information to students regarding Financial Aid Assistant, mailing, and answering phone
* Organizing and tracking student files

5/94 To 9/94 **U.S Army Corps of Engineers** - Operation Clerk
4735 E Marginal Way S - Seattle WA 98124

* Organizing files system, processing billing, and sorting mail
* Provide clerical duties including ordering supply, travel arrangements, typing correspondence, and answering phone.
* Conducting testing for Microwave VHF 2000.

12/91 To 6/92 **South Seattle Community College/Counseling Office**-Office Assistant
6000 16TH Ave SW - Seattle WA 98106

* Providing technical assistance to foreign students
* Providing interpreting service to Vietnamese students

AREAS OF EXPERTISE:

Accounting payable and receivable, Invoicing, Purchasing.
Ten key by touch, Word Perpect, Word Processing (Microsoft Word),
Spread sheet (lotus 123), Media Software(Page Maker) for IBM and Macintosh.

AWARDS: South Seattle Community College Foundation Scholarship 93 - 94
Dean' s list , seven quarters.

REFERENCES will be furnished upon request.

美國華盛頓州印支華裔相濟會

INDOCHINA CHINESE REFUGEE ASSOCIATION OF WASHINGTON STATE

February 7, 1996

Connie Nakano
Project Coordinator
Refugee Federation Service Center
7101 Martin Luther King Jr. Way S.
Seattle, WA 98118

Dear Ms. Nakano:

On behalf of the Board of Directors of Indochina Chinese Refugee Association, I am very excited to see a community based organization, such as the Refugee Federation Service Center, take the lead in a seafood consumption study.

The ICRA is very pleased to participate with the other Asian and Pacific Islander groups in the development and progress of the Asian and Pacific Islander Seafood Consumption Study, funded by the U.S. Environmental Protection Agency.

Many members of A & PI community consume and catch seafood on a regular basis and it would benefit our community to know what risk factors are involved in the consumption of seafood.

The ICRA is committed to assisting in all phases of this project. Our members plan on being part of the Community Steering Committee. ICRA also will likewise assist in finding interviewers, translators, and producing educational tools and programs.

Sincerely,

Simon Truong

Simon Truong
President of ICRA

February 12, 1996

Connie Nakano
Project Coordinator
Refugee Federation Service Center
7101 MLK Jr. Way S.
Seattle, WA 98118

Dear Ms. Nakano:

I will gladly continue to provide in-kind services to the Asian and Pacific Islander Seafood Consumption Study as a Community Steering Committee member.

As a Chinese American, I believe that the study is beneficial to the Asian and Pacific Islander community because we may consume more seafood and prepare it differently than the average population.

I look forward to the next stage of the study.

Sincerely,

Benling Wong

Benling Wong

BEACON HILL DRIVING SCHOOL
7168 Beacon Ave. S.
Seattle, WA 98108
(206) 725-2077

February 12, 1996

Connie Nakano
Project Coordinator
Refugee Federation Service Center
7101 MLK Jr. Way S.
Seattle, WA 98118

Dear Ms. Nakano,

I will continue to provide in-kind services as a Community Steering Committee member to the Asian and Pacific Islander Seafood Consumption Study.

My services include meeting with the community on a monthly basis at 2 hours each and providing an extra 5% consultation to review materials and notes.

Sincerely,

May Wong

Western Regional Aquaculture Center
Alaska • Arizona • California • Colorado • Idaho • Montana • Nevada • New Mexico • Oregon • Utah • Washington • Wyoming

WRAC

15 December 1995

Ms. Connie Nakano
Refugee Federation Service Ctr.
7101 Martin Luther King Jr. Way So.
Seattle, WA 98118

Dear Ms. Nakano:

It is with pleasure I will continue to provide service on the Technical Committee on the grant "Asian and Pacific Islander Seafood Consumption Study". I will provide the in-kind match time to the life of the grant through Phase II of this study to its completion. The fact that I am a teacher and involved with shellfish culture and issues related to the economics of seafood distribution and consumption at the University of Washington School of Fisheries, the information collected will be most interesting.

Sincerely yours,

Kenneth K. Chew, Professor
School of Fisheries and
Director, Administrative Office
Western Regional Aquaculture Center

KKC:cjn

In cooperation with the US Department of Agriculture, Office of Aquaculture
WRAC Administrative Office, University of Washington, School of Fisheries, Box 357980, Seattle, WA 98195-7980 Phone (206) 543-4290, Fax (206) 685-4674

STATE OF WASHINGTON
DEPARTMENT OF ECOLOGY
P.O. Box 47600 • Olympia, Washington 98504-7600
(360) 407-6000 • TDD Only (Hearing Impaired) (360) 407-6006

February 16, 1996

Connie Nakano
Project Coordinator
Refugee Federation Service Center
7101 Martin Luther King Jr. Way S
Seattle, WA 98118

Dear Ms. Nakano:

I look forward to continuing to provide service on the Technical Committee on the Asian American and Pacific Islander Seafood Consumption Study. I will provide in-kind match time to the life of the grant through Phase 2 of this study to its completion.

The study is greatly beneficial to the Asian and Pacific Islander community because they are believed to consume and prepare seafoods in many ways that may contribute to contaminant exposure and health risks.

I am pleased to see the progress of the study so far, and look forward to providing further support to the next part of the project.

Sincerely,

Leslie Keill
Department of Ecology

LK:mm

Leslie E. Keill
2018 1/2 Franklin Avenue East
Seattle, WA 98102-3523
(206) 328-7216

Experience:

Washington State Department of Ecology, Lacey WA
***Toxicologist II**, June 1994 - Present*
Air Quality Program
Research and analyze toxic effects of air contaminants in Washington State communities to support regulation of various industries such as aluminum smelters, pulp and paper facilities, drycleaners, lead smelters, petroleum refineries, and coal-fueled power plants. Represent the Air Quality Program in the agency's Risk Assessment Forum, and led the development of a technical policy on fish consumption rates for use in risk assessment and water-related guidelines.

World Health Organization, Geneva, Switzerland
***Intern**, Summer 1993*
Prevention of Environmental Pollution Unit, Department of Environmental Health
Researched, developed, and documented health effects on tribal and indigenous peoples of ingesting methyl-mercury contaminated fish. Conducted worldwide survey of university courses in environmental health.

Washington State Department of Ecology, Lacey WA
***Assistant Toxicologist**, 1992 - 1993*
Policy and Technical Support Unit, Toxics Cleanup Program
Analyzed and presented technical issues for risk assessment policies including indicator chemical selection and petroleum chemical mixtures. Reviewed and provided technical support for risk assessments of hazardous waste sites under CERCLA and the Washington State Model Toxics Control Act.

PTI Environmental Services, Bellevue WA and Boston MA
***Associate Environmental Scientist**, 1991 - 1992*
Human Health Toxicology and Risk Assessment Division
Researched and analyzed dermal and gastrointestinal absorption factors for soil-bound metals and organic pollutants. Participated in human health risk assessments for hazardous waste sites. Developed toxicity profiles for contaminants using toxicity databases (IRIS and RTECS).

Pacific Science Center, Seattle WA
***Science Teacher and Curriculum Developer**, 1989 - 1991*
Waste Reduction and Recycling Education Program
Designed waste reduction and recycling curriculum for junior high/middle schools in King County, Washington. Presented all-school assemblies in junior high and elementary schools and taught science laboratory on plastics.

Environmental Toxicology International, Seattle WA
***Project Manager**, 1987 - 1989*
Occupational Health and Safety Services
Managed and marketed courses for occupational health and safety and emergency response training courses required under OSHA. Assisted with human health risk assessments for municipal and hazardous waste incinerators. Lectured on occupational environmental regulations.

Education:

Harvard School of Public Health, Boston MA
***Master of Science in Health and Social Behavior**, January 1994*
Concentration in Environmental Health Sciences

Smith College, Northampton MA
***Bachelor of Arts**, American Studies, May 1987*
Concentrations: Environmental Studies and General Sciences

MARSHA L. LANDOLT

Director
School of Fisheries, WH-10
University of Washington
Seattle, Washington 98195 USA
(206) 543-4270

Personal Information

Birthdate: January 19, 1948
Birthplace: Houston, Texas USA

Education

Baylor University	BS	Biology	1969
University of Oklahoma	MS	Zoology	1970
George Washington University	PhD	Pathology	1976

Professional Experience

1986-Present	Professor University of Washington School of Fisheries, Seattle, WA
1979-1986	Associate Professor University of Washington School of Fisheries, Seattle, WA
1975-1979	Assistant Professor University of Washington School of Fisheries, Seattle, WA
1974-1975	Pathology Clerkship Smithsonian Institution National Zoological Park, Washington, DC
1970-1974	Histopathologist US Department of Interior Eastern Fish Disease Laboratory, Leetown, WV

Administrative Experience

1991-Present	Director School of Fisheries University of Washington
1983-1991	Associate Dean College of Ocean and Fishery Sciences University of Washington
1989-1990	Acting Director Division of Aquaculture and Food Science School of Fisheries University of Washington

1980-1983	Assistant Director School of Fisheries University of Washington

Adjunct Appointment

1977-Present	Adjunct Professor Department of Pathology University of Washington
1990-Present	Adjunct Professor Department of Veterinary Pathology and Microbiology Washington State University

SERVICE ACTIVITIES

National

Co-Ordinator, US/Taiwan Workshop on Fish Health, 1979
National Science Foundation

Fisheries Education Committee, 1984
Natl. Assoc. of State Universities and Land Grant Colleges (NASULGC)

Estuarine Research Committee, 1984-1991
Natl. Assoc. of State Universities and Land Grant Colleges (NASULGC)

Water Resources Research Committee, 1984-1986
National Research Council

Board of Governors, 1988-Present
National Coastal Research Institute

Great Lakes Science Advisory Board, 1990-1991
International Joint Commission

University of Washington Representative, 1992-Present
National Association of University Fisheries and Wildlife Programs (NAUFWP)

University of Washington Delegate, 1992-Present
NASULGC Commission on Food, Environment and Renewable Resources

University of Washington Representative, 1993-Present
NASULGC Fish and Wildlife Resources Section (Board of Natural Resources, Commission on Food, Environment and Renewable Resources)

Editorial Board, 1992-Present
Journal of Aquatic Animal Health

American Fisheries Society, 1993-1994
Strategic Planning Committee

State and Local

Citizens Water Quality Advisory Committee, 1977
Special Task Force on Secondary Sewage Treatment (METRO)

Board of Directors, 1982-1984
Seattle Aquarium Society

Technical Advisory Committee, 1984-1988
Region 10, US Environmental Protection Agency

Scientific Advisory Panel, 1985-1987
Puget Sound Water Quality Authority

Committee on Research, 1987-1991
Puget Sound Water Quality Authority

Maritime Center Program Planning Study, 1988-1989
Seattle Maritime Center Board

Marine Endowment Committee, 1988-1989
The Sailing Foundation

Interagency Work Group on Fish Health Issues, 1989-1991
Washington Departments of Fisheries, Wildlife, Agriculture, and Ecology

Aquaculture Advisory Committee, 1989-1991
Washington Department of Agriculture

Indian Fish Consumption Survey, 1993-1994
Scientific Advisory Board

University

Faculty Council for Faculty Affairs 1977-1981 (Chairman, 1981)
Special Task Force on Grievance Procedures, 1978-1980 (Chairman)
Faculty Senate Budget Committee (1981-1983)
Faculty Council on Grant and Contract Research, 1985-1990
General Physical Development Plan Advisory Committee, 1988-1990
Continuing Education Board of Deans, 1989-1991
Board on Human Resources, 1994-Present

PUBLICATIONS

1970

Payne, RB and ML Landolt. Thyroid histology of tricolored blackbirds (*Agelaius tricolor*) in the annual cycle, breeding and molt. Condor 72: 445-451.

1973

Landolt, ML. *Myxosoma cerebralis*:: Isolation and concentration from fish skeletal elements--Trypsin digestion method. J Fish Res Bd Canada 30: 1713-1716.

Wolf, K, MC Quimby, LL Pettijohn and ML Landolt. Fish viruses: Isolation and identificatin of infectious hematopoietic necrosis in eastern North America. J Fish Res Bd Canada 30: 1625-1627.

1974

Landolt, ML (Editor). Fish Pathology by HH Reichenback-Klinke. T.F.H. Publications, Neptune, New Jersey.

1975

Hoffman, GL, ML Landolt, JE Camper, DW Coats, JL Stookey and JD Burek. A disease of freshwater fishes caused by *Tetrahymena corlissi* Thompson, 1955, and a key for identification of holotrich ciliates of freshwater fishes. J Parasitol 61: 217-223.

McCraren, JP, ML Landolt, GL Hoffman and FP Meyer. Variation in response of channel catfish to *Henneguya* sp infections (Protozoa: Myxosporidea). J Wildlife Diseases 11: 2-7.

Landolt, ML. Visceral granuloma and nephrocalcinosis of trout. In: W Ribelin and G Migaki (Eds), Pathology of Fishes. University of Wisconsin Press, Madison, WI. pp 793-801.

Landolt, ML (Editor). Color Atlas of the Diseases of Fish, Amphibians and Reptiles by E Elkan and HH Reichenback-Klinke. T.F.H. Publications, Neptune, New Jersey.

Herman, RL and ML Landolt. A testicular leiomyoma in a largemouth bass, *Micropterus salmoides* . J Wildlife Diseases 11: 128-129.

1976

Landolt, ML and RM Kocan. Transmission of avian pox from starlings to Rothschild's mynahs. J Wildlife Diseases 12: 353-356.

1977

Landolt, ML, JR MacMillan and MJ Patterson. Detection of an intraerythrocytic virus in rainbow trout (*Salmo gairdneri*). Fish Health News 6: 4-5.

1979

Patterson, MJ and ML Landolt. Cellular reaction to injury in the anthozoan *Anthopleura elegantissima* . J Invert Pathol 33: 189-196.

Bergman, HL, RM Carlson, CW Gehrs, M Katz and ML Landolt. Phenol. In: RW Thurston, RC Russo, CM Fetterolf Jr, TA Edsall and YM Barbar (Eds), A Review of the EPA Red Book: Quality Criteria for Water. Water Quality Section, American Fisheries Society, Bethesda, MD. pp 221-228.

Iwaoka, WT, ML Landolt, KB Pierson, SP Felton and A Abolins. Studies on aryl hydrocarbon hydroxylase, polycyclic hydrocarbon content, and epidermal tumors in flatfish. In: Animals as Monitors of Environmental Pollutants. National Academy of Sciences, Washington DC. pp 85-93.

Kocan, RM, ML Landolt and KM Sabo. In vitro toxicity of eight mutagens/carcinogens for three fish cell lines. Bull Environm Contam Toxicol 23: 269-274.

1980

MacMillan, JR, D Mulcahy and ML Landolt. Viral erythrocytic necrosis: Some physiological consequences of infection in chum salmon (*Oncorhynchus keta*). Can J Fish Aquat Sci 37: 799-804.

Patterson, MJ and ML Landolt. Cell adhesion in a sea anemone. American Zoologist 20: 819.

1981

Kocan, AA and ML Landolt. Diseases of warm water fish. California Veterinarian May, 1981: 8-13.

Hose, JE, JB Hannah, ML Landolt, BS Miller, SP Felton and WT Iwaoka. Uptake of benzo(a)pyrene by gonadal tissue of flatfish (Family Pleuronectidae) and its effects on subsequent egg development. J Toxicol Environm Hlth 7: 991-1000.

Landolt, ML and RM Kocan. In vitro techniques for aquatic toxicological studies. National Science Council, Republic of China, Symposium Series No 3: 85-87.

Kocan, RM, ML Landolt, J Bond and EP Benditt. In vitro effect of some mutagens/carcinogens on cultured fish cells. Arch Environm Contam Toxicol 10: 663-671.

1982

Hose, JE, JB Hannah, D DiJulio, ML Landolt, BS Miller, WT Iwaoka and SP Felton. Effects of benzo(a)pyrene on early development of flatfish. Arch Environm Contam Toxicol 11: 167-171.

Kocan, RM, ML Landolt and KM Sabo. Anaphase aberrations: A measure of genotoxicity in mutagen treated fish cells. Environm Mutagenesis 4: 181-189.

Hannah, JB, JE Hose, ML Landolt, BS Miller, SP Felton and WT Iwaoka. Benzo(a)pyrene induced morphologic and developmental abnormalities in rainbow trout. Arch Environm Contam Toxicol 11: 727-734.

Felton, SP, WT Iwaoka, ML Landolt and BS Miller. Techniques for the waterborne administration of benzo(a)pyrene to aquatic test organisms. In: Symposium on Carcinogenic Polynuclear Aromatic Hydrocarbons in the Marine Environment. EPA-600/9-82-013. pp 148-162.

Landolt, ML, SP Felton, WT Iwaoka, BS Miller, D DiJulio and B Miller. Bioaccumulation and toxicity in English sole, *Parophrys vetulus* , following waterborne exposure to benzo(a)pyrene. In: Symposium on Carcinogenic Polynuclear Aromatic Hydrocarbons in the Marine Environment. EPA-600/9-82-013. pp 268-281.

1983

Landolt, ML and RM Kocan. Fish cell cytogenetics: A measure of the genotoxic effects of environmental pollutants. In: JO Nriagu (Ed), Aquatic Toxicology. John Wiley and Sons, Inc, New York. pp 335-353.

Liguori, VM, HR Zakour, ML Landolt and SP Felton. Toxicity of the herbicide Endothall to juvenile chinook salmon (*Oncorhynchus tshawytscha*). In: WE Bishop, RD

Cardwell and BB Heidolph (Eds), Aquatic Toxicology and Hazard Assessment: Sixth Symposium. American Society for Testing and Materials, Philadelphia, PA pp 530-544.

Kocan, RM, EY Chi, N Ericksen, EP Benditt and ML Landolt. Sequestration and release of polycyclic aromatic hydrocarbons by vertebrate cells in vitro. Environm Mutagenesis 5: 643-656.

1984

Zakour, HR, ML Landolt and RM Kocan. Sister chromatid exchange induction in cultured peripheral blood leukocytes of a coldwater marine fish. Mar Environm Res 14: 499-500.

Kocan, RM and ML Landolt. Uptake and excretion of benzo(a)pyrene by trout embryos and sac fry. Mar Environm Res 14: 433-436.

Landolt, ML and RM Kocan. Anaphase aberrations in cultured fish cells as a bioassay of marine sediments. Mar Environm Res 14: 497-498.

Kocan, RM and ML Landolt. Alterations in patterns of excretion and other metabolic functions in developing fish embryos exposed to benzo(a)pyrene. Helgolander Meeresuntersuchungen 37: 493-504.

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Zakour, HR, ML Landolt and RM Kocan. Sister chromatid exchange analysis in cultured peripheral blood leukocytes of the coldwater marine fish, Pacific staghorn sculpin (*Leptocottus armatus*): A feasible system for assessing genotoxic marine pollutants. In: RR Tice and A Hollaender (Eds), Sister Chromatid Exchanges. Plenum Publishing Corp, New York. pp 493-508.

Hose, JE, JB Hannah, HW Puffer and ML Landolt. Histologic and skeletal abnormalities in benzo(a)pyrene-treated rainbow trout alevins. Arch Environm Contam Toxicol 13: 675-684.

1985

Kocan, RM, KM Sabo and ML Landolt. Cytotoxicity/Genotoxicity: The application of cell culture techniques to the measurement of marine sediment pollution. Aq Toxicol 6: 165-177.

Liguori, VM and ML Landolt. Anaphase aberrations: An in vivo measure of genotoxicity. In: MD Waters, SS Sandhu, J Lewtas, L Claxton, G Strauss and S Nesnow (Eds), Short-Term Bioassays in the Analysis of Complex Environmental Mixtures IV. Plenum Press, New York. pp 87-98.

1987

Mottet, NK and ML Landolt. Advantages of using aquatic animals for biomedical research on reproductive toxicology. Environm Hlth Perspectives 71: 69-75.

Landolt, ML and RM Kocan. The sea-surface microlayer: A complex mixture which causes genotoxic damage to fish cells and embryos. In: SS Sandhu, DM DeMarini, MJ Mass, MM Moore and JL Mumford (Eds), Short-Term Bioassays in

the Analysis of Complex Environmental Mixtures V. Plenum Press, New York. pp 225-236.

Becker, DS, TC Ginn, ML Landolt and DB Powell. Hepatic lesions in English sole (*Parophrys vetulus*) from Commencement Bay, Washington (USA). Mar Environm Res 23: 153-173.

Westernhagen, HV, ML Landolt, RM Kocan, G Furstenberg, D Janssen and K Kremling. Toxicity of sea-surface microlayer: Effects on herring and turbot embryos. Mar Environm Res 23: 273-290.

Kocan, RM, HV Westernhagen, ML Landolt and G. Furstenberg. Toxicity of sea-surface microlayer: Effects of hexane extract on Baltic herring (*Clupea harengus*) and Atlantic cod (*Gadus morhua*) embryos. Mar Environm Res 23:291-305.

1988

Ostrander, GK, ML Landolt and RM Kocan. Ontogeny of coho salmon (*Oncorhynchus kisutch*) behavior following embryonic exposure to benzo(a)pyrene. Aquatic Toxicology 13: 325-346.

1989

Landolt, ML. The relationship between diet and the immune response of fish. Aquaculture 79:193-206.

Ostrander, GK, ML Landolt, and RM Kocan. Whole life history studies of coho salmon (*Oncorhynchus kisutch*) following embryonic exposure to benzo(a)pyrene. Aquatic Toxicology 15:109-126.

Kocan, RM and ML Landolt. Survival and growth to reproductive maturity of coho salmon following embryonic exposure to a model toxicant. Marine Environmental Research 27: 177-193.

MacMillan, J.R., D. Mulcahy, and M.L. Landolt. Cytopathology and coagulopathy associated with viral erythrocytic necrosis in chum salmon. J. Aquatic Animal Health 1: 255-262.

1990

Kocan, RM and ML Landolt. Use of herring embryos for in situ and in vitro monitoring of marine pollution. IN: S.S. Sandhu et al., (Editors), In Situ Evaluations of Biological Hazards of Environmental Pollutants. Plenum Press, New York. pp. 49-60.

Ostrander, GK, JJ Anderson, JP Fisher, ML Landolt and RM Kocan. Decreased performance of rainbow trout (*Oncorhynchus mykiss*) emergence behaviors following embryonic exposure to benzo(a)pyrene. Fish. Bulletin 88: 551-555.

1991

Deering, RE, CK Arakawa, KH Oshima, PJ O'Hara, ML Landolt and JR Winton. Development of a biotinylated DNA probe for detection and identification of infectious hematopoietic necrosis virus. Diseases of Aquatic Organisms 11: 57-65.

Batts, WN, ML Landolt, and JR Winton. Inactivation of infectious hematopoietic necrosis virus by low levels of iodine. Appl. Environm. Microbiol. 57: 1379-1385.

1992

Chien, M-S, TL Gilbert, C Huang, ML Landolt, PJ O'Hara, and JR Winton. Molecular cloning and sequence analysis of the gene coding for the 57-kDa major soluble antigen of the salmonid fish pathogen *Renibacterium salmoninarum*. FEMS Microbiology Letters 96: 259-266.

1994

Huang, C, M-S Chien, ML Landolt and J Winton. Characterization of the infectious hematopoietic necrosis virus glycoprotein using neutralizing monoclonal antibodies. Diseases of Aquatic Organisms 18: 29-35.

Thorarinsson, R, ML Landolt, DG Elliott, RJ Pascho, and RW Hardy. Effect of dietary vitamin E and selenium on growth, survival and the prevalence of *Renibacterium salmoninarum* infection in chinook salmon (*Oncorhynchus tshawytscha*). Aquaculture 121: 343-358.

Felton, SP, R Grace and ML Landolt. Significantly higher levels of zinc and copper found in wild compared to hatchery-reared coho salmon smolts *Oncorhynchus kisutch*. Diseases of Aquatic Organisms 18: 233-236.

1995

Oshima, KH, CK Arakawa, KH Higman, ML Landolt, ST Nichol and JR Winton. The genetic diversity and epizootiology of infectious hematopoietic necrosis virus. Virus Research 35: 123-141.

Pascho, RJ, ML Landolt and JE Ongerth. Inactivation of *Renibacterium salmoninarum* by free chlorine. Aquaculture 131: 165-175.

Felton, SP, ML Landolt and R Grace. Hatchery-reared coho salmon achieve body burdens of selenium similar to those of wild coho: Effects of dietary supplementation on immunoenzymes and seawater adaptation. Aquaculture and Fisheries Management (In Press)

Mulvey, B, ML Landolt and RA Busch. Effects of potassium aluminum sulfate (alum) used in an *Aeromonas salmonicida* bacterin on Atlantic salmon, *Salmo salar* L. Journal of Fish Diseases (In Press)

Armstrong, DA, PA Dinnel, JM Orensanz, JL Armstrong, TL McDonald, RF Cusimano, RS Nemeth, ML Landolt, JR Skalski, RF Lee and RJ Huggett. Status of selected bottomfish and crustacean species in Prince William Sound following the Exxon Valdez oil spill. In: PG Wells, JN Butler and JS Hughes (Eds.), Exxon Valdez Oil Spill: Fate and Effects in Alaskan Waters. ASTM, Philadelphia. pp. 485-547.

Huang, C, M-S Chien, M Landolt, W Batts and J Winton. Mapping the neutralizing epitopes on the glycoprotein of infectious hematopoietic necrosis virus, a fish rhabdovirus. Virology (In Review)

REPORTS

1980

Felton, SP, ML Landolt, WT Iwaoka, BS Miller, D DiJulio, JE Hose, B Lloyd and KB Pierson. Carcionogenic Effects of Petroleum Hydrocarbons on Selected Marine

and Estuarine Organisms. Final Report, Contract No. NO1-ES-7-2101, National Institute of Environmental Health Sciences. 120 pp.

1981

Stromberg, PT, ML Landolt and RM Kocan. Alterations in the Frequency of Sister Chromatid Exchanges in Flatfish From Puget Sound, Washington, Following Experimental and Natural Exposure to Mutagenic Chemicals. NOAA Technical Memorandum OMPA-10. 43 pp.

Landolt, ML, SP Felton, VM Liguori, HR Zakour and D DiJulio. Toxicity of Endothall to Juvenile Chinook Salmon (*Oncorhynchus tshawytscha*). Final Report, Municipality of Metropolitan Seattle (METRO), May, 1981. 70 pp.

Dexter, RN, DE Anderson, EA Quinlan, LS Goldstein, RM Strickland, SP Pavlou, JR Clayton, RM Kocan and ML Landolt. A Summary of Knowledge of Puget Sound Related to Chemical Contaminants. NOAA Technical Memorandum OMPA-13. Chapter 10, pp 395-423.

1982

Chapman, PM, GA Vigers, MA Farrell, RN Dexter, EA Quinlan, RM Kocan and ML Landolt. Survey of Biological Effects of Toxicants Upon Puget Sound Biota: I. Broad-scale Toxicity Survey. NOAA Technical Memorandum OMPA-25. 98 pp.

1983

Chapman, PN, DR Munday, J Morgan, R Fink, RM Kocan, ML Landolt and RN Dexter. Survey of Biological Effects of Toxicants Upon Puget Sound Biota: II. Tests of Reproductive Impairment. NOAA Technical Report NOS 102 OMS 1. 58 pp.

1984

Landolt, ML, DB Powell and RM Kocan. Fish Health (Volume VII). In: KK Chew and QJ Stober (Eds), Renton Sewage Treatment Plant Project: Seahurst Baseline Study. Final Report. Municipality of Metropolitan Seattle. 61 pp.

1985

Landolt, ML, FR Hafer, A Nevissi, G van Belle, K VanNess and C Rockwell. Potential Toxicant Exposure Among Consumers of Recreationally Caught Fish From Urban Embayments of Puget Sound. NOAA Technical Memorandum NOS OMA 23. 104 pp.

1987

Landolt, ML, D Kalman, A Nevissi, G vanBelle, K VanNess and F Hafer. Potential Toxicant Exposure Among Consumers of Recreationally Caught Fish From Urban Embayments of Puget Sound: Final Report. NOAA Technical Memorandum NOS OMA 33. 111 pp.

Landolt, ML and RM Kocan. Yakima River Histopathology Study. Report to Washington Department of Ecology and US EPA, Tumwater, WA. 28 pp.

1988

Landolt, ML, DA Kalman, and AE Nevissi. Contaminant levels in the edible portion of recreationally caught fish from Puget Sound, Washington. NOAA Estuary-of-the-Month Seminar Series No. 8, Washington, DC. pp. 111-133.

1991

Landolt, ML and RA Busch. Lake Union Fish Histopathology Study. Report to Washington Department of Ecology. 22 pp.

1994

Felton, SP, ML Landolt and R Grace. The Reduction of Hatchery and Aquaculture Diseases by the Use of Molecular Based Therapeutic Nutrition: Final Report. FRI-UW Report No. FRI-UW-9401. University of Washington, School of Fisheries, Seattle, WA. 33 pp.

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 10
1200 Sixth Avenue
Seattle, Washington 98101

February 5, 1996

Connie Nakano
Refugee Federation Service Center
7101 M.L. King S. #214
Seattle, WA 98118

Dear Connie,

This letter is to confirm my participation in the Refugee Federation Service Center's project, "Asian and Pacific Islander Seafood Consumption Study", as a member of the Technical Committee.

During the first phase (the planning phase) of the study, I was both the EPA project manager and a member of the Technical Committee. However, during the second phase (the implementation phase) may participation will be limited to technical support. During the second phase, five percent (5%) of my time will be devoted to this project. This support will be provided as in-kind services at $25.00 per hour (note: as in-kind service, no charges will be billed).

I'm pleased to provide technical support for this study and look forward to the next part of the project.

Sincerely,

Roseanne M. Lorenzana, DVM, PhD, DABT
Toxicologist & Risk Assessor
Region 10 Risk Evaluation Branch
Mail Drop ES-098

attachment: resume (3 pages)

Experience

US Environmental Protection Agency
Region 10 Health & Environ. Assessment
Seattle, Washington

Position: Toxicologist/Risk Assessor
Supervisor: Dr. Pat Cirone
Date: 12-91 to present

Toxicology/risk assessment expert providing support to the federal Pollution Prevention, Superfund, Water, Solid Waste and Air programs. Participate in policy and guidance development, provide training, respond to public inquiries and work in interdisciplinary teams to conduct and/or oversee environmental research.

State of Oregon
Health Division
Portland, Oregon

Position: Section Manager
Supervisor: Tom Johnson
Date: 1-91 to 12-91

Toxicologist and manager of Environmental Toxicology Section. Assess human health effects of chemical contaminants in environmental media. Provide consultation, risk assessment, risk communication, and training for state agencies, the public, and local governments.

State of Washington
Department of Health
Olympia, Washington

Position: Toxicologist
Supervisor: Carl Sagerser
Date: 6-88 to 1-91

Principal toxicologist for state hazardous waste program. Performed exposure and risk assessment, and determined public health implications. Provided consultation, information, training, grant writing, study design, policy development, public speaking and risk communication.

Oregon State University
Environmental Health Science Center
Corvallis, Oregon

Position: Research Fellow
Supervisors: Drs. Tinsley and Buhler
Date: 2-86 to 3-88

NIEHS supported study of biochemical mechanisms of toxicity. Areas of research included cyt P-450 steroid biosynthesis, immunohistochemistry and endocrine-immune interactions using the rainbow trout model.

University of Illinois
College of Veterinary Medicine
Urbana, Illinois

Position: Research Associate
Supervisor: Dr. William B. Buck
Date: 8-82 to 11-85

Post-DVM graduate and residency program in toxicology. This program included participation in advanced course work and original research as well as training in diagnostic and clinical toxicology through participation in the National Animal Poison Control Center.

Available Upon Request

- Peer reviewed publications.
- Chapters, abstracts, proceedings.
- Additional training/continuing education.
- Pre-1985 experience in basic research, laboratory animal medicine and wildlife medicine.
- U.S. Environmental Protection Agency and State Agency Work Groups.
- References.

ROSEANNE M. LORENZANA

U.S. Environmental Protection Agency, Region 10
1200 Sixth Avenue, OEA-095
Seattle, WA 98101
(206) 553-8002 work

Highlights of Career

- American Board of Toxicology certified, PhD toxicologist with experience in environmental risk assessment.
- Experienced in both public health toxicology (applied toxicology) and basic research (experimental toxicology).
- Licensed veterinarian with completion of accredited medical/surgery internship and clinical toxicology residency.
- Skilled verbal and written communicator with community groups, scientific peers and regulatory decision makers.
- Instructor of environmental risk assessment and risk communication classes for agency staff, the public and university level students.
- Manager responsible for developing and administering environmental toxicology program for state health department.

Significant Accomplishments

- Leader in development of innovative assessment methods to address exposure issues concerning lead and arsenic bioavailability, incinerator emissions, ground water contaminants and seafood contaminants.
- Project manager for community-based study to obtain accurate (i.e. considers cultural and language needs) exposure data from Asian and Pacific Islander seafood collectors in Washington state.
- Member of both regional and national USEPA workgroups addressing environmental equity/justice.
- Recipient of peer awards for excellence in science and commendable public service.
- Member of USEPA national agency workgroup developing methodology for assessment of adult exposures to environmental lead contamination.

Educational Record

1985. Doctor of Philosophy in veterinary toxicology, University of Illinois, College of Veterinary Medicine, Dept. of Veterinary Biosciences, Urbana, Illinois
1982. Small Animal Medical and Surgical Internship, California Animal Hospital
Stephen J. Ettinger, Program Director, Los Angeles, California
1981. Doctor of Veterinary Medicine with honors, University of Illinois, College of Veterinary Medicine, Urbana, Illinois
1977. Bachelor of Science with honors – Biology (major) and Chemistry
University of Illinois at Chicago Circle, Chicago, Illinois

Certifications and Licensures

Diplomate of the American Board of Toxicology
California Veterinary Practice
Illinois Veterinary Practice
Private Pilot (single engine, land)

Academic Appointments

1990-present Affiliate Faculty, University of Washington, Dept. of Environmental Health, Seattle, WA.
1988–present Adjunct Faculty, Oregon State University, Dept. of Ag. Chem. Research, Corvallis, OR.
1986–1988 Research Fellow, Oregon State University, Dept. of Ag. Chem. Research, Corvallis, OR.

December 15, 1995

Connie Nakano
Refugee Federation Service Center
7101 Martin Luther King Jr. Way, S.
Seattle, WA 98118

Dear Ms. Nakano:

The Asian and Pacific Islander Seafood Consumption Study will significantly contribute to information related to seafood consumption of asians and pacific islanders. I hope to provide as much technical support as time will allow. I can spend approximately 1-3% of my time on this project depending on seasonal work load.

Sincerely,

Craig R. McCormack

GREGORY L. GLASS
Environmental Consultant
8315-B Fifth Avenue NE
Seattle, Washington 98115

TEL: (206) 523-1858
FAX: (206) 523-1858

Connie Nakano
Refugee Federation Service Center
7101 Martin Luther King Jr. Way S
Suite 214
Seattle, Washington 98118

December 14, 1995

Dear Connie,

I am pleased to have been asked to participate in your study of Asian and Pacific Islander Seafood Consumption as a member of the Technical Committee. I have enjoyed our meetings since last August and look forward to continuing through completion of the study. In support of the study, the Technical Committee will provide in-kind services to review and help develop the study design and to help in assessing the results.

I have enclosed a copy of my CV.

In my risk assessment work, I have a strong interest in the variability in exposure factors across individuals, groups, and populations. The Asian and Pacific Islander Seafood Consumption Study will address the variability in one important exposure factor, the amount of seafood within the diet. Such dietary differences among subpopulations and groups can be an important factor contributing to variability in contaminant exposures and health risks. Previous studies have shown that certain subpopulations in the Northwest have greater seafood consumption patterns than typical U.S. populations. I look forward to extending these findings to the Asian and Pacific Islander populations that are the subject of your study.

Sincerely,

Gregory L Glass

Gregory L. Glass

GREGORY L. GLASS
Environmental Consultant
8315-B Fifth Avenue NE
Seattle, Washington 98115

(206) 523-1858

QUALIFICATIONS

GREGORY L. GLASS is an environmental consultant specializing in chemical contamination studies, human health and environmental risk assessments, and quantitative evaluations of environmental data. He has 20 years of experience in a wide range of project types, focusing in the last 15 years on hazardous waste and site contamination issues. He has managed and been a principal investigator for many studies under RCRA, CERCLA/SARA, and MTCA, including many listed federal Superfund and state MTCA sites. His extensive experience in hazardous waste studies includes program design and management, field sampling and analysis plans, data quality objectives, data evaluation, cleanup criteria definition and ARARs review, regulatory compliance, risk assessment, remedial measures identification, cost allocation analyses, TSD facility siting studies, and public presentations. Mr. Glass has managed studies for local, state, and federal agencies and for private firms. He has also served as a technical consultant to community organizations under Ecology's Public Participation Grant program. Projects have ranged from small site assessments to multiyear, multimillion-dollar site characterization, remedial investigation, and permitting studies. He has developed and applied new quantitative methods of analysis to many data evaluation and decision criteria studies. Mr. Glass established and managed an environmental regulations advisory group and has performed numerous regulatory and policy analyses, and also managed multidisciplinary environmental impact and siting studies.

RELEVANT EXPERIENCE

Chemical Contamination Studies

Prepared exposure and risk assessments for the Washington State Department of Ecology's Endangerment Assessment for areas of residual soil contamination in Ruston, North Tacoma, and Vashon Island, surrounding the Tacoma Smelter (WA). These areas are included within the Commencement Bay Superfund site. Provided a technical analysis of background concentrations of arsenic, cadmium, and lead to support incremental exposure evaluations. Performed a comprehensive review and evaluation of available epidemiological studies of populations near the

Tacoma Smelter.

Prepared a substantial revision and update for U.S. EPA Region 10 of the Washington State Department of Ecology's Endangerment Assessment for residential areas surrounding the Tacoma Smelter (WA). Performed detailed exposure and risk evaluations for potential arsenic and lead exposures, and screening assessments for additional contaminants. Prepared a detailed Decision Memorandum to support the U.S. EPA's determination of cleanup action levels for soil arsenic and soil lead. Presented an overview of risk assessment methods and results in public and interagency forums, and prepared portions of the Record of Decision Responsiveness Summary related to risk assessment and cleanup levels. Provided detailed review and consultation for the Remedial Investigation Report for the site.

Designed and reviewed detailed statistical evaluations of potential soil sampling approaches for making cleanup decisions at individual residential properties near the Tacoma Smelter (WA) Superfund site. Performed with ICF Technology Inc. for U.S. EPA, Region 10. Included application of EPA's Data Quality Objectives process.

Served as the primary technical consultant to the interagency Air Work Group for studies related to the ASARCO Tacoma Smelter as part of Commencement Bay (WA) Superfund site investigations. Included identification, scoping, evaluation, design, and assessment of over 20 separate studies.

Served as Project Manager for preparation of the Remedial Investigation Work Plan for the Bunker Hill (ID) Superfund site. Managed negotiation of all work plan elements with U.S. EPA Region 10 and provided detailed scheduling for a multimillion dollar, multiyear Remedial Investigation of one of the largest designated Superfund sites in the nation.

Managed the Data Quality Objectives process and provided the health risk assessment work plan for the Queen City Farms (WA) Superfund site Remedial Investigation/Feasibility Study. Performed environmental data evaluations and exposure and risk assessments for the site.

Performed a statistical evaluation of accumulated ground water data for the Queen City Farms Superfund Site to assess possible trends in contaminant concentrations (seasonality and long-term trend).

Performed statistical evaluations and provided consulting assistance for compliance monitoring and related issues at the Tacoma Landfill Superfund Site (WA). Provided analyses of background data to establish selected Early Warning Values for possible further response actions.

Served as Principal Investigator for evaluations of soil and ground water monitoring contaminant data for the Western Processing (WA) Superfund site. Participated in development of a remedial action plan for the Potentially Responsible Parties that was subsequently accepted for implementation by

U.S. EPA and the Washington state Department of Ecology.

Prepared a Compliance Demonstration Work Plan for the Western Processing (WA) Superfund site to evaluate data collected during ground water remediation and to assess the performance (and likely duration) of ground water pumping and treatment. Participated in development of a data management system to support the compliance demonstration evaluations.

Served as the technical consultant to the Northeast Everett Community Organization (NECO), a community organization that received a Public Participation Grant from Ecology to support involvement in decisions for cleanup actions at the Everett Smelter (WA) MTCA site.

Served as a technical consultant to the Nisqually Delta Association, DuPont Toxics Citizen Oversight Project (DTCOP), a community organization that received a Public Participation Grant from Ecology to support involvement in decisions for cleanup actions at the DuPont (WA) MTCA site.

Provided senior review and consultation to Burlington Northern Railroad for Baseline Risk Assessment and Feasibility Study issues, including remedial action objectives, at the South Tacoma Field Superfund Site, Tacoma, Washington.

Performed an evaluation of soil and ground water cleanup standards under MTCA for a metals recycling site located on the former West Seattle (Harbor Avenue) Landfill (WA), in support of an independent cleanup action and cost allocation negotiations.

Provided technical review for site investigations under MTCA at former Seattle Steel property acquired by the Port of Seattle for development of the Southwest Harbor Project (WA). Primary issues related to the chemical characterization and proper handling of slag-containing landfill cover materials and miscellaneous piles at the property.

Performed an evaluation of required analytical detection limits, based on potential risk-based cleanup levels or applicable requirements, for the work plan for MTCA site characterization studies at the Pasco Bulk Fuels Terminal site (WA). Performed evaluations of Phase I remedial investigation data to screen for potential human health or environmental threats and to define further data collection needs for Phase II.

Provided peer review of a baseline risk assessment for the Whidbey Naval Air Station (WA) Superfund Site (Operable Unit 1 landfills), including detailed review comments by the U.S. Environmental Protection Agency and the Washington State Department of Ecology. Prepared a substantially revised baseline risk assessment report for submittal to the agencies.

Provided technical consultation for investigations of the BPA/OxyChem Tacoma Tideflats site, being addressed as an independent cleanup action under MTCA. Provided review of site investigation

GREGORY L. GLASS
Curriculum Vitae

Work Plan for CH2MHill, the lead consultant.

Prepared a review paper on the structure and application of EPA's Integrated Uptake Biokinetic (IU/BK) Model for evaluating lead exposures and risks in young children. Included a sensitivity analysis of the variations in predicted blood lead values as a function of variations in modeling parameters and assumptions.

Provided technical consultation on the design of a study of metals, especially lead, in Seattle yard wastes that are sent to the Cedar Grove (WA) composting facility. Reviewed data from Seattle Solid Waste Utility analysis of sampled yard waste materials and provided evaluations for inclusion in report on potential sources of metals and related actions.

Performed exposure and risk assessments for the Endangerment Assessment of the NL/Gould Superfund site in Portland (OR). Provided an evaluation of incorrect published acceptable intake values for lead and developed corrected values.

Provided review comments on the Draft RI/FS Work Plan for the Tulalip Landfill Superfund Site near Marysville, Washington. Helped negotiate a final detailed work plan that was accepted by U.S. EPA, Region 10 as part of a consent decree for starting site investigations.

Provided detailed technical review and consultation to the Washington State Department of Ecology for the Great Western Chemical Site, Seattle (WA). Reviewed preliminary site investigation data. Evaluated the proposed Remedial Investigation/Feasibility Study and Risk Assessment Work Plan and provided comments for necessary revisions, focusing on the site risk assessment to be performed and the development of site cleanup standards.

Provided technical review and consultation to the Washington State Department of Ecology for the LIDCO site, Kent (WA). Reviewed the extensive data sets from the LIDCO site and the adjacent Western Processing site. Evaluated the proposed use of available data, and planned collection of supplemental site data, for completion of a site risk assessment, and provided detailed review comments. Reviewed the preliminary Baseline Risk Assessment Report.

Performed a human health and environmental risk assessment for the General Metals site, Tacoma (WA). The evaluation focused on stormwater discharges and potential marine water/sediment contamination.

Assessed opportunities for early source reduction actions and ground water pollution prevention through better analysis of existing ground water monitoring data. Performed with Adolfson Associates, Inc. for U.S. EPA, Region 10. Focus of project was on development of a conceptual process and framework to achieve such pollution prevention goals. Included conceptual design of ground water data analysis tools and test applications to selected ground water monitoring data sets.

Performed an evaluation of human health and environmental risks associated with existing and potential future Region 10 Superfund sites (CERCLA/SARA) in support of a comprehensive U.S. EPA Region 10 Comparative Risk Study. Reviewed approximately 20 completed risk assessments for sites in Region 10.

Performed an evaluation of cumulative potential risks from all Washington State Superfund sites as part of the Washington Environment 2010 study. Included a review of available risk assessments for state sites.

Developed protocols for the site-specific determination of contaminant background concentrations, for use in defining cleanup criteria at Washington State MTCA sites. Prepared for Washington State Department of Ecology. Also provided consultation to Ecology for development of the Model Toxics Control Act regulations and preparation of a SEPA Environmental Impact Statement on the proposed Cleanup Regulation (Chapter 173-340 WAC).

Provided technical review and comments to the Washington State Department of Ecology during agency development of draft sampling guidance under MTCA.

Provided technical guidance and performed detailed assessments of statistical issues involved in the determination of cleanup standards based on background data under the Model Toxics Control Act, for the Washington State Department of Ecology. Performed senior technical review of and contributed to a statistics guidance document issued by Ecology for use by program staff and affected parties under the Model Toxics Control Act. Participated in Ecology Workshop for EPA staff describing the statistical procedures included in guidance.

Provided technical review and consultation for Ecology on statistical issues related to characterization and cleanup of the Hanford facility (WA). Prepared technical review comments for Ecology on a Hanford study using Monte Carlo techniques to evaluate the comparative performance of various statistical tests of compliance with background-based cleanup standards.

Provided technical review to EPA Region 10 for statistical determination of ground water background concentrations of monitoring constituents for the ASARCO Tacoma Smelter (WA). Performed detailed statistical evaluations of ground water background concentrations for development of a compliance monitoring and detection monitoring program for the Mica Landfill Superfund Site, Spokane County, Washington. Performed for the Washington State Department of Ecology.

Provided a technical summary of data relevant to human gastrointestinal absorption and plant uptake of arsenic from soil in support of Washington State Department of Ecology rulemaking under the Model Toxics Control Act.

Provided consultation to Unocal for performance of a risk assessment and development of cleanup criteria under a Consent Order for a site with ground water contamination in Anchorage (AK).

Performed a preliminary assessment of cleanup criteria for soil lead based on potential human health risks for the City of Skagway (AK).

Performed a review of the toxicity associated with exposures to carbon disulfide for the Leichner Brothers Landfill site (WA).

Reviewed and evaluated a risk assessment prepared by U.S. EPA, Region 10 for PCB exposures at the Northwest Transformer Everson (WA) site.

Performed a detailed review of published health risk values for 1,1-dichloroethylene. Discussions with EPA/CAG resulted in modification of the published oral potency factor for use in a Superfund site risk assessment (WA).

Performed a review and evaluation of PAH remedial action cleanup criteria for soils at sites in Washington.

Provided graphical data plots and statistical summaries of ground water monitoring data for the Puget Sound Byproducts Plant in Tacoma, Washington.

Reviewed and evaluated the Remedial Investigation/Feasibility Study, Endangerment Assessment, and other studies for the Cascade Pole wood treating site in Olympia (WA). Served as Project Manager for development of a new remedial alternative for the site and for the design and performance of additional site investigations.

Provided technical support and consultation to attorneys representing one Potentially Liable Person (PLP) at the Cascade Pole site in Olympia (WA). Prepared for defense of claims (contribution actions) against that PLP by other PLPs for the site.

Provided a technical review and evaluation of the Remedial Investigation Report and Feasibility Study Work Plan for the Colbert Landfill (WA) Superfund site for attorneys representing the designated Potentially Responsible Parties.

Provided a review and initial assessment of hydrocarbon contamination at the Pacific Northern Oil site (WA).

Managed the preparation of a RCRA Part B Permit Application for the Boeing Auburn (WA) manufacturing plant. Included extensive hydrogeologic site characterization studies.

Managed a RCRA-compliance ground water monitoring program for operating TSD facilities at the Boeing Auburn (WA) manufacturing plant.

Managed the preparation of a ground water assessment study triggered by ground water monitoring data at the Boeing Auburn (WA) manufacturing plant.

Managed the preparation of a RCRA waste delisting petition for the Boeing Auburn (WA) manufacturing plant. Delisting was approved by U.S. EPA.

Served as Project Manager for TSD Facility closure under RCRA at the Boeing Auburn (WA) manufacturing plant.

Prepared a limited RCRA Part B Permit Application, including TSD Facility closure and ground water monitoring program, for the Boeing of Portland (OR) manufacturing plant.

Performed regulatory and statistical data evaluations for RCRA closure of multiple TSD units at Waste Management's Arlington (OR) hazardous waste disposal site.

Performed detailed statistical analyses of closure data for the Chemical Processors, Inc. Parcel A RCRA site in Tacoma (WA).

Provided consultation on revisions to RCRA closure plans for multiple active TSD facilities operated by Chemical Processors, Inc. (WA).

Performed statistical data evaluations of ground water chemistry data from monitoring wells at the Weyerhaeuser Olympia facility (WA).

Conducted a RCRA compliance audit for the International Paper Company's Longview (WA) facility, including three separate operating divisions.

Served as Project Manager for a study of drilling mud reserve pit discharges at Prudhoe Bay (AK) involving exceedances of chromium discharge limitations.

Served as technical reviewer and consultant on detailed statistical analyses of RCRA ground water monitoring data collected for active TSD facilities at a manufacturing site (WA).

Performed Remedial Investigation data evaluations for soil and ground water contaminant data for the Toftdahl Drum and Frontier Hard Chrome Superfund sites (WA).

Designed a contaminant screening investigation for an industrial site near the Duwamish River (WA) to provide information for a potential sale of the property.

Managed a site screening investigation for contaminants at the proposed Pier 2 West Yard expansion site for the Port of Seattle (WA).

Served as the Principal Investigator for evaluation of soil and ground water PCB contamination at a former disposal site near the Duwamish River (WA). Provided technical and regulatory evaluations in support of real estate appraisals of site value for property transfer.

Performed a site selection study for a proposed hazardous waste treatment facility in western Washington. Conducted for a private industrial firm.

Performed site characterization and data evaluations for arsenic contamination of a Duwamish River (WA) industrial site. Conducted for a potential buyer of the property.

Provided technical assessments for the attorney representing an industrial firm (WA) in preparing a response to a U.S. EPA enforcement order under RCRA.

Provided a deposition as an expert witness in litigation involving contamination of private property by arsenic, cadmium, and other heavy metals from Tacoma Smelter (WA) air emissions.

Provided a deposition on chemical characterization and leaching of ASARCO Tacoma Smelter (WA) slag as evaluated in 1979-1981.

Provided a deposition as an expert witness in litigation involving remedial action cost contributions among Potentially Responsible Parties at a Superfund site in Washington.

Performed data evaluations and regulatory assessments for residual contamination at the Portland (OR) plant of Rhone Poulenc.

Prepared a case study of storm drain contaminated sediment removal actions in Puget Sound (WA) for a national handbook for estuarine program managers.

Environmental Impact Statements

Prepared major portions of a Washington State (SEPA) EIS for the development of cleanup standards for state Superfund sites under the Model Toxics Control Act. Washington State Department of Ecology was the lead agency.

Provided technical review and consultation on the Washington State (SEPA) EIS for Sediment Cleanup Standards developed by the Washington State Department of Ecology.

Served as Project Manager for preparation of Draft and Final EISs under SEPA for continued operation (post-1981) of the ASARCO Tacoma Smelter (WA). The Puget Sound Air Pollution Agency was the lead agency. Performed technical evaluations of acid precipitation impacts and SO_x, lead, and arsenic health effects from smelter operations.

Managed the preparation of an EIS to comply with Washington State's SEPA process for a proposed new Burlington Northern rail line connection traversing the City of Seattle's Cedar River Watershed (WA).

Managed the preparation of an EIS under NEPA for a proposed regional landfill on the Port Gamble Klallam Tribe reservation (WA). The Bureau of Indian Affairs was the lead agency.
Performed net energy impacts evaluation (including development of an assessment approach) for the light rail transit system and associated highway improvements of the Banfield Project in Portland (OR), as part of an EIS under NEPA for the Oregon State Department of Transportation.

Performed a net energy impacts analysis for the proposed regional Evergreen East shopping center (WA) as part of a Washington State (SEPA) EIS.

Performed regulatory and environmental compliance reviews for two high-voltage transmission lines (WA) for EISs under NEPA for the Bonneville Power Administration.

Performed air quality baseline evaluations as part of a site selection EIS under NEPA for the U.S. Navy Puget Sound Homeporting project (WA).

Siting and Other Environmental Studies

Performed evaluations of alternative sites for offshore oil platform assembly in Washington State for a major U.S. oil company.

Managed and developed decision criteria for a nuclear power plant siting study in Maryland for the Baltimore Gas & Electric Company.

Evaluated alternative product pipeline routes for the Nokota Coal Gasification Project. Alternative routes encompassed an area from U.S. west coast ports to Chicago.

Performed an evaluation of alternative sites in Minnesota for a proposed major forest products manufacturing plant.

Developed a scope of work for environmental studies and provided data evaluations for a proposal to the Synthetic Fuels Corporation for a grant for the Beach-Wibaux Coal Gasification Project (ND

and MT). Based on the developed proposal, a grant was awarded by the Synthetic Fuels Corporation to Tenneco.

Directed a sediment characterization study for proposed dredging near Terminal 5 for the Port of Seattle (WA).

Provided a permitting analysis for floodplain management issues for a proposed regional shopping center in Skagit County (WA).

Developed a method for reviewing potential impacts in Commencement Bay (WA) nearshore areas for projects requiring Section 10/404 permits. Study performed for Seattle District Corps of Engineers.

Performed environmental evaluations for the proposed Red Dog Mining Project in northwestern Alaska. Conducted for COMINCO.

Conducted a study of the major natural hazards of the Appalachian region and prepared a manual for residents of the region. Conducted for the Appalachian Regional Commission.

Provided technical support for the National Flood Insurance Program. Conducted field trials in California and Washington of a new approach to assessing and mapping alluvial fan flood hazards.

Established and managed an environmental regulations advisory group serving a 1,200-person consulting firm and its clients.

Served as a special assistant to the head of the National Flood Insurance Program with responsibility for database management, feasibility studies, policy and regulatory analyses, and coordination with federal, state, and local officials.

TECHNICAL PANELS

Invited member of a Nominal Group Technique panel evaluating alternative sites for a proposed coal-fired power plant for the Atlantic Electric Company (NJ).

Invited speaker on risk assessment practices and issues at the Science Behind Environmental Law Seminar of the Washington State Bar Association in February 1993.

Invited speaker at the Science and Policy Forum of the Washington State Department of Ecology in October 1994.

GREGORY L. GLASS
Curriculum Vitae

Participant in Design Review Meeting for EPA Region 10 reorganization project in March 1995.

Member of Washington State Department of Ecology Risk Assessment Forum TPH Subcommittee in 1995.

EDUCATION

B.A., Mathematics and Psychology, Yale University, 1969
----, Quantitative Psychology, University of Colorado, 1972-1974

AFFILIATIONS

1987-Present:	Independent Consultant
1986-1987:	Tetra Tech, Inc. Bellevue, Washington
1976-1986:	Dames & Moore Bethesda, Maryland and Seattle, Washington
1975-1976:	National Flood Insurance Program Washington, DC

METRO

King County Department of Metropolitan Services
Exchange Building • 821 Second Ave. • Seattle, WA 98104-1598 • (206) 684-1280

December 13, 1995

Ms. Connie Nakano
EPA/API Project Coordinator
Refugee Federation Service Center
7101 Martin Luther King Jr. Way S.
Seattle, WA 98118

Re: Letter of Acceptance for Providing In-Kind Services to Technical Committee for Asian/Pacific Islanders Seafood Consumption Study

Dear Connie:

This letter acknowledges that I am available to provide in-kind services to the Technical Committee for the Asian/Pacific Islanders Seafood Consumption Study. I anticipate that I will be providing approximately 4-8 hours per month to this project, on average (approximately 2 hrs/mo. for Technical Committee meetings, plus 2-6 hrs/mo. reviewing technical materials, providing written comments, etc.). Based on 4-8 hrs/mo., for 12 mos. (assumed 2,080 hour work year), this would represent roughly 2.3-4.6% of my professional time. This time estimate does not include other time that I am devoting to related seafood consumption issues (in general) on behalf of the King County Department of Metropolitan Services' Water Pollution Control Department.

Please feel free to call me at (206) 684-1258, contact me by fax at (206) 684-1741, or send me an e-mail (jon.shields@metrokc.gov) should you have any questions, comments, or concerns.

Sincerely,

Jonathan I. Shields

Jonathan I. Shields, M.P.H.
Water Quality Planner

JIS:jis

cc: Bob Swartz

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NAME/POSITION TITLE

Jonathan I. Shields, M.P.H., Technical Committee member

EDUCATION

CORNELL UNIVERSITY, College of Arts and Sciences, Section of Ecology, Systematics, and Evolutionary Biology, Ithaca, NY; Bachelor of Arts, May 1980; Biological Sciences

COLUMBIA UNIVERSITY, School of Public Health, Division of Environmental Sciences, New York, NY; Master of Public Health, January 1985; Environmental Sciences (concentration in Environmental Toxicology)

PROFESSIONAL EXPERIENCE

TETRA TECH, INC., Bellevue, WA (5/85—4/86)
Conducted risk assessments of human consumption of contaminated fish and shellfish, risks from Superfund-level hazardous waste sites, including arsenic in copper smelter emissions, PCBs and dioxins at a transformer recycling site, and aquatic application of herbicides.

PARAMETRIX, INC., Kirkland, WA (5/86—7/94)
Human Health Toxicologist (4/91—7/94)
Provided technical expertise on risk assessment, toxicology and public health issues related to hazardous and infectious wastes. Provided expert testimony on proposed hazardous air pollutant regulations. Prepared risk assessments of impacts of mining operations on edible fish species, municipal wastewater reclamation and reuse, and migration of toxic trace contaminants in subsurface landfill gas.
Public Health Specialist (5/86—4/91)
Supervised risk assessments and landfill gas and air sampling programs for Midway Landfill RI/FS; provided toxicology expertise; developed hazardous waste site ranking tools for Washington and Oregon.
Corporate Health and Safety Officer (5/86—4/91)
Developed and managed Superfund/WISHA-level health and safety, medical monitoring, and record-keeping programs; supervised on-site field activities at hazardous waste operations.
Quality Assurance Officer (10/92—7/94)
Conducted QA/QC audits of a multimillion-dollar long-term marine monitoring program for tributyltin in shellfish tissue, water and sediments.

[Contracted to provide professional technical services to:]
KING COUNTY DEPT. OF METROPOLITAN SERVICES, Seattle, WA (7/94—present)
Provide guidance to Metro upper management on NPDES permitting and environmental compliance issues. Oversee risk assessments related to reclamation and reuse of wastewater from Metro's treatment plants. Prepare risk communication materials aimed at regulatory agencies, water purveyors, and potential customers of reclaimed wastewater. Participate in technical committee for U.S. EPA-sponsored seafood consumption study, and Washington regulatory subcommittee of PNPCA Water Reclamation and Reuse Committee.

PUBLICATIONS/REPORTS

The following reports, prepared in whole or in part by Mr. Shields, included evaluation of risks to human health from consumption of chemically contaminated fish and shellfish.

Tetra Tech, Inc. July 10, 1985. Strandley Scrap Metal/Manning Property focused feasibility study. Prepared by Tetra Tech, Inc. Prepared for Seattle City Light, Seattle, Washington. 214p. + appendices.

Tetra Tech, Inc. September 1985. Health risk assessment for aquatic application of the herbicide 2,4-D in

the control of Eurasian watermilfoil. Prepared by Tetra Tech, Inc. Prepared for Evans-Hamilton, Inc., Seattle, Washington and U.S. Army Corps of Engineers, Seattle District, Seattle, Washington. 100p.

Tetra Tech, Inc. February 1986. Bioaccumulation monitoring guidance: 6. Assessment of potential human health hazards from priority pollutants in edible marine organisms. Prepared by Tetra Tech, Inc. Prepared for Marine Operations Division, Office of Marine and Estuarine Protection, U.S. Environmental Protection Agency WH-556M, Washington, D.C. 66p. + appendices.

Parametrix, Inc. December 2, 1991. Derivation of a site-specific water quality criterion for thallium in Big Creek, Iron County, Missouri (Draft). Prepared by Parametrix, Inc. Prepared for Asarco Missouri Lead Company. 18p. + appendices.

Parametrix, Inc. December 18, 1991. Comments of the Antimony Oxide Industry Association on EPA's proposed ambient water quality criteria for antimony. Prepared by Parametrix, Inc. Prepared for the Antimony Oxide Industry Association. 18p.

Parametrix, Inc. December 20, 1991. A focused assessment of human health risk: Lower Coeur d'Alene River drainage and Lake Coeur d'Alene. Prepared by Parametrix, Inc. in association with Environmental Toxicology International, Inc. Prepared for Council for Mineral Information, Coeur d'Alene, Idaho. 16p. + appendices.

Parametrix, Inc. May 1993. Human health risk assessment for the Pinal Creek WQARF site, Gila County, Arizona. Prepared by Parametrix, Inc. in association with Kleinfelder, Inc. Prepared for the Pinal Creek Group, Claypool, Arizona and Hydro Geo Chem, Inc., Tucson, Arizona. 153p. + appendices.

PROFESSIONAL MEETINGS/PRESENTATIONS

- Presented talk on risk assessment of municipal wastewater reclamation and reuse, Pacific Northwest Pollution Control Association meetings, Seattle, Washington. November 9, 1993.

- Poster exhibited at Society of Environmental Toxicology and Chemistry, *Risk Assessment of Tributyltin Residues in Seafood Throughout the United States: Monitoring Results and Risk Assessment.* November 1991.

CONTINUING PROFESSIONAL EDUCATION AND OTHER ACTIVITIES

- Participating in Technical Committee of U.S. EPA-sponsored Asian/Pacific Islanders Seafood Consumption Study on behalf of Refugee Federation Service Center, Seattle, Washington.

- Participating in Water Reclamation and Reuse Committee of the Pacific Northwest Pollution Control Association, including Washington regulatory subcommittee.

- Attended series of U.S. EPA workshops on establishing ambient water quality criteria and risk-based fish/shellfish consumption advisories. Seattle, WA. November 29-December 2, 1994.

Honors:

- Distinguished Undergraduate Teaching Award. June 1993.
  College of Ocean and Fishery Sciences
  University of Washington.

- Selected as Committee Co-chair of "Food Production and Sustainability" for Presidential White House Council Forum on Meeting the Challenge: Health, Safety and Food for America. Organized by Office of Technology Assessment (OTA), Washington, D.C. November 21-22, 1994.

- Honorary Life Member Award, World Aquaculture Society. February 1995.

Accomplishments in Research and Development to Assist the Shellfish Industry:

- Biotechnical development of the triploid (neutered) oyster through Sea Grant research at the University of Washington. Published (1990) manual with accompanying video with former students Stan Allen and Sandra Downing on how to produce the "all season" Pacific oyster for industry use. The largest oyster hatchery in the world (Coast Seafoods Inc) located at Quilcene, Washington, now annually produces over 20 billion eyed oyster larvae with over 50% triploidy for use in industry.

- Extensive studies conducted on methodologies to enhance Manila clam culture, one of the most important commercial steamer clam on the west coast of the U.S. An important 1992 Sea Grant manual entitled "Guide to Manila Clam Culture in Washington" was published with former graduate students (who all worked on the Manila clam project) and used extensively by commercial shellfish growers as well as private beach owners.

STATE OF WASHINGTON

DEPARTMENT OF HEALTH

Olympia, Washington 98504

December 13, 1995

Connie Nakano, Project Director
Refugee Federation Service Center
7101 Martin Luther King Jr. Way S.
Seattle, WA 98118

Dear Connie,

This letter is to confirm my commitment to participate on the Technical Advisory Committee of the Asian and Pacific Islander Seafood Consumption Study for the duration of the study. I understand that this may involve monthly meetings, as well as review of materials between meetings.

Sincerely,

Juliet VanEenwyk, Ph.D.
Director, Non-Infectious Conditions Epidemiology

JV:jl

VITA

NAME Juliet VanEenwyk

ADDRESS

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EDUCATION

University of Illinois in Chicago, School of Public Health, Department of Epidemiology and Biostatistics, Ph.D., 1990.

C.G. Jung Institute, Zurich, Switzerland, non-degree student in Depth Psychology, 1976-1977.

Roosevelt University, Chicago, M.S. in Clinical Psychology, with honors, 1975.

Harvard University, Cambridge, B.A. in Social Relations, cum laude, 1971.

INTERNSHIPS

1973-1974, Psychology Intern, Ray Graham Association for the Handicapped, Addison, IL: Behavior modification programming, staff training; parental training and counseling.

1969-1970, Psychology Intern, Fernald State School, Waltham, MA: Behavior modification programming, counseling, research assistant.

EXPERIENCE

1994, Section Director, Non-Infectious Disease Epidemiology, Washington State Department of Health, Olympia, WA: Provision of epidemiologic expertise and collaboration on public health projects investigating non-infectious diseases and conditions; development of surveillance infrastructure; supervision of others engaged in similar tasks in the section.

EXPERIENCE (continued)

1992-1994, Epidemiologist, Washington State Department of Health, Office of Toxic Substances, Olympia, WA: Investigation of environmentally related disease clusters; generation and interpretation of epidemiologic data for community assessment; technical support and scientific consultation for Department of Health Environmental Health Programs.

1990-1992, Epidemiologist, Illinois Department of Public Health, Office of Policy and Planning, Chicago, IL: Generation and interpretation of epidemiologic data to aid in state and local public health policy decisions and planning.

1987-1990, Teaching Assistant, Department of Epidemiology and Biostatistics, University of Illinois, Chicago, IL: Seminar leader, lecturer and teaching assistant.

1987-1989, Project Director, Cervical Dysplasia Project, University of Illinois, Chicago, IL: Co-principal investigator and director of multi-center case-control study of nutrition and cervical dysplasia funded by the American Cancer Society, Illinois Division.

1981-1985, Private Practice and Consulting, Chicago, IL: Counseling mildly to moderately retarded adults and their families; psychometric testing; teaching behavior analysis and therapy to direct service personnel.

1975-1976 and 1978-1980, Counselor, Jewish Vocational Service, Chicago, IL: evaluation of and counseling with emotionally disturbed and developmentally disabled adults.

INTERNATIONAL EXPERIENCE

1971-1972, Chairperson, Mathematics Department, Maggotty Junior Secondary School, Jamaica, W.I.: Responsible for organization of mathematics program, supervision of teachers, mathematics instruction.

Summer 1969, Participant in Crossroads Africa: Manual labor in the construction of a school in southern Chad.

HONORS

1985-1989, Graduate College Fellowship, University of Illinois, Chicago, IL

Phi Kappa Phi Honor Society

PEER REVIEW PUBLICATIONS

Jovanovic, B., Freels, S., Davis, F. and **VanEenwyk, J.** Nutrient Density Model Revisited. *Nutrition Research*, 14(5):765-774, 1994.

Amburgey, C.F., **VanEenwyk, J.**, Davis, F.G., Bowen, P., Persky, V. and Goldberg, J. Undernutrition as a risk factor for cervical intraepithelial neoplasia: a case-control analysis. *Nutrition and Cancer*, 20(1):51-60, 1993.

VanEenwyk, J., Davis, F.G. and Colman, N. Folate, vitamin C and cervical intraepithelial neoplasia. *Cancer Epidemiology, Biomarkers and Prevention*, 1:119-124, 1992.

VanEenwyk, J., Davis, F.G. and Bowen, P.E. Dietary and serum carotenoids and cervical intraepithelial neoplasia. *International Journal of Cancer*, 48:34-38, 1991.

OTHER PUBLICATIONS AND REPORTS

Sugarman, J.R. and **VanEenwyk, J.** *Adverse Reproductive Outcomes on the Shoalwater Bay Indian Reservation, 1982-1992, Final Report to the Shoalwater Bay Tribal Council.* October, 1993.

VanEenwyk, J. The Role of Vitamins in the Development of Cervical Cancer. *The Nutrition Report*, 11(1), 1993.

Illinois Department of Public Health. *Statewide Health Needs Assessment: Toward a Healthy Illinois 2000*. September, 1993. **VanEenwyk, J.** included as a major contributor.

Ferguson, R. and **VanEenwyk, J.** The effect of socio-economic status on repeat teen births in Chicago, Illinois. In: Illinois Department of Public Health and Institute for Government and Public Affairs at the University of Illinois (eds.), *Opportunities for Action: Policies for Addressing Repeat Births to Teens and Single Young Adults*, 1991.

PRESENTATIONS

Small Area Analysis in Washington. Second Conference of Statistics and Computing in Disease Clustering. National Cancer Institute and Electric Power Research Institute, Vancouver, Canada, 1994

Respiratory Health in Port Angeles, Washington. American Public Health Association, San Fransisco, CA, 1993.

Clusters of Non-Infectious Disease. Washington State Infectious Disease Conference, Yakima, WA, 1993.

Respiratory Health in Port Angeles: Setting the Stage and Collecting Data. Washington State Data Users Conference, Yakima, WA, 1993.

Tracking Outcomes for Preventive Health and Health Services Block Grant Funded Programs. Illinois Public Health Association, Peoria, IL, 1992.

PRESENTATIONS (continued)

Using Hospital Discharge Data for Surveillance, American Public Health Association, Atlanta, GA, 1991.

Folates, Vitamin C and Cervical Intraepithelial Neolplasia. International Association for Cancer Registries, Hamburg, Germany, 1990.

Carotenoids and Cervical Intraepithelial Neolplasia. Society for Epidemiologic Research, Snowbird, UT, 1990.

GRANTS

Centers for Disease Control, 1991 ($500,000): Co-investigator for the Illinois State and Community-Based Childhood Lead Poisoning Prevention Program.

Public Health Foundation, 1990 ($35,000): Co-principal investigator to develop computer system to evaluate local public health programming.

University of Illinois Biomedical Sciences Research Grant, 1990 ($6,500): Co-investigator for malnutrition and cervical intraepithelial neoplasia project.

American Cancer Society, Illinois Division, 1987 ($35,000): Co-principal investigator for nutrition and cervical intraepithelial neoplasia project.

Illinois Cancer Council Developmental Funds Grant, 1987 ($10,000): Co-principal investigator for nutrition and cervical intraepithelial neoplasia project.

Lauren Elizabeth Evans, MD.
Rainier Center Clinic
7101 Martin Luther King Jr. Way S.
Suite 217
Seattle, WA, 98118
(206) 722-7786

EMPLOYMENT EXPERIENCE

Private Practice
Primary Care, 7/94-present
Serving Seattle's immigrants and particularly the Southeast Asian community.

American Red Cross-Cambodia
Medical Coordinator, 4/93-11/93

Coordinated the medical activities of AmCross with the Cambodian Ministry of Health, International Committee of the Red Cross, other National Red Cross Societies, International and Non-Governmental Organizations working in Cambodia.
Technical Advisor to the Kampong Speu Provincial Health Department.
Representative of the international NGO's working in Kampong Speu Province to the Provincial Coordinating Committee Secretariat.
Directed AmCross medical activities at Kampong Speu Provincial Hospital including Nursing Inservice Education; Physician Continuing Medical Education, and Hospital Management Committee.
Consultant to Surgery, General Medicine, Infectious Diseases, Tuberculosis, Malaria, Pediatric, Obstetrics/Gynecology, and Intensive Care Wards Kampong Speu Provincial Hospital.
Planned projects, prepared project proposals, work plans, job descriptions, monthly reports.
Served as an advisor at seminars presented by WHO and the Ministry of Health training Provincial Health Directors to set goals, objectives, and write project plans.
Served on MEDICAM (Cambodia's NGO Medical Professional Association) Primary Health Care Committee, Provisional Steering Committee, and participated in the rewriting of the Charter.

International Rescue Committee-Thailand, Khao I Dang Refugee Camp, Thai-Cambodian border
Out-Patient Department Coordinator (5/90-3/93)
UNHCR Repatriation Medical Officer (12/91-3/93)
Supervisor of Extremely Vulnerable Individuals' Repatriation (12/91-3/93)

Supervision of 55 Khmer and 3 expatriate Out-Patient Department staff.
Provided general primary medical care.
Consulted in the hospital wards, the Rehabilitation Unit, the Traditional Medicine Center and Psychiatric Ward, the Public Health Department, and the Maternal Child Health Clinics.
Oversaw daily clinical teaching, and Continuing Medical Education Seminars.
Reorganized the OPD structure to institute Khmer self-management which included improving the clinical skills of the Medics so that most of them could work independently.
Identified and evaluated Medically-at-Risk patients (predominantly pediatric congenital heart defects) and with approval of the MAR Committee acted as advocate for their compassionate emigration for life saving medical and/or surgical treatment. This involved much correspondence with third countries who accept such cases and donors who are able to finance their treatment.

Identified and was involved in investigating and reporting the unusually large isolated outbreak of Beriberi in KID over a period of approximately 1 1/2 years which resulted in an improvement in the food ration for camp residents.

Active in the development of protocols for Medical Screening of the 380,000 displaced Khmer living in camps in Thailand upon their Repatriation to Cambodia (1992-93) including 'Extremely Vulnerable Individuals' (EVI's).

Recruited and supervised expatriate and Khmer medical staff of the Repatriation Staging/Transit Area; and acted as a liaison for the coordination of the activities involved in repatriation of the EVI's from KID and also those residual cases left after the closure of the other camps who moved to KID because of their complicated situations.

Escorted the most severely ill and handicapped upon closure of KID Camp when they were transported by bus and train to facilities in Phnom Penh.

My contract ended with the closure of Khao I Dang Camp and the termination of IRCs medical work on the Thai-Cambodian Border.

Private Practice, Seattle, Washington
1986-1990

Primary Care Medicine.
On Staff at Riverton General Hospital and Highline Hospital.
Vice Chief of Staff Riverton General Hospital,1989.
Served as medical consultant for girls at the Ruth Dykeman Children's Center.

University of Texas Health Sciences Center, Houston, Texas.
Research Technician, Department of Reproductive Biology, 1976-1977

Project: The role of Prostaglandins in the synthesis of FSH and LH in rat testes.

Hermann Hospital, Houston Texas
Critical Care Registered Nurse, Surgical Intensive Care and Trauma Unit, 1975-1977

Peace Corps- San Pedro Sula, Honduras.
Nursing Instructor, Leonardo Martinez V Hospital, 1973-1975

Trained 90 Practical Nurses who were working without any prior training in the government run 400 bed Leonardo Martinez V Hospital.

Worked with community health workers and missions who ran small clinics in surrounding villages to set up a referral system to the hospital.

EDUCATION

Texas Woman's University, Denton, Texas, BSRN, Nursing, 1969.
University of Texas Medical Branch, Galveston, Texas, MD, 1981.
University of Rochester, Rochester, New York, Surgical Internship, 1981-1982.
University of Rochester, Rochester, New York, Residency in Otolaryngology, Head and Neck Surgery, 1982-1984.

OTHER SKILLS

Languages: English, Khmer (Cambodian), Spanish, Thai, French. I am learning Vietnamese at present.

WASHINGTON STATE MEDICAL LICENSE: 0023634 12/95

PUGET SOUNDKEEPER℠ ALLIANCE

Protecting & Enhancing Puget Sound

:15 W. DRAVUS
SEATTLE,
WASHINGTON
98119

PHONE
206. 286. 1309

FACSIMILE
206. 286. 1082

February 6, 1996

Connie Nakano
Refugee Federation Service Center
7101 Martin Luther King Jr. Way S.
Seattle WA 98118

Dear Connie,

With this letter we offer our support for the Asian and Pacific Islander Seafood Consumption Study. I also agree to serve on the Advisory Committee for this Study and to assist in any other way deamed appropriate and within our resources.

I look forward to working with you and the other committee members on a project we consider very important and significant for the Asian and Pacific Islander communities of the Pacific Northwest.

Sincerely,

Roberta M. Gunn

Roberta M. Gunn
Executive Director

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 10
1200 Sixth Avenue
Seattle, Washington 98101

Reply To
Attn Of: WD-139

Connie Nakano
Project Coordinator
Refugee Federation Service Center
7101 Martin Luther King Jr. Way So.
Seattle, WA 98118

Dear Ms. Nakano:

I will be happy to provide service on the Advisory Committee on the Asian and Pacific Islander Seafood Consumption Study. I will provide in-kind match time to the life of the grant through Phase 2 of this study to its completion.

The study is of great potential benefit to the Asian Pacific Islander community because they are believed to consume and prepare seafoods in many ways which may contribute to contaminant exposure and health risk. The information that will be developed through your study will directly contribute to the development of more protective water quality standards.

I am pleased to see the progress of the study so far and look forward to providing further support to the next part of the project. If you have any questions, you may call me at (206) 553-0176.

Sincerely,

Marcia Lagerloef

Marcia Lagerloef
Water Quality Standards Coordinator
Water Quality Unit

Marcia G. Lagerloef
EPA
Mail Stop WD-139
1200 Sixth Avenue
Seattle, Washington 98101

EDUCATION

M.S. Biological Oceanography, 1972, University of Washington

B.S. Biology, cum laude, 1968, Bucknell University

EMPLOYMENT EXPERIENCE

Management of environmental programs, with an emphasis on water quality

Water Quality Standards Coordinator, EPA, 1991-present

Support states and tribes in development and review of water quality standards for surface waters to protect human health and aquatic organisms. Particular areas of emphasis: human health criteria, biological criteria, tribal policy and environmental justice concerns related to water quality protection.

Chief, Environmental Evaluation Branch, EPA, 1985-1987

Chief, Ocean Programs Section, EPA, 1983-1985

Chief, Water Permits Section, EPA, 1981-1983

Chief, Marine Outfall Modification Section, EPA, 1980-1981

Research program development and funding, conduct of marine research.

Consultant to Puget Sound Water Quality Authority, 1991

Senior Oceanographer, NOAA Oceanic and Atmospheric Research, 1988-1990

Oceanographer, Committee on Research, Puget Sound Water Quality Authority, 1987-1988

Assistant to the Director, NOAA Pacific Marine Environmental Laboratory, 1977-1980

Assistant Program Director, Biological

Oceanography, National Science Foundation, 1973-1976

Research Assistant, Chesapeake Bay Institute, The Johns Hopkins University, 1968-1969, 1972-1973

COMMUNITY EXPERIENCE

Board Member, Bainbridge Education Support Team

Board Member, South Bainbridge Community Association

Chair, Bainbridge Island Shorelines Management Program Workgroup

St. Barnabas Church Vestry

Co-chair, Blakely Elementary School Environmental Enrichment Program

UNITED STATES DEPARTMENT OF COMMERCE
National Oceanic and Atmospheric Administration
NATIONAL MARINE FISHERIES SERVICE

Northwest Fisheries Science Center
Utilization Research Division
2725 Montlake Boulevard East
Seattle, Washington 98112
Telephone (206) 860-3380
FAX (206) 860-3394

Ms. Connie Nakano
Project Coordinator
Refugee Federation Service Center
7101 Martin Luther King Jr. Way South
Seattle, WA 98118

Dear Ms. Nakano,

I would be pleased to continue to provide service on the Advisory Committee on the Asian and Pacific Islander Seafood Consumption Study. I will provide in kind match time to the life of grant through Phase 2 of this study to its completion.

The study is greatly beneficial to the Asian and Pacific Islander community because they are believed to consume and prepare seafoods in many ways which may contribute to contaminant exposure and health risks.

I am pleased to see the progress of the study so far and look forward to providing further support to the next part of the project.

Sincerely,

John C. Wekell, PhD.
Research Chemist

STATE OF WASHINGTON
DEPARTMENT OF ECOLOGY
Mail Stop PV-11 • Olympia, Washington 98504-8711 • (206) 459-6000

February 15, 1996

Ms. Connie Nakano
EPA/API Project Coordinator
Refugee Federation Service Center
7101 Martin Luther King Jr. Way S.
Seattle, WA 98118

RE: Letter of Acceptance for Providing In-Kind Services to Advisory Committee for Asian and Pacific Islander Seafood Consumption Study

Dear Connie:

This letter acknowledges that I am available to provide in-kind services to the Advisory Committee for the Asian and Pacific Islander Seafood Consumption Study. I expect to continue serving on the Advisory Committee for the duration of the project.

Since I do not currently have an up-to-date C.V., I am including a brief description of my qualifications below:

I have been the Project Manager for development of human health sediment criteria at the Department of Ecology for nearly 3 years. I have a Master of Public Health in Environmental Health from the University of California at Berkeley. My Bachelor's degree is in Human Ecology from Rutgers University. I am working as a Toxicologist for Central Programs and am currently a member (and former Chair) of Ecology's Risk Assessment Forum.

Thank you for the opportunity to be involved in this study effort. Please feel free to call me at (360) 407-7446 if you have any questions or concerns.

Sincerely,

Laura B. Weiss

Laura B. Weiss, M.P.H.

cc: Dave Bradley

Appendix B.

Focus Group Evaluations

Asian and Pacific Islander Seafood Consumption Study
Focus Group Testing Session
Evaluation Questionnaire

Date APR. 29 /96

Name KE-SANG CHUN

Please circle your ethnicity

Cambodian	Chinese	Filipino	Hmong	Japanese	Korean
Lao	Mien	Samoan	Vietnamese		

Please evaluate the following categories based on your judgment of the Asian and Pacific Islander Seafood Consumption Study Questionnaire. Please take your time. If you have any questions, please ask the E.P.A. Project Coordinator.

CONTENT

1. Do you feel the questions are intrusive or insensitive? YES NO

a. If yes, please state your reason(s) why and which questions seem intrusive or insensitive.

_____

_____

2. Please rate the length of the questionnaire.

LONG AVERAGE SHORT

FORMAT

1. Do the questions flow logically and smoothly section to section?

ALWAYS SOMETIMES NEVER

a. If "SOMETIMES" or "NEVER," please state your reason(s) why and which question(s) should be rearranged?_____

WORDING/LANGUAGE/TRANSLATION

1. Is the use of language clear and concise? Do the questions read easily?

ALWAYS SOMETIMES NEVER MOST OF THE TIME

2. Is the translation thorough and accurate enough? YES NO

PRESENTATION AND USE OF THE VISUAL DISPLAYS

1. Are the usage of the visual displays (seafoods) effective and helpful in answering the questions?

YES NO

a. If no, please state your reason(s) why._____

2. Are the visual displays of seafood easily identifiable?

YES NO

a. If no, please state your reason(s) why._____

3. Are the use of the maps effective?

YES NO

a. If no, please state your reason(s) why._____

MISCELLANEOUS

1. Are there any other recommendations which should be made to improve the questionnaire? Yes, they were given during the work session.

2. Overall, how would you rate the questionnaire?

EXCELLENT GOOD AVERAGE POOR

Thank you very much for your cooperation and participation in the Asian and Pacific Islander Seafood Consumption Study.

Asian and Pacific Islander Seafood Consumption Study
Focus Group Testing Session
Evaluation Questionnaire

Date 4-29-96

Name SEJA CHO

Please circle your ethnicity

Cambodian	Chinese	Filipino	Hmong	Japanese	Korean
Lao	Mien	Samoan	Vietnamese		

Please evaluate the following categories based on your judgment of the Asian and Pacific Islander Seafood Consumption Study Questionnaire. Please take your time. If you have any questions, please ask the E.P.A. Project Coordinator.

CONTENT

1. Do you feel the questions are intrusive or insensitive? YES NO

a. If yes, please state your reason(s) why and which question(s) seem intrusive or insensitive.

_____

_____

2. Please rate the length of the questionnaire.

LONG AVERAGE SHORT

FORMAT

1. Do the questions flow logically and smoothly section to section?

ALWAYS SOMETIMES NEVER

a. If "SOMETIMES" or "NEVER," please state your reason(s) why and which question(s) should be rearranged_____

WORDING/LANGUAGE/TRANSLATION

1. Is the use of language clear and concise? Do the questions read easily?

ALWAYS SOMETIMES NEVER

2. Was it easy to translate the questionnaire? YES NO

a. If no, please state your reason(s) why._____

PRESENTATION AND USE OF THE VISUAL DISPLAYS

1. Were the use of visual displays and maps easy to coordinate with the questions in the questionnaire?

YES NO

a. If no, please state your reason(s)why. Instead of pictures, if you have three dimensional (clay etc) models, that would help the interviewee to identify some of the species.

MISCELLANEOUS

1. Are there any other recommendations which should be made to improve the questionnaire?

YES NO

a. If yes, please explain. charts for the interviewer to fill out more easily.

2. Overall, how would you rate the questionnaire?

EXCELLENT GOOD AVERAGE POOR

Thank you very much for your cooperation and participation in the Asian and Pacific Islander Seafood Consumption Study.

Translator(s)

Asian and Pacific Islander Seafood Consumption Study
Focus Group Testing Session
Evaluation Questionnaire

Date 4-29-96

Name SAO K. TAUSILI

Please circle your ethnicity

Cambodian	Chinese	Filipino	Hmong	Japanese	Korean
Lao	Mien	Samoan	Vietnamese		

Please evaluate the following categories based on your judgment of the Asian and Pacific Islander Seafood Consumption Study Questionnaire. Please take your time. If you have any questions, please ask the E.P.A. Project Coordinator.

CONTENT

1. Do you feel the questions are intrusive or insensitive? YES NO

a. If yes, please state your reason(s) why and which question(s) seem intrusive or insensitive.

_____

_____

2. Please rate the length of the questionnaire.

LONG AVERAGE SHORT

FORMAT

1. Do the questions flow logically and smoothly section to section?

ALWAYS SOMETIMES NEVER

a. If "SOMETIMES" or "NEVER," please state your reason(s) why and which question(s) should be rearranged ~~[illegible]~~

WORDING/LANGUAGE/TRANSLATION

1. Is the use of language clear and concise? Do the questions read easily? yes/yes

ALWAYS SOMETIMES NEVER

2. Was it easy to translate the questionnaire? YES NO

a. If no, please state your reason(s) why._____

PRESENTATION AND USE OF THE VISUAL DISPLAYS

1. Were the use of visual displays and maps easy to coordinate with the questions in the questionnaire?

YES NO

a. If no, please state your reason(s)why._____

MISCELLANEOUS

1. Are there any other recommendations which should be made to improve the questionnaire?

YES NO

a. If yes, please explain. Need to shorten some of the lengthy directions

2. Overall, how would you rate the questionnaire?

EXCELLENT GOOD AVERAGE POOR

Thank you very much for your cooperation and participation in the Asian and Pacific Islander Seafood Consumption Study.

Translator(s)

Asian and Pacific Islander Seafood Consumption Study
Focus Group Testing Session
Evaluation Questionnaire

Date 4-29-96

Name Chief Mateola Maiia.

Please circle your ethnicity

Cambodian	Chinese	Filipino	Hmong	Japanese	Korean
Lao	Mien	Samoan	Vietnamese		

Please evaluate the following categories based on your judgment of the Asian and Pacific Islander Seafood Consumption Study Questionnaire. Please take your time. If you have any questions, please ask the E.P.A. Project Coordinator.

CONTENT

1. Do you feel the questions are intrusive or insensitive? YES NO

a. If yes, please state your reason(s) why and which questions seem intrusive or insensitive.

_____

_____

2. Please rate the length of the questionnaire.

LONG AVERAGE SHORT

FORMAT

1. Do the questions flow logically and smoothly section to section?

ALWAYS SOMETIMES NEVER

a. If "SOMETIMES" or "NEVER," please state your reason(s) why and which question(s) should be rearranged?_____

WORDING/LANGUAGE/TRANSLATION

1. Is the use of language clear and concise? Do the questions read easily?

ALWAYS SOMETIMES NEVER

2. Is the translation thorough and accurate enough? YES NO

PRESENTATION AND USE OF THE VISUAL DISPLAYS

1. Are the usage of the visual displays (seafoods) effective and helpful in answering the questions?

YES NO

a. If no, please state your reason(s) why._____

2. Are the visual displays of seafood easily identifiable?

YES NO

a. If no, please state your reason(s) why._____

3. Are the use of the maps effective?

YES NO

a. If no, please state your reason(s) why._____

MISCELLANEOUS

1. Are there any other recommendations which should be made to improve the questionnaire?

2. Overall, how would you rate the questionnaire?

EXCELLENT GOOD AVERAGE POOR

Thank you very much for your cooperation and participation in the Asian and Pacific Islander Seafood Consumption Study.

Asian and Pacific Islander Seafood Consumption Study
Focus Group Testing Session
Evaluation Questionnaire

Date Apr May 2nd 1996

Name Nguyen, Thuc v.

Please circle your ethnicity

Cambodian	Chinese	Filipino	Hmong	Japanese	Korean
Lao	Mien	Samoan	(Vietnamese)		

Please evaluate the following categories based on your judgment of the Asian and Pacific Islander Seafood Consumption Study Questionnaire. Please take your time. If you have any questions, please ask the E.P.A. Project Coordinator.

CONTENT

1. Do you feel the questions are intrusive or insensitive? (YES) NO

a. If yes, please state your reason(s) why and which questions seem intrusive or insensitive.

Show portion model, picture card

2. Please rate the length of the questionnaire.

LONG (AVERAGE) SHORT

FORMAT

1. Do the questions flow logically and smoothly section to section?

(ALWAYS) SOMETIMES NEVER

a. If "SOMETIMES" or "NEVER," please state your reason(s) why and which question(s) should be rearranged?

WORDING/LANGUAGE/TRANSLATION

1. Is the use of language clear and concise? Do the questions read easily?

ALWAYS SOMETIMES NEVER

2. Is the translation thorough and accurate enough? YES NO

PRESENTATION AND USE OF THE VISUAL DISPLAYS

1. Are the usage of the visual displays (seafoods) effective and helpful in answering the questions?

YES NO

a. If no, please state your reason(s) why._____

2. Are the visual displays of seafood easily identifiable?

YES NO

a. If no, please state your reason(s) why._____

3. Are the use of the maps effective?

YES NO

a. If no, please state your reason(s) why._____

MISCELLANEOUS

1. Are there any other recommendations which should be made to improve the questionnaire? NO

2. Overall, how would you rate the questionnaire?

EXCELLENT GOOD AVERAGE POOR

Thank you very much for your cooperation and participation in the Asian and Pacific Islander Seafood Consumption Study.

Asian and Pacific Islander Seafood Consumption Study
Focus Group Testing Session
Evaluation Questionnaire

Date 05 / 02 / 96

Name Lê, Thu N

Please circle your ethnicity

Cambodian	Chinese	Filipino	Hmong	Japanese	Korean
Lao	Mien	Samoan	(Vietnamese)		

Please evaluate the following categories based on your judgment of the Asian and Pacific Islander Seafood Consumption Study Questionnaire. Please take your time. If you have any questions, please ask the E.P.A. Project Coordinator.

CONTENT

1. Do you feel the questions are intrusive or insensitive? (YES) NO

a. If yes, please state your reason(s) why and which questions seem intrusive or insensitive.

show portion model picture card

2. Please rate the length of the questionnaire.

LONG (AVERAGE) SHORT

FORMAT

1. Do the questions flow logically and smoothly section to section?

(ALWAYS) SOMETIMES NEVER

a. If "SOMETIMES" or "NEVER," please state your reason(s) why and which question(s) should be rearranged?

WORDING/LANGUAGE/TRANSLATION

1. Is the use of language clear and concise? Do the questions read easily?

ALWAYS SOMETIMES NEVER

2. Is the translation thorough and accurate enough? YES NO

PRESENTATION AND USE OF THE VISUAL DISPLAYS

1. Are the usage of the visual displays (seafoods) effective and helpful in answering the questions?

YES NO

a. If no, please state your reason(s) why._____

2. Are the visual displays of seafood easily identifiable?

YES NO

a. If no, please state your reason(s) why._____

3. Are the use of the maps effective?

YES NO

a. If no, please state your reason(s) why._____

MISCELLANEOUS

1. Are there any other recommendations which should be made to improve the questionnaire? NO

2. Overall, how would you rate the questionnaire?

EXCELLENT GOOD AVERAGE POOR

Thank you very much for your cooperation and participation in the Asian and Pacific Islander Seafood Consumption Study.

Asian and Pacific Islander Seafood Consumption Study
Focus Group Testing Session
Evaluation Questionnaire

Date 5/2/96

Name OANH TRAN

Please circle your ethnicity

Cambodian	Chinese	Filipino	Hmong	Japanese	Korean
Lao	Mien	Samoan	Vietnamese		

Please evaluate the following categories based on your judgment of the Asian and Pacific Islander Seafood Consumption Study Questionnaire. Please take your time. If you have any questions, please ask the E.P.A. Project Coordinator.

CONTENT

1. Do you feel the questions are intrusive or insensitive? YES NO

a. If yes, please state your reason(s) why and which question(s) seem intrusive or insensitive.

show the portion & seafood model.

2. Please rate the length of the questionnaire.

LONG AVERAGE SHORT

FORMAT

1. Do the questions flow logically and smoothly section to section?

ALWAYS SOMETIMES NEVER

a. If "SOMETIMES" or "NEVER," please state your reason(s) why and which question(s) should be rearranged

WORDING/LANGUAGE/TRANSLATION

1. Is the use of language clear and concise? Do the questions read easily?

ALWAYS SOMETIMES NEVER

2. Was it easy to translate the questionnaire? YES NO

a. If no, please state your reason(s) why._____

PRESENTATION AND USE OF THE VISUAL DISPLAYS

1. Were the use of visual displays and maps easy to coordinate with the questions in the questionnaire?

YES NO

a. If no, please state your reason(s)why._____

MISCELLANEOUS

1. Are there any other recommendations which should be made to improve the questionnaire?

YES NO

a. If yes, please explain._____

2. Overall, how would you rate the questionnaire?

EXCELLENT GOOD AVERAGE POOR

Thank you very much for your cooperation and participation in the Asian and Pacific Islander Seafood Consumption Study.

Translator(s)

Asian and Pacific Islander Seafood Consumption Study
Focus Group Testing Session
Evaluation Questionnaire

Date 4/30/96

Name CHANTHONE CHIN

Please circle your ethnicity

Cambodian	Chinese	Filipino	Hmong	Japanese	Korean
Lao	Mien	Samoan	Vietnamese		

Please evaluate the following categories based on your judgment of the Asian and Pacific Islander Seafood Consumption Study Questionnaire. Please take your time. If you have any questions, please ask the E.P.A. Project Coordinator.

CONTENT

1. Do you feel the questions are intrusive or insensitive? YES NO

a. If yes, please state your reason(s) why and which questions seem intrusive or insensitive.

_____

_____

2. Please rate the length of the questionnaire.

LONG AVERAGE SHORT

FORMAT

1. Do the questions flow logically and smoothly section to section?

ALWAYS SOMETIMES NEVER

a. If "SOMETIMES" or "NEVER," please state your reason(s) why and which question(s) should be rearranged?_____

WORDING/LANGUAGE/TRANSLATION

1. Is the use of language clear and concise? Do the questions read easily?

ALWAYS SOMETIMES NEVER

2. Is the translation thorough and accurate enough? YES NO

PRESENTATION AND USE OF THE VISUAL DISPLAYS

1. Are the usage of the visual displays (seafoods) effective and helpful in answering the questions?

YES NO

a. If no, please state your reason(s) why._____

2. Are the visual displays of seafood easily identifiable?

YES NO

a. If no, please state your reason(s) why._____

3. Are the use of the maps effective?

YES NO

a. If no, please state your reason(s) why._____

MISCELLANEOUS

1. Are there any other recommendations which should be made to improve the questionnaire?

2. Overall, how would you rate the questionnaire?

EXCELLENT GOOD AVERAGE POOR

Thank you very much for your cooperation and participation in the Asian and Pacific Islander Seafood Consumption Study.

Asian and Pacific Islander Seafood Consumption Study
Focus Group Testing Session
Evaluation Questionnaire

Date 4-30-96

Name Khouvanh Mekkhavong

Please circle your ethnicity

Cambodian	Chinese	Filipino	Hmong	Japanese	Korean
Lao	Mien	Samoan	Vietnamese		

Please evaluate the following categories based on your judgment of the Asian and Pacific Islander Seafood Consumption Study Questionnaire. Please take your time. If you have any questions, please ask the E.P.A. Project Coordinator.

CONTENT

1. Do you feel the questions are intrusive or insensitive? YES NO

a. If yes, please state your reason(s) why and which question(s) seem intrusive or insensitive.

2. Please rate the length of the questionnaire.

LONG AVERAGE SHORT

FORMAT

1. Do the questions flow logically and smoothly section to section?

ALWAYS SOMETIMES NEVER

a. If "SOMETIMES" or "NEVER," please state your reason(s) why and which question(s) should be rearranged Some question I never use in the way to cook.

WORDING/LANGUAGE/TRANSLATION

1. Is the use of language clear and concise? Do the questions read easily? yes.

ALWAYS SOMETIMES NEVER

2. Was it easy to translate the questionnaire? YES NO

a. If no, please state your reason(s) why._____

PRESENTATION AND USE OF THE VISUAL DISPLAYS

1. Were the use of visual displays and maps easy to coordinate with the questions in the questionnaire?

YES NO

a. If no, please state your reason(s)why._____

MISCELLANEOUS

1. Are there any other recommendations which should be made to improve the questionnaire?

YES NO

a. If yes, please explain. put more thing about cooking.

2. Overall, how would you rate the questionnaire?

EXCELLENT GOOD AVERAGE POOR

Thank you very much for your cooperation and participation in the Asian and Pacific Islander Seafood Consumption Study.

Translator(s)

Asian and Pacific Islander Seafood Consumption Study
Focus Group Testing Session
Evaluation Questionnaire

Date MAY 1996

Name HELEN S. BARBER

Please circle your ethnicity

Cambodian	Chinese	Filipino	Hmong	Japanese	Korean
Lao	Mien	Samoan	Vietnamese		

Please evaluate the following categories based on your judgment of the Asian and Pacific Islander Seafood Consumption Study Questionnaire. Please take your time. If you have any questions, please ask the E.P.A. Project Coordinator.

CONTENT

1. Do you feel the questions are intrusive or insensitive? YES NO

a. If yes, please state your reason(s) why and which questions seem intrusive or insensitive.

_____

_____

2. Please rate the length of the questionnaire.

LONG AVERAGE SHORT

FORMAT

1. Do the questions flow logically and smoothly section to section?

ALWAYS SOMETIMES NEVER

a. If "SOMETIMES" or "NEVER," please state your reason(s) why and which question(s) should be rearranged?_____

Asian and Pacific Islander Seafood Consumption Study
Focus Group Testing Session
Evaluation Questionnaire

Date 5-3-96

Name CLEOFE C. OBRAS

Please circle your ethnicity

Cambodian Chinese Filipino Hmong Japanese Korean
Lao Mien Samoan Vietnamese

Please evaluate the following categories based on your judgment of the Asian and Pacific Islander Seafood Consumption Study Questionnaire. Please take your time. If you have any questions, please ask the E.P.A. Project Coordinator.

CONTENT

1. Do you feel the questions are intrusive or insensitive? YES NO

a. If yes, please state your reason(s) why and which question(s) seem intrusive or insensitive.

_____

_____

2. Please rate the length of the questionnaire.

LONG AVERAGE SHORT

FORMAT

1. Do the questions flow logically and smoothly section to section?

ALWAYS SOMETIMES NEVER

a. If "SOMETIMES" or "NEVER," please state your reason(s) why and which question(s) should be rearranged_____

WORDING/LANGUAGE/TRANSLATION

1. Is the use of language clear and concise? Do the questions read easily?

ALWAYS SOMETIMES NEVER

2. Was it easy to translate the questionnaire? YES NO

a. If no, please state your reason(s) why._____

PRESENTATION AND USE OF THE VISUAL DISPLAYS

1. Were the use of visual displays and maps easy to coordinate with the questions in the questionnaire?

YES NO

a. If no, please state your reason(s)why._____

MISCELLANEOUS

1. Are there any other recommendations which should be made to improve the questionnaire?

YES NO

a. If yes, please explain._____

2. Overall, how would you rate the questionnaire?

EXCELLENT GOOD AVERAGE POOR

Thank you very much for your cooperation and participation in the Asian and Pacific Islander Seafood Consumption Study.

Translator(s)

Asian and Pacific Islander Seafood Consumption Study
Focus Group Testing Session
Evaluation Questionnaire

Date 5/3/96

Name SENG NGUON ENG

Please circle your ethnicity

Cambodian Chinese Filipino Hmong Japanese Korean
Lao Mien Samoan Vietnamese

Please evaluate the following categories based on your judgment of the Asian and Pacific Islander Seafood Consumption Study Questionnaire. Please take your time. If you have any questions, please ask the E.P.A. Project Coordinator.

CONTENT

1. Do you feel the questions are intrusive or insensitive? YES NO

a. If yes, please state your reason(s) why and which question(s) seem intrusive or insensitive.

_____

_____

2. Please rate the length of the questionnaire.

LONG AVERAGE SHORT

FORMAT

1. Do the questions flow logically and smoothly section to section?

ALWAYS SOMETIMES NEVER

a. If "SOMETIMES" or "NEVER," please state your reason(s) why and which question(s) should be rearranged_____

WORDING/LANGUAGE/TRANSLATION

1. Is the use of language clear and concise? Do the questions read easily?

ALWAYS SOMETIMES NEVER

2. Was it easy to translate the questionnaire? YES NO

a. If no, please state your reason(s) why. Because some kind of shell fish do not Have in the language.

PRESENTATION AND USE OF THE VISUAL DISPLAYS

1. Were the use of visual displays and maps easy to coordinate with the questions in the questionnaire?

YES NO

a. If no, please state your reason(s)why._____

MISCELLANEOUS

1. Are there any other recommendations which should be made to improve the questionnaire?

YES NO

a. If yes, please explain._____

2. Overall, how would you rate the questionnaire?

EXCELLENT GOOD AVERAGE POOR

Thank you very much for your cooperation and participation in the Asian and Pacific Islander Seafood Consumption Study.

Translator(s)

Asian and Pacific Islander Seafood Consumption Study
Focus Group Testing Session
Evaluation Questionnaire

Date 5-3/96 [illegible]

Name Parici Thing

Please circle your ethnicity

Cambodian Chinese Filipino Hmong Japanese Korean
Lao Mien Samoan Vietnamese

Please evaluate the following categories based on your judgment of the Asian and Pacific Islander Seafood Consumption Study Questionnaire. Please take your time. If you have any questions, please ask the E.P.A. Project Coordinator.

CONTENT

1. Do you feel the questions are intrusive or insensitive? YES NO

a. If yes, please state your reason(s) why and which questions seem intrusive or insensitive.

_____

_____

2. Please rate the length of the questionnaire.

LONG AVERAGE SHORT

FORMAT

1. Do the questions flow logically and smoothly section to section?

ALWAYS SOMETIMES NEVER

a. If "SOMETIMES" or "NEVER," please state your reason(s) why and which question(s) should be rearranged? _____

WORDING/LANGUAGE/TRANSLATION

1. Is the use of language clear and concise? Do the questions read easily?

ALWAYS SOMETIMES NEVER

2. Is the translation thorough and accurate enough? YES NO

PRESENTATION AND USE OF THE VISUAL DISPLAYS

1. Are the usage of the visual displays (seafoods) effective and helpful in answering the questions?

YES NO

a. If no, please state your reason(s) why._____

2. Are the visual displays of seafood easily identifiable?

YES NO

a. If no, please state your reason(s) why._____

3. Are the use of the maps effective?

YES NO

a. If no, please state your reason(s) why._____

MISCELLANEOUS

1. Are there any other recommendations which should be made to improve the questionnaire? some species that were mentioned that aren't in Cambodian language. We have used the English name

2. Overall, how would you rate the questionnaire?

EXCELLENT GOOD AVERAGE POOR

Thank you very much for your cooperation and participation in the Asian and Pacific Islander Seafood Consumption Study.

Appendix C.

List of Seafood Species

SUMMARY OF SEAFOOD SPECIES

These are the species which are included in the questionnaire. The list has been determined and developed by the Community Steering Committee. Species are based on their cultural and traditional habits.

Anadromous Fish	Pelagic	Freshwater	Bottom
Salmon	Cod	Catfish	Halibut
Salmon Eggs (roe)	Dogfish	Crappie	Sole/Flounder
Trout	Snapper	Carp	Sturgeon
Smelt	Snowfish	Perch	Sucker
	Mackeral	Tilapia	
	Tuna	Bass	
	Rockfish		
	Herring		

Shellfish	Other Species
Manila/littleneck clam	Seaweed
Horse clam	Kelp
Razor clam	Bullfrog
Butter clam	
Geoduck clam	
Macoma clam	
Cockle	
Oyster	
Mussel	
Barnacle	
Abalone	
Scallop	
Shrimp	
Crab	
Squid	
Sea Urchin	
Sea Cucumber	
Moonsnail	

Appendix D.

Letters of Support

STATE REPRESENTATIVE
11th DISTRICT
VELMA ROSETE VELORIA

State of
Washington
House of
Representatives

TRADE & ECONOMIC DEVELOPMENT
ASSISTANT RANKING MINORITY MEMBER

LAW & JUSTICE

EDUCATION

February 8, 1996

Ms. Connie Nakano
Refugee Federation Service Center
7101 Martin Luther King Jr. Way South
Seattle, WA 98118

Dear Ms. Nakano:

I am pleased to support the Refugee Federation Service Center's Asian and Pacific Islander Seafood Consumption Study. The most unique aspect of the study is that it is a grassroots community driven and planned study.

Many members of the Asian and Pacific Islander community consume and collect seafood on a regular basis and it would benefit the community to know what risk factors are involved in seafood consumption.

I am pleased to see the progress of the study so far and look forward to providing further support to the next phase.

Sincerely,

Velma Veloria

Velma Veloria
State Representative
11th District

LEGISLATIVE OFFICE: 303 JOHN L. O'BRIEN BUILDING, PO BOX 40600, OLYMPIA, WA 98504-0600 • (360) 786-7862
HOTLINE DURING SESSION: 1-800-562-6000 • TDD: 1-800-635-9993

STATE REPRESENTATIVE
37th DISTRICT
KIP TOKUDA

State of
Washington
House of
Representatives

CHILDREN AND FAMILY SERVICES
CORRECTIONS
TRANSPORTATION

February 7, 1996

Connie Nakano, Project Coordinator
Refugee Federation Service Center
7101 Martin Luther King, Jr. Way S.
Seattle, WA 98118

Dear Ms. Nakano:

I am writing in support of the study on Asian and Pacific Islander Seafood Consumption by the Refugee Federation Service Center.

The results of this study will be of enormous benefit to the Asian and Pacific Islander community. Many members of this community consume and collect seafoods on a regular basis. Completion of the study will help determine if there are any health risks associated with this consumption, and it will provide our community with an opportunity to learn more about many environmental justice issues.

In short, I encourage the continuation of funding by the Environmental Protection Agency, and I look forward to the results of your study.

Sincerely,

Kip Tokuda

Kip Tokuda

LEGISLATIVE OFFICE: 323 JOHN L. O'BRIEN BUILDING, PO BOX 40674, OLYMPIA, WA 98504-0674 • (360) 786-7838
HOTLINE DURING SESSION: 1-800-562-6000 • TDD: 1-800-635-9993

សហគមន៍ខ្មែរ ស៊ីអាតហ្គិល យីដសេនធី
KHMER COMMUNITY OF SEATTLE – KING COUNTY
10025 16TH AVE SW • SEATTLE WA 98146
(206) 762-3922 • Hot line 762-3960 • Fax (206) 762-4034

February 9, 1996

Connie Nakano
Project Coordinator
7101 Martin Luther King Jr. Way S.
Seattle, WA 98118

Dear Ms. Nakano:

On behalf of the Board of Directors of Khmer Community of Seattle-King County, I am very excited and pleased to see a community based organization, such as the Refugee Federation Service Center, take initiative in the seafood consumption study.

Many members of the Asian and Pacific Islander community consume and collect seafood on a regular basis and it would benefit our community to know what risk factors are involved in seafood consumption.

We are committed to assisting in the next phases of the study and plan on being part of the Community Steering Committee.

Sincerely,

Ngy Hul

VIETNAMESE FRIENDSHIP ASSOCIATION OF GREATER SEATTLE

4860 Rainier Avenue S. 1st floor, Seattle, WA 98118
Phone (206) 722-2955

February 8, 1996

To Whom It May Concern,

The Vietnamese Friendship Association is very pleased to participate with the other refugee groups in the Seafood Consumption Study Project funded by the Environmental Protection Agency.

Many members of our community consume and catch seafood on a regular basis and it would benefit our community to know what risk factors are involved in the consumption of seafood.

The Vietnamese Friendship Association is committed to assisting in all phases of this project. Our members plan on being part of the Asian Pacific Steering or Advisory Committee. This organization will likewise assist in finding interviewers and in the production of education materials.

We hope that this project will be successful and will give our full support to ensure its success.

Sincerely,

Long Kim Nguyen
President

Appendix E.

Memorandum of Agreement

Memorandum of Agreement

between the Refugee Federation Service Center with offices at 7101 Martin Luther King Jr. Way, S; Seattle, WA 98118 and the University of Washington, Department of Environmental Health with offices at 4225 Roosevelt way, NE, #100; Seattle, WA 98105

This agreement verifies a partnership between the Refugee Federation Service Center and the University of Washington Department of Environmental Health whereas the Refugee Federation Service Center conducts research to understand and communicate seafood consumption risk to Asian and Pacific Islander communities. Whereas the University of Washington Department of Environmental Health conducts research to identify agents in the environment and workplace that affect human health, elucidate their mechanisms, develop strategies for confronting their effects, assess and communicate their risks and share the knowledge obtained. Whereas each organization has mutual interests as described:

Refugee Federation Service Center

1) is responsible for conducting all aspects of the study as outlined in the work plan
2) is responsible for reporting results and significant findings to the Department of Environmental Health in a timely manner
3) will reference and acknowledge the support of the NIEHS Center for Ecogenetics and Environmental Health on any publications resulting from research or efforts supported by this grant with this phrase: "This project described/publication/event was made possible by the UW Center for Ecogenetics and Environmental Health, grant number 1 P30 ES07033 from the National Institute of Environmental Health Sciences, NIH."
4) will provide all the space and facilities necessary for completion of the study.
5) will meet with representatives from the UW Department of Environmental Health on a regular basis, as outlined in the work plan, to review the study progress.

The University of Washington

1) will serve in an advisory capacity to the study structure, methods and techniques to evaluate and solve issues of concern as outlined in the work plan.
2) will serve as the fiscal receiver between the EPA grants administrator and the Refugee Federation Service Center
3) will serve as an advisor for administration and reporting to the EPA grants administrator.
4) will serve as a collaborator to the research.
5) will disseminate information to the campus community and relevant community groups on the findings of this project
6) will meet with representatives from the Refugee Federation Service Center on a regular basis, as outlined in the work plan, to review the study progress.

This memorandum of Agreement is agreed to and signed by the signatures below:

Kim Long Nguyen, Executive Director
Refugee Federation Service Center

Gerald van Belle, PhD
Chairman, Department of Environmental Health

Richard Fenske, PhD
Principal Investigator

Donald Allen
Director, UW Grant & Contract Services

Appendix F.

Phase 2 and Phase 3 Budget

Asian and Pacific Islander Seafood Consumption Study

EPA Environmental Justice Community/University Partnership 66-604

Master Yr01

Environmental Justice-API Seafood Consumption DETAILED BUDGET FOR NEXT BUDGET PERIOD - DIRECT COSTS ONLY			FROM 8/1/96	THROUGH 7/31/97	FEDERAL DOMESTIC ASSIST 66-604 Year 01	
Personnel	*(Applicant organiz. only)*	TYPE	%	DOLLAR AMOUNT REQUESTED		
NAME	ROLE ON PROJECT	APPT. *(months)*	EFFORT ON PROJ	SALARY REQUESTED	FRINGE BENEFITS	TOTALS
R. Fenske	Principal Investigator	12	5%	$3,423	$753	$4.176
R. Sechena	Program Coordinator	12	10%	$5,000	$1,250	$6.250
V. McFerran	Administrator	12	5%	$0	$0	$0
SUBTOTALS---------->				$8,423	$2.003	$10.426

CONSULTANT COSTS Steven G. Gilbert, PhD		$0
EQUIPMENT *(Itemize)*		$0
SUPPLIES *(Itemize by category)*		$0
TRAVEL		
PATIENT CARE COSTS	INPATIENT	
	OUTPATIENT	
ALTERATIONS AND RENNOVATIONS *(Itemize by category)*		$0
OTHER EXPENSES *(Itemize by category)*		
SUBTOTAL DIRECT COSTS FOR NEXT BUDGET PERIOD		$10,426
CONSORTIUM/CONTRACTUAL COSTS	DIRECT COSTS	$99.108
	INDIRECT COSTS	$0
TOTAL DIRECT COSTS FOR NEXT BUDGET PERIOD	*(Item 7a, Face Page)* ---->	$109,534

Asian and Pacific Islander Seafood Consumption Study

EPA Environmental Justice Community/University Partnership 66-604

Subcontract YR 01

SUBCONTRACT-Refugee Federation Service Center DETAILED BUDGET FOR NEXT BUDGET PERIOD - DIRECT COSTS ONLY			FROM 8/1/96	THROUGH 7/31/97	FEDERAL DOMESTIC ASSIST 66-604 Year 01	
Personnel	*(Applicant organiz. only)*	TYPE	%	DOLLAR AMOUNT REQUESTED		
NAME	ROLE ON PROJECT	APPT. *(months)*	EFFORT ON PROJ	SALARY REQUESTED	FRINGE BENEFITS	TOTALS
C. Nakano	Project Coordinator	12	100%	$24,000	$9,052	$33,052
S. Truong	Administrative Support	12	25%	$6,900	$0	$6,900
SUBTOTALS---------->				$30,900	$9,052	$39,952

CONSULTANT COSTS				
1 Statistician	S. Liao, PhD (190 hours @$80/hour)	$15,200		
1 Statistician	N. Polissar,PhD (108 hours@$140/hour)	$15,120		
2 Study consultants	K Troy & G. Middlestaedt (40 hours @ $25/hr)	$2,000		$32,320
EQUIPMENT	*(Itemize)*			
Personal Computer	$3,250	Email Communication	$144	
Software	$470			$3,864
SUPPLIES	*(Itemize by category)*			
Printing, Binders	$300	Office utilization	$1,875	
Materials	$800	Communication	$700	
Office Supplies	$1,100	Insurance	$220	
Equip. Maintenance	$585			$5,580
TRAVEL	Int. Tech 45 mi. x230@.30/mi	$3,105		
	Proj Coord & researcher 3840 mi @ .30/mi	$1,152		$4,257
PATIENT CARE COSTS	INPATIENT			$0
	OUTPATIENT			$0
ALTERATIONS AND RENNOVATIONS	*(Itemize by category)*			$0
OTHER EXPENSES	*(Itemize by category)*	Data entry support	$825	
Int tech Training	$1,920	Interview Tech	$4,730	
Pre-test resp comp	$360	Question Re-int. exp	$300	
Ques resp comp	$5,000			$13,135
SUBTOTAL SUBCONTRACT DIRECT COSTS FOR NEXT BUDGET PERIOD				$99,108
TOTAL DIRECT COSTS FOR NEXT BUDGET PERIOD		*(Item 7a, Face Page)* ---->		$99,108

Asian and Pacific Islander Seafood Consumption Study

EPA Environmental Justice Community/University Partnership 66-604

Master Yr02

Environmental Justice-API Seafood Consumption DETAILED BUDGET FOR NEXT BUDGET PERIOD - DIRECT COSTS ONLY			FROM 8/1/97	THROUGH 7/31/98	FEDERAL DOMESTIC ASSIST 66-604 Year 02	
Personnel	(Applicant organiz. only)	TYPE	%	DOLLAR AMOUNT REQUESTED		
NAME	ROLE ON PROJECT	APPT. (months)	EFFORT ON PROJ	SALARY REQUESTED	FRINGE BENEFITS	TOTALS
R. Fenske	Principal Investigator	12	5%	$3,560	$783	$4,343
R. Sechena	Program Coordinator	12	10%	$5,200	$1,300	$6,500
V. McFerran	Administrator	12	5%	$0	$0	$0
SUBTOTALS---------->				$8,760	$2,083	$10,843

CONSULTANT COSTS		$0
EQUIPMENT	(Itemize)	$0
SUPPLIES	(Itemize by category)	$0
TRAVEL		
PATIENT CARE COSTS	INPATIENT	
	OUTPATIENT	
ALTERATIONS AND RENNOVATIONS	(Itemize by category)	$0
OTHER EXPENSES	(Itemize by category)	

SUBTOTAL DIRECT COSTS FOR NEXT BUDGET PERIOD		$10,843
CONSORTIUM/CONTRACTUAL COSTS	DIRECT COSTS	$72,307
	INDIRECT COSTS	$0
TOTAL DIRECT COSTS FOR NEXT BUDGET PERIOD	(Item 7a, Face Page) ---->	$83,150

Asian and Pacific Islander Seafood Consumption Study

EPA Environmental Justice Community/University Partnership 66-604

Subcontract YR02

SUBCONTRACT-Refugee Federation Service Center DETAILED BUDGET FOR NEXT BUDGET PERIOD - DIRECT COSTS ONLY			FROM 8/1/97	THROUGH 7/31/98	FEDERAL DOMESTIC ASSIST 66-604 Year 02	
Personnel	(Applicant organiz. only)	TYPE	%	DOLLAR AMOUNT REQUESTED		
NAME	ROLE ON PROJECT	APPT. (months)	EFFORT ON PROJ	SALARY REQUESTED	FRINGE BENEFITS	TOTALS
C. Nakano	Project Coordinator	12	100%	$24,720	$9,569	$34,289
S. Truong	Administrative Support	12	25%	$7,107	$0	$7,107
SUBTOTALS---------->				$31,827	$9,569	$41,396

CONSULTANT COSTS				
1 Statistician	S. Liao, PhD (70 hours @$80/hour)		$5,600	
1 Statistician	N. Polissar, PhD (40 hours @$140/hour)		$5,600	
9 Translators (9x40hrs@$21/hr)			$7,560	
9 Focus groups (9x15hrs@$15/hr)			$2,025	
2 Study consultants K Troy & G. Middlestaedt (25 hours @ $25/hr)			$1,250	$22,035
EQUIPMENT	*(Itemize)*			
Camera	$300	Portable cassette	$200	
projector	$500	Electronic comm. costs	$144	
Voice actvated record	$200			$1,344
SUPPLIES	*(Itemize by category)*			
Printing, copying	$400	Office utilization	$1,875	
Photo develop	$1,000	Communication	$700	
Office Supplies	$1,600	Insurance	$220	
Equip. Maintenance	$585			$6,380
TRAVEL	Proj. Coordinator mileage 160mi/mox2 @.30/mi			$1,152
PATIENT CARE COSTS	INPATIENT			$0
	OUTPATIENT			$0
ALTERATIONS AND RENNOVATIONS	*(Itemize by category)*			$0
OTHER EXPENSES	*(Itemize by category)*			$0
SUBTOTAL SUBCONTRACT DIRECT COSTS FOR NEXT BUDGET PERIOD				$72,307
TOTAL DIRECT COSTS FOR NEXT BUDGET PERIOD		*(Item 7a, Face Page) ----->*		$72,307

Appendix G.

Job Announcements

JOB ANNOUNCEMENT

Position: **Questionnaire Translators (8 positions open)**
Program: **Asian and Pacific Islander Seafood Consumption Study** (U.S. EPA grant)

Duties: **(1)** Participate in Asian and Pacific Islander Seafood Consumption Study to provide description of questionnaire materials in the following ethnic languages: Lao, Mien, Chinese, Cambodian, Korean, Samoan, Filipino, and Vietnamese.
(2) Assist in culturally designing questionnaire with Project Coordinator and Focus Group members. **(3)** Using the translated questionnaire, conduct pre-tests/practice interviewing with members of the Focus Group.

Qualifications:
(1) Knowledge and/or experience in translation.
(2) Must be fluent in English and one of the above ethnic languages.
(3) Must be dependable and prompt.
(4) Strong ability to work as a team.
(5) Working knowledge of computer translation software **or** typing proficiency **or** neat, eligible handwriting skills.

Salary: $.20 per word / 30 page questionnaire.

These are temporary positions that are expected to last up to one month but may last longer or shorter depending on the length of the project.

Please send cover letter and resume to:

Connie Nakano, Project Coordinator
Refugee Federation Service Center
7101 M.L. King Jr. Way S. #214
Seattle, WA 98118

Phone: (206) 725-9181
Fax: (206) 725-9175

Application deadline: March 1, 1996 by 5pm.

JOB ANNOUNCEMENT

Position: **Focus Group**
Program: **Asian and Pacific Islander Seafood Consumption Study** (U.S. EPA grant)

Duties: **(1)** Provide response, recommendation, and information regarding the design, accuracy, and clarity of the translated Asian and Pacific Islander Seafood Consumption Questionnaire. **(2)** Assist in revising the questionnaire with translators, other Focus Group members, and Project Coordinator.

Qualifications:
(1) Must be fluent in English and in one of the following ethnic languages: Cambodian, Chinese, Korean, Lao, Mien, Hmong, Vietnamese, Samoan, and Filipino.
(2) Must have cultural knowledge or experience in the above ethnic groups.
(2) Must be dependable and prompt.
(3) Must be able to attend 2 sessions. Each session expected to be 5 hours/day.
(4) Must be able to express and deliver individual idea/recommendations.

Salary: $8/hour

These are temporary positions that are expected to last up to one day but may last longer or shorter depending on the length of the project.

Please send a letter of interest to:

Connie Nakano, Project Coordinator
Refugee Federation Service Center
7101 M.L. King Jr. Way S. #214
Seattle, WA 98118

Phone: (206) 725-9181
Fax: (206) 725-9175

Application deadline: March 1, 1996 by 5pm.

Refugee Federation Service Center

2200 Rainier Avenue South Seattle, WA 98144 (206) 323-9365 Fax (206) 329-5202
213 West Titus Street, Kent, WA 98032 (206) 852-5150 Fax (206) 852-1336

JOB ANNOUNCEMENT (in-house only) November 21, 1994

POSITION: Seafood Consumption Study Coordinator **21 hours per week**

The person in this position is responsible to assist an organization to provide necessary information which is pertaining to the Asian Pacific American Seafood Consumption Study.

SUMMARY OF WORK:

Recruit, establish a bilingual/bicultural staff an Asian Pacific Advisory Committee and an Asian Pacific Steering Committee all of them should represent APA citizens, organizations, and different levels of government

Work very closely with the committees to develop mission statements, goals and objectives for an APA seafood consumption survey. Identify the target study location, seafood consumption groups

Determine scope and feasibility of a seafood consumption study and statistical limitations and requirements

Draft survey questionaire and quality assurance plan. Draft work plan to implement survey, conduct statistical analysis

Be able to communicate effectively and efficiently with all parties

Attend meetings which are related to the interests of the agency

Perform other duties as assigned

MINIMUM QUALIFICATION:

Degree which is related to Environmental Science
Good organizational and time management skills
Strong background in planning and leadership
Excellent communication and public relation skills
Experience working with a multi-cultural and multi-lingual organization

STARTING SALARY: 1,050 + benefits

HOW TO APPLY: Submit letter of intent to:

Refugee Federation Service Center
2200 Rainier Avenue South
Seattle, WA 98144

CLOSING DATE: December 10, 1994

AN EQUAL OPPORTUNITY EMPLOYER

Refugee Federation Service Center

7101 Martin Luther King Jr. Way S. Seattle, WA 98118 - (206) 725-9181 Fax (206) 725-9175
1215 South Central Ave Suite 210 Kent, WA 98032 - (206) 852-5150 Fax (206) 852-1336
10025 16th Ave South West Seattle, WA 98146 - (206) 762-4894 Fax (206) 762-4034

JOB ANNOUNCEMENT

Position: **Questionnaire Translators (9 positions open)**
Program: **Asian and Pacific Islander Seafood Consumption Study** (U.S. EPA grant)

Duties: **(1)** Participate in Asian and Pacific Islander Seafood Consumption Study to provide description of questionnaire materials in the following ethnic languages: Lao, Mien, Hmong, Chinese, Cambodian, Korean, Samoan, Filipino, and Vietnamese.
(2) Assist in culturally designing questionnaire with Project Coordinator and Focus Group members. **(3)** Using the translated questionnaire, conduct pre-tests/practice interviewing with members of the Focus Group.

Qualifications:
(1) Knowledge and/or experience in translation.
(2) Must be fluent in English and one of the above ethnic languages.
(3) Must be dependable and prompt.
(4) Strong ability to work as a team.
(5) Working knowledge of computer translation software **or** typing proficiency **or** neat, eligible handwriting skills.

Salary: $.20 per word / 30 page questionnaire.

These are temporary positions that are expected to last up to one month but may last longer or shorter depending on the length of the project.

Please send cover letter and resume to:

Connie Nakano, Project Coordinator
Refugee Federation Service Center
7101 M.L. King Jr. Way S. #214
Seattle, WA 98118

Phone: (206) 725-9181
Fax: (206) 725-9175

Application deadline: April 1, 1996 by 5pm.

Refugee Federation Service Center

7101 Martin Luther King Jr. Way S. Seattle, WA 98118 - (206) 725-9181 Fax (206) 725-9175
1215 South Central Ave Suite 210 Kent, WA 98032 - (206) 852-5150 Fax (206) 852-1336
10025 16th Ave South West Seattle, WA 98146 - (206) 762-4894 Fax (206) 762-4034

JOB ANNOUNCEMENT

Position: **Focus Group**
Program: **Asian and Pacific Islander Seafood Consumption Study** (U.S. EPA grant)

Duties: **(1)** Provide response, recommendation, and information regarding the design, accuracy, and clarity of the translated Asian and Pacific Islander Seafood Consumption Questionnaire. **(2)** Assist in revising the questionnaire with translators, other Focus Group members, and Project Coordinator.

Qualifications:
(1) Must be fluent in English and in one of the following ethnic languages: Cambodian, Chinese, Korean, Lao, Mien, Hmong, Vietnamese, Samoan, and Filipino.
(2) Must have cultural knowledge or experience in the above ethnic groups.
(2) Must be dependable and prompt.
(3) Must be able to attend 2 sessions. Each session expected to be 5 hours/day.
(4) Must be able to express and deliver individual idea/recommendations.

Salary: $8/hour

These are temporary positions that are expected to last up to one day but may last longer or shorter depending on the length of the project.

Please send a letter of interest to:

Connie Nakano, Project Coordinator
Refugee Federation Service Center
7101 M.L. King Jr. Way S. #214
Seattle, WA 98118

Phone: (206) 725-9181
Fax: (206) 725-9175

Application deadline: March 1, 1996 by 5pm.

Refugee Federation Service Center

7101 Martin Luther King Jr. Wy. S., Seattle, WA 98118 - (206) 725-9181 Fax (206) 725-9175
213 West Titus Street, Kent, WA 98032 - (206) 852-5150 Fax (206) 852-1336
10025 16th Ave. SW, Seattle, WA 98146 - (206)762- 8494 Fax (206) 762-4034

Job Announcement

Position: Bilingual Questionnaire Interview Technicians
Program: Asian and Pacific Islander Seafood Consumption Study

Duties:
1) Conduct interviews with a questionnaire to obtain information about seafood consumption among Asian and Pacific Islander's.
2) Participates in a 16 hour training session.
3) Conducts prescheduled interviews of respondents at designated locations or house-to-house and records responses on questionnaires.
4) Maintains complete records of respondents and questions conducted. Reviews completed questionnaires to assure all requested data is present. Must assure strict confidentiality of participants and information obtained.
5) Provides questionniare respondents with incentive payment checks or equivalent value of grocery gift certificate.
6) Meets regularly with Project Coordinator and data entry staff to turn in and review completed work.

Qualifications:
1) Knowledge and/or experience in conducting personal interviews.
2) Ability and skill in effective communication and interacting with individuals and groups of diverse backgrounds (age, economic characteristics, educational range, etc.)
3) Must be bilingual/bicultural in one of the following languages/groups: Lao (Mien, Hmong), Cambodian, Vietnamese, Chinese, Korean, Filipino, Japanese, and Samoan.
4) Required to provide own means of transportation. Mileage compensation at .30/mile.
5) Must be prompt and dependable.
6) Must be able to maintain a flexible schedule.
7) Ability to exercise self-initiative and perform work at an acceptable level with little or no supervision.

Salary: $11/hr. Mileage compensation is available upon completion of the project.

These are temporary positions.

Please send cover letter and resume to:

Connie Nakano, Project Coordinator
Refugee Federation Service Center
7101 M.L. King Jr. Way S. #214
Seattle, WA 98118

Phone: (206) 725-9181
Fax: (206) 725-9175

We need your help!
Participate in a dietary habit study!

Each selected volunteer will be compensated for a full interview with $20 or a grocery gift certificate equivalent to it.

Qualifications:

* **Must be of Korean, Chinese, Japanese, Filipino, Samoan, Vietnamese, Lao (Mien and Hmong), Cambodian ethnicity**

* **Must be of 1st or 2nd generation Asian or Pacific Islander**
(1st generation: those who were born abroad and immigrated to U.S. from their country. 2nd generation: children of 1st genereation immigrants and born in U.S.)

* **Must be 18 years or older**

* **Must live in King County**

Please contact *(appropriate language contact)* at 725-9181 or print your name, address and contact number on the following postcard.

Bilingual services are available.

The information you provide is extremely important to your community!

Volunteer for an interview now!

Appendix I.

English Language Questionnaire

Questionnaire Number: 1 1 1 1

ASIAN AND PACIFIC ISLANDER SEAFOOD CONSUMPTION STUDY

DATE CALLED		
1) 1 1 1 1 mo day yr	2) 1 1 1 1 mo day yr	3) 1 1 1 1 mo day yr
INTERVIEW APPT. TIME		
1) __ __:__ __ ☐ 1am ☐ 2pm	2) __ __:__ __ ☐ 1am ☐ 2pm	3) __ __:__ __ ☐ 1am ☐ 2pm
RESULT CODES		
1) completed interview ☐ 1	2) missed appointment; reschedule ☐ 2	3) other ☐ 3

INTERVIEW LOCATION ☐ 1 Respondent's house ☐ 2 RFSC ☐ 3 Eatery ☐ 4 Other _____

RESPONDENT'S INITIAL _____ INTERVIEWER'S CODE 1 1 1 1

INTRODUCTION

Hello. My name is _____ and I am (ethnicity.) We are conducting a study to understand the seafood eating patterns of (ethnicity) in the King County area. The information given in response to this questionnaire will help the Asian and Pacific Islander community to understand the rates of seafood consumption, ways in which meals are cooked and prepared, and the types of seafood regularly consumed. All information provided in this interview is voluntary and confidential. Your answers will be combined with those of others so that no person's answers can be identified.

DATE OF INTERVIEW 1 1 1 1 (mo day yr) TIME INTERVIEW BEGINS __ __:__ __ ☐1am ☐2pm

I am going to ask you some questions which will determine whether you are in the group we wish to study.

a) Do you live in King County? Yes ☐1 No ☐2 (IF NO, TERMINATE INTERVIEW)

b) Do you eat any seafood at all? Yes ☐1 No ☐2 (IF NO, TERMINATE INTERVIEW)

c) Which of the following ethnic groups best describe you. Check one only.

Filipino ☐1 Japanese ☐2 Korean ☐3 Chinese ☐4 Vietnamese ☐5 Lao ☐6

Mien ☐7 Hmong ☐8 Samoan ☐9 Cambodian ☐10

d) Were you born in the United States? Yes ☐1 No ☐2

(If no, how many years have you been in the United States?) 0-5 ☐1 6-10 ☐2 11-20 ☐3 21 + ☐4

e) Is at least one of your parents born in the United States? Yes ☐1 No ☐2

f) Were both of your parents born in the United States? Yes ☐1 No ☐2

(TERMINATE INTERVIEW IF BOTH "D", "F" ARE YES)

g) Are you at least eighteen years old? Yes ☐ 1 No ☐ 2 (IF NO, TERMINATE INTERVIEW)

1. I am going to ask you what types of seafood you eat, the amount you eat, and how often you eat each one.

The amount of seafood you eat and how often you eat it may depend on the time of year. For example, if there are seasonal differences in how often you eat seafood. Please answer 2 different ways: when it is fresh and readily available and when it has been frozen, dried, canned, stored, etc. Please answer these questions in a way that's most familiar to you. Remember to include breakfast, lunch, dinner, and snacks. Do not include seafood you eat at special celebrations (holiday celebrations, Chinese New Year, Japanese New Year, weddings, community or cultural events, etc.) They will be asked later.

--- FILL OUT CONSUMPTION FORM --- SHOW PORTION MODEL, PICTURE CARD ---

GROUP A

A1. How often do you eat the following...

TYPE OF FISH	NUMBER OF PORTIONS EATEN PER			NUMBER OF...PER YEAR		PORTION SIZE CODE
	WEEK	MONTH	YEAR	WEEKS	MONTHS	
SALMON						
in season						
rest of the year						
SALMON EGGS						
in season						
rest of the year						
TROUT						
in season						
rest of the year						
SMELT						
in season						
rest of the year						

--- SHOW PORTION MODEL and PICTURE CARD ---

A2. I'm going to ask you about what parts of the fish in Group A you eat. Please tell me what percentage of the time you eat the following categories when you eat fish in Group A. ---READ ALL CATEGORIES FIRST--- **Please answer 0-100%. Answers 1 & 2 must total 100%.**

1) Fillet with skin: ___%
2) Fillet without skin: ___% **(1 & 2 total 100%)**
3) Head, bones, eggs, organs: ___% **(0-100%)**

A3. I'm going to ask you how the fish you eat in Group A is prepared. For the following 2 categories please tell me what percentage of the time you eat fish in Group A prepared this way. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- Answers must total 100%.

1) Baked, boiled, broiled, roasted, poached, or steamed: ___%
2) Canned, fried, raw, smoked, or dried: ___% **(1 & 2 must total 100%)**

A4. If you boil, steam, or poach any of the fish in Group A, what do you do with the water it is prepared in?

1) Throw it out ___% 2) Use it in cooking ___% 3) Drink it ___%

A5. For the following categories, please tell me approximately what percentage of the fish in Group A you get from: ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Grocery stores/street vendors ___%
2) Fish caught from Puget Sound and surrounding areas by yourself, family members or friends ___%
3) Fish caught from outside of Puget Sound and surrounding areas by yourself, family members or friends ___%
4) Restaurants ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP B

B1. How often do you eat the following...

TYPE OF FISH	NUMBER OF PORTIONS EATEN PER			NUMBER OF...PER YEAR		PORTION SIZE CODE
	WEEK	MONTH	YEAR	WEEKS	MONTHS	
COD						
in season						
rest of the year						
DOGFISH						
in season						
rest of the year						
SNAPPER						
in season						
rest of the year						
SNOWFISH						
in season						
rest of the year						
MACKERAL						
in season						
rest of the year						
TUNA						
in season						
rest of the year						

(continuation of B1)

GROUP B

TYPE OF FISH	NUMBER OF PORTIONS EATEN PER			NUMBER OF...PER YEAR		PORTION SIZE CODE
	WEEK	MONTH	YEAR	WEEKS	MONTHS	
ROCKFISH						
in season						
rest of the year						
HERRING						
in season						
rest of the year						

B2. I'm going to ask you about what parts of the fish in Group B you eat. Please tell me what percentage of the time you eat the following categories when you eat fish in Group B. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) Fillet with skin: ___%
2) Fillet without skin: ___% **(1 & 2 must total 100%)**
3) Head, bones, eggs, organs: ___% **(0-100%)**

B3. I'm going to ask you how the fish you eat in Group B is prepared. For the following 2 categories please tell me what percentage of the time you eat fish in Group B prepared this way. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.**

1) Baked, boiled, broiled, roasted, poached or steamed: ___%
2) Canned, fried, raw, smoked, or dried: ___%

B4. If you boil or steam any of the seafood in Group B, what do you do with the water it is prepared in?

1) Throw it out ___% 2) Use it in cooking ___% 3) Drink it ___%

B5. For the following categories, please tell me approximately what percentage of the fish in Group B you get from: ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Grocery stores/street vendors ___%
2) Fish caught from Puget Sound and surrounding areas by yourself, family members or friends ___%
3) Fish caught from outside of Puget Sound by yourself, family members or friends ___%
4) Restaurants ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP C

C1. How often do you eat the following...

TYPE OF FISH	NUMBER OF PORTIONS EATEN PER			NUMBER OF...PER YEAR		PORTION SIZE CODE
	WEEK	MONTH	YEAR	WEEKS	MONTHS	
CATFISH						
in season						
rest of the year						
CRAPPIE						
in season						
rest of the year						
CARP						
in season						
rest of the year						

(continuation of C1)

GROUP C

TYPE OF FISH	NUMBER OF PORTIONS EATEN PER			NUMBER OF...PER YEAR		PORTION SIZE CODE
	WEEK	MONTH	YEAR	WEEKS	MONTH	
PERCH						
in season						
rest of the year						
TILAPIA						
in season						
rest of the year						
BASS						
in season						
rest of the year						

C2. I'm going to ask you about what parts of the fish in Group C you eat. Please tell me what percentage of the time you eat the following categories when you eat in Group C. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) Fillet with skin: ___%
2) Fillet without skin: ___% **(1 & 2 must total 100%)**
3) Head, bones, eggs, organs: ___% **(0-100%)**

C3. I'm going to ask you how the fish you eat in Group C is prepared. For the following 2 categories please tell me what percentage of the time you eat fish in Group C prepared this way. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.**

1) Baked, boiled, broiled, roasted, poached or steamed ___%
2) Canned, fried, raw, smoked, or dried ___%

C4. If you boil or steam any of the seafood in Group C, what do you do with the water it is prepared in?

1) Throw it out ___% 2) Use it in cooking ___% 3) Drink it ___%

C5. For the following categories, please tell me approximately what percentage of the fish in Group C do you get from: ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Grocery stores/street vendors ___%
2) Fish caught from Puget Sound and surrounding areas by yourself, family members or friends ___%
3) Fish caught from outside of Puget Sound and surrounding areas by yourself, family members or friends ___%
4) Restaurants ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

Group D

D1. How often do you eat the following ...

TYPE OF FISH	NUMBER OF PORTIONS EATEN PER			NUMBER OF...PER YEAR		PORTION SIZE CODE
	WEEK	MONTH	YEAR	WEEKS	MONTHS	
HALIBUT						
in season						
rest of the year						
SOLE/FLOUNDER						
in season						
rest of the year						
STURGEON						
in season						
rest of the year						

(continuation of D1)

GROUP D

TYPE OF FISH	NUMBER OF PORTIONS EATEN PER			NUMBER OF...PER YEAR		PORTION SIZE CODE
	WEEK	MONTH	YEAR	WEEKS	MONTHS	
SUCKERS						
in season						
rest of the year						

D2. I'm going to ask you about what parts of the fish in Group D you eat. Please tell me what percentage of the time you eat the following categories when you eat in Group D. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) Fillet with skin: ___%
2) Fillet without skin: ___% **(1 & 2 must total 100%)**
3) Head, bones, eggs, organs: ___% **(0-100%)**

D3. I'm going to ask you how the fish you eat in Group D is prepared. For the following 2 categories please tell me what percentage of the time you eat fish in Group D prepared this way. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.**

1) Baked, boiled, broiled, roasted, poached or steamed ___%
2) Canned, fried, raw, smoked, or dried ___%

D4. If you boil or steam any of the seafood in Group D, what do you do with the water it is prepared in?

1) Throw it out ___% 2) Use it in cooking ___% 3) Drink it ___%

D5. For the following categories, please tell me approximately what percentage of the fish in Group D you get from: ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Grocery stores/street vendors ___%
2) Fish caught from Puget Sound and surrounding areas by yourself, family members or friends ___%
3) Fish caught from outside of Puget Sound and surrounding areas by yourself, family members or friends ___%
4) Restaurants ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP E

E1. How often do you eat the following...

TYPE OF SHELLFISH	NUMBER OF PORTIONS EATEN PER			NUMBER OF...PER YEAR		PORTION SIZE CODE
	WEEK	MONTH	YEAR	WEEKS	MONTHS	
CLAMS (manila/ littleneck)						
in season						
rest of the year						
HORSE CLAMS						
in season						
rest of the year						
RAZOR CLAMS						
in season						
rest of the year						
BUTTER CLAMS						
in season						
rest of the year						

(continuation of E1)

Group E

TYPE OF SHELLFISH	NUMBER OF PORTIONS EATEN PER			NUMBER OF...PER YEAR		PORTION SIZE CODE
	WEEK	MONTH	YEAR	WEEKS	MONTH	
GEODUCK CLAMS						
in season						
rest of the year						
MACOMA CLAMS						
in season						
rest of the year						
COCKLES						
in season						
rest of the year						
OYSTERS						
in season						
rest of the year						
MUSSELS						
in season						
rest of the year						
ABALONE						
in season						
rest of the year						
SCALLOPS						
in season						
rest of the year						

--- SHOW PORTION MODEL, PICTURE CARD ---

E2. How often do you eat the following...

TYPE OF SHELLFISH	NUMBER OF PORTIONS EATEN PER			NUMBER OF...PER YEAR		PORTION SIZE CODE
	WEEK	MONTH	YEAR	WEEKS	MONTHS	
SHRIMP						
in season						
rest of the year						
CRAB						
in season						
rest of the year						
SQUID						
in season						
rest of the year						
SEA URCHIN						
in season						
rest of the year						
SEA CUCUMBER						
in season						
rest of the year						
MOONSNAIL						
in season						
rest of the year						
LOBSTER						
in season						
rest of the year						

--- SHOW PORTION MODEL and PICTURE CARD ---

E3. I'm going to ask you about which parts of the following you eat. Percentages for each species must total 100%.

SPECIES	WHOLE	WHOLE W/STOMACH REMOVED	WHOLE W/SIPHON TIP REMOVED	WHOLE W/SIPHON TIP AND STOMACH REMOVED	TOTAL 100%
CLAM (manila/littleneck					TOTAL 100%
HORSE CLAMS					TOTAL 100%
BUTTER CLAMS					TOTAL 100%
RAZOR CLAMS					TOTAL 100%
GEODUCK CLAMS					TOTAL 100%
MACOMA CLAMS					TOTAL 100%
COCKLES					TOTAL 100%
OYSTERS					TOTAL 100%
MUSSELS					TOTAL 100%
ABALONE					TOTAL 100%
SCALLOPS					TOTAL 100%

(continuation of E3)

Group E

SHRIMP	WHOLE BODY (body and head) ____%	BODY ONLY ____%	HEAD ONLY ____%	TOTAL 100%
CRAB	WHOLE CRAB (crab meat and butter) ____%	MEAT ONLY ____%	CRAB BUTTER ONLY ____%	TOTAL 100%
SQUID	WHOLD SQUID ____%	MEAT ONLY (body and tentacles) ____%	----------	TOTAL 100%
SEA URCHIN	WHOLE BODY ____%	EGGS ONLY ____%	----------	TOTAL 100%
SEA CUCUMBER	WHOLE BODY ____%	MUSCLE ONLY ____%	----------	TOTAL 100%
MOONSNAIL	WHOLE BODY ____%	MUSCLE ONLY ____%	----------	TOTAL 100%
LOBSTER	WHOLE BODY (body and head) ____%	BODY ONLY ____%	HEAD ONLY ____%	TOTAL 100%

E4. I'm going to ask you how the shellfish you eat in Group E is prepared. For the following 2 categories please tell me what percentage of the time you eat shellfish in Group E prepared this way. ---READ ALL METHODS FOR EACH CATEGORY FIRST-- **Answers must total 100%.**

1) Baked, boiled, roasted, poached or steamed ___%
2) Canned, fried, raw, smoked, or dried ___%

E5. If you boil or steam any of the shellfish in Group E, what do you do with the water it is prepared in?

1) Throw it out ___% 2) Use it in cooking ___% 3) Drink it ___%

E6. For the following categories, please tell me approximately what percentage of the shellfish in Group E do you get from: ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Grocery stores/street vendors ___%
2) Shellfish caught from Puget Sound and surrounding areas by yourself, family members, or friends ___%
3) Shellfish caught from outside of Puget Sound and surrounding areas by yourself, family members, or friends ___%
4) Restaurants ___%

--- SHOW PORTION MODEL and PICTURE CARD ---

GROUP F

F1. How often do you eat the following ...

TYPE OF SEAFOOD	NUMBER OF PORTIONS EATEN PER			NUMBER OF...PER YEAR		PORTION SIZE CODE
	WEEK	MONTH	YEAR	WEEKS	MONTHS	
SEAWEED						
in season						
rest of the year						
KELP						
in season						
rest of the year						

F2. For the following categories, please tell me approximately what percentage of the seafood in Group F you get from: ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Grocery stores/street vendors ___%
2) Seafood caught from Puget Sound and surrounding areas by yourself, family members, or friends ___%
3) Seafood caught from outside of Puget Sound and surrounding areas by yourself, family members, or friends ___%
4) Restaurants ___%

Are there other seafoods which you eat that were not mentioned earlier? ☐ 1 Yes ☐ 2 No (If no, go to H1)

G1. How often do you eat...

TYPE OF SEAFOOD	NUMBER OF PORTIONS EATEN PER			NUMBER OF...PER YEAR		PORTION MODEL CODE
	WEEK	MONTH	YEAR	WEEKS	MONTHS	

---SOCIAL EVENTS ---

H1. The following questions will ask about your eating patterns at social events. In the last 12 months, how often did you attend special celebrations (holiday celebrations, Chinese New Year, Japanese New Year, cultural or community events, weddings, etc.) ___times in last 12 months (If 0, go to no. I 1)

H2. At what percentage of these events do you eat seafood? Please answer from 0-100% ___% (If answer is 0, go to I 1)

---SHOW PORTION MODEL and PICTURE CARD ---

H3. At these events, how much seafood do you usually eat each time? ___oz.(PORTION MODEL CODE: __)

H4. How often do you eat the following seafoods at these events? You may answer from 0-100%.

SHELLFISH (crab, clam, shrimp...) ___% SEAWEED/KELP ___% FISH ___%

I1. Please indicate your age ___. If you choose not to, please select your age category.

18-29 ☐1 30-54 ☐2 55 + ☐3

I2. Indicate your weight ___lbs. OR ___ kg.

I3. Indicate your height ____feet __inches OR ___cm.

I4. What is your household income per year?

☐1 0-10,000 ☐2 10,001-15,000 ☐3 15,001-20,000 ☐4 20,001-25,000

☐5 25,001-35,000 ☐6 35,001-45,000 ☐7 45,001 +

I5. How many people are supported by this total income? _____

I6. Indicate the level of formal education. ☐1 completed high school ☐2 did not complete high school

☐3 completed college ☐4 did not complete college ☐5 other _____

CONCLUSION

Thank you for your cooperation in participating in this study. Your participation will contribute important information needed to help protect your natural resources and provide guidance for public health programs for your community.

NOTE TIME INTERVIEW ENDS: __ __:__ __ ☐ 1 am ☐ 2 pm

INTERVIEWER REMARKS

J1. Respondent's cooperation was: ☐ 1 Very good ☐ 2 Good ☐ 3 Fair ☐ 4 Poor

J2. The quality of respondent's answers were: ☐ 1 High quality ☐ 2 Generally reliable ☐ 3 Questionable ☐ 4 Unreliable

J3. What was the main reason for the questionable or unreliable quality of the interview?

_____

J4. Respondent's Gender Female ☐ 1 Male ☐ 2

J5. Further comments:

_____

_____

Appendix J.

Cambodian Language Questionnaire

ລະຫັດ ຄນ2 : | | | |

ການສັງເກດເບື້ອງຕົ້ນຂອງການຫຼຸດຜ່ອນຄວາມສ່ຽງຂອງເດັກນ້ອຍ ແລະ ຊົນເຜົ່າ

1) | | | | ປີ ເດືອນ ມື້	2) | | | | ປີ ເດືອນ ມື້	3) | | | | ປີ ເດືອນ ມື້
ເວລາເລີ່ມຕົ້ນສະພາບ ຜູ້ລອດຊີວິດ 1) __:__ ☐1am ☐2pm	2) __:__ ☐1am ☐2pm	3) __:__ ☐1am ☐2pm
ເລກລະຫັດ ໄລຍະເວລາ 1) ຜູ້ລອດຊີວິດ ບໍ່ລອດ ☐1	2) ຫຼືອາດຈະຍົກເລີ້ກ ການສັງເກດນີ້ ☐2	3) ມີບັນຫາ ☐3

ສະຖານະພາບຜູ້ລອດຊີວິດ ☐1 ເຄຫສະ ☐2 ຄົນ RFSC ☐3 ຄົນອື່ນ ☐4 ບໍ່ມີບັນຫາ

ຫຼັກເກນການ ສະກັດ ເຄຫສະ _____ ເລກລະຫັດ ຂອງ ຜູ້ລອດ | | |

ឯកសារ

សួស្តី ខ្ញុំឈ្មោះ ហ៊ីយ៉ូ ជាអ្នកស្រាវជ្រាវ។ យើងកំពុងធ្វើការសិក្សាស្តីពីការយល់ដឹងរបស់ប្រជាពលរដ្ឋនានាអំពីការការពារ និងការគ្រប់គ្រងធនធានធម្មជាតិ ក្នុងតំបន់ឃុំ ។ ការសិក្សានេះ គឺមានគោលដៅសម្រាប់ជាវិធីមួយក្នុងការយល់ដឹងពីការគិតគូ ទស្សនៈ ជំនឿ ជំនាញ ចំណេះដឹង ការប្រកាន់យកនូវជំនឿ ទាក់ទងនឹងធនធានធម្មជាតិ ដែលជាកត្តាមួយដ៏សំខាន់ សម្រាប់ការកសាងគោលនយោបាយ ដែលមានប្រសិទ្ធភាពសម្រាប់ការការពារ និងការគ្រប់គ្រងធនធានធម្មជាតិ ។ ការសម្ភាសន៍ នឹងចំណាយពេលប្រហែល ១០នាទី ។ ចម្លើយរបស់លោកអ្នក នឹងត្រូវកត់ត្រាជាការសម្ងាត់ ។ ដូច្នេះសូមកុំបារម្ភ ពីការប្រាប់ការពិតនោះឡើយ ។

ការសម្ភាសន៍ថ្ងៃទី ___ ___ ___ (ខែ ថ្ងៃ ឆ្នាំ) ពេលវេលានៃការចាប់ផ្តើមសម្ភាសន៍ ___:___ ☐1am (ម៉ោង) ☐2pm (នាទី)

ខ្ញុំសូមចាប់ផ្តើមដោយសំនួរ ២ ដើម្បីបញ្ជាក់ว่า តើលោកអ្នកជាសមាជិកគ្រួសារ ដែលរស់នៅក្នុងតំបន់នេះ ឬទេ ?

a) តើលោកអ្នករស់នៅក្នុងភូមិនេះបានប៉ុន្មានឆ្នាំ? ច្រើន ☐1 តិច ☐2 (IF NO, TERMINATE INTERVIEW) (បើចម្លើយว่าតិច ត្រូវបញ្ចប់ការសម្ភាសន៍)

b) តើលោកអ្នកមានមុខរបរ ធ្វើការ ? ច្រើន ☐1 តិច ☐2 (IF NO, TERMINATE INTERVIEW) (បើចម្លើយតិច បញ្ចប់ការសម្ភាសន៍)

c) តើលោកអ្នកជាសមាជិកគ្រួសារជនជាតិ . សូមកត់ត្រាចម្លើយ .

ហ្គីង ☐1 ជីប៉ុន ☐2 ក្រុង ☐3 ជ្រុង ☐4 ស្រីតណាម ☐5

លាវ ☐6 ខ្មែរ ☐7 ម៉ាង ☐8 ណាមន ☐9 ដទៃ ☐10

d) តើលោកអ្នកធ្លាប់ជាសមាជិក ស.ហ.ក.ប? ច្រើន ☐1 តិច ☐2

(បើច្រើន តើអ្នករស់នៅ ស.ហ.ក ប៉ុន្មានឆ្នាំ ?) 0-5 ☐1 6-10 ☐2 11-20 ☐3 21+ ☐4

e) មានវិធីកម្ចាយ ចូលរួម ក្នុងការ សហគ្រិនភាពទេ ? ច្រើន ☐1 តិច ☐2

f) តើវិធីកម្ចាយ ជាមួយ របស់លោកអ្នកធ្លាប់ ស.ហ.ក.ប ? ច្រើន ☐1 តិច ☐2

(TERMINATE INTERVIEW IF BOTH "D", "F" ARE YES)

(បញ្ចប់សំនួរ បើសិនជាចម្លើយ ២ យ៉ាង ខ្មែរว่า ច្រើន)

B) តើលោកអ្នកធ្លាប់ទទួលទានត្រីដែរឬទេ? បាទ ☐1 ទេ ☐2 (IF NO, TERMINATE INTERVIEW)
(បើទេ បញ្ចប់ការសម្ភាសន៍)

1. ខ្ញុំនឹងសួរ សំណួរ អំពីមុខម្ហូប ដែលអ្នកបរិភោគ [illegible]

សូមបំពេញក្រដាសសំរាប់ការទទួលទាន បង្ហាញគំរូ [illegible] បណ្ណរូបភាព
--- FILL OUT CONSUMPTION FORM --- SHOW PORTION MODEL, PICTURE CARD ---

GROUP A ក្រុម ក
A1. ក ១

ប្រភេទ ត្រី	ចំនួន ដងដែលអ្នកបរិភោគ [illegible]			ចំនួនខែ	ក្នុងមួយឆ្នាំ	PORTION SIZE CODE លេខកូដ ទំហំ ចំណែក
	សប្តាហ៍	ខែ	ឆ្នាំ			
ធូណា						
ដាក់ក្នុងប្រេង						
ខ្ចប់ក្នុងទឹក						
តាំង ត្រី សាល់ម៉ុន						
ដាក់ក្នុងប្រេង						
ខ្ចប់ក្នុងទឹក						
ត្រី ត្រៅ TROUT						
ដាក់ក្នុងប្រេង						
ខ្ចប់ក្នុងទឹក						
ត្រី [illegible]						
ក្នុងប្រេង						
ខ្ចប់ក្នុងទឹក						

ບົດສະແດງ ຄົວ ເນື້ອ ແລະ ບັດຮູບ

--- SHOW PORTION MODEL and PICTURE CARD ---

A2. ຂໍ້ນີ້ຂໍສະແດງ ແບບ ເນື້ອ ໃຫ້ທ່ານເບິ່ງ ຮູບ A ໃນ ແບບ ເນື້ອ ປ່ຽວ ແລ້ວ ສະເລີ່ຍ ເນື້ອ ທີ່ທ່ານ ບໍລິໂພກ ໃນ ແບບ ເນື້ອ ປ່ຽວ ໃນ ມື້ ວານ ນີ້. ເມື່ອ ເວົ້າ ໃນ ແບບ ເນື້ອ ປ່ຽວ ຄວນ ຂຽນ A ແລ້ວ ຫຼັງ ຈາກ ນັ້ນ ໃຫ້ ທ່ານ ເລືອກ ເອົາ ຕົວ ເລກ ລະ ຫວ່າງ 0 – 100% ແລ້ວ ຂຽນ 1 ແລະ 2 ຕ້ອງ ບວກ ກັນ ໃຫ້ 100%

A2. 1) ຄວບ ຫຼາ ລວມ ເນື້ອ ປ່ຽວ: ____%

2) ຄວບ ຫຼາ ລວມ ຄ້ານ ເນື້ອ: ____% (1 & 2 total 100%) (1 ແລະ 2 ບວກ ກັນ 100%)

3) ກ້ານ ຄ້ານ ຕ່ານ ເນື້ອ: ____% (0-100%) (0 – 100%)

A3. ຂໍ້ນີ້ຂໍສະແດງ ເຄື່ອງ ດື່ມ ເຄື່ອງ ດື່ມ ທີ່ທ່ານ ເບິ່ງ ຮູ້ ຈັກ A ທີ່ນີ້ ຂະ ນະ ນີ້ ແລ້ວ ສະ ເລ່ຍ ເບິ່ງ ຄ່ານ ເຄື່ອງ ດື່ມ ທີ່ ທ່ານ ບໍລິ ໂພ ກ ໃນ ມື້ ວານ ນີ້ ແລ້ວ ຂຽນ ເລ ຂ ລະ ຫວ່າ ງ ແລ ະ ຫ ວ ່ ານ ເ ບ ິ ່ ງ ບ ັ ດ ຮ ູ ບ ແ ລ ້ ວ ຂ ຽ ນ ຕ ົ ວ ເ ລ ກ ລ ະ ຫ ວ ່ ານ ເ ບ ິ ່ ງ ບ ັ ດ ຮ ູ ບ ແ ລ ້ ວ ຂ ຽ ນ ຕ ົ ວ ເ ລ ກ ລ ະ ຫ ວ ່ ານ 0 – 100% ແ ລ ້ ວ ຂ ຽ ນ ຕ ົ ວ ເ ລ ກ (ບ ວ ກ ກ ັ ນ ໃ ຫ ້ 100%.

---READ ALL CATEGORIES FIRST---Please answer 0-100%. Answers 1 & 2 must total 100%.

ເບ ິ ່ ງ ບ ັ ດ ຮ ູ ບ (ບ ວ ກ ກ ັ ນ) (ສ ະ ເ ລ ີ ່ ຍ) (ຂ ຽ ນ (ລ ະ ຫ ວ ່ ານ (ບ ວ ກ ກ ັ ນ (ບ ວ ກ ກ ັ ນ (((

បញ្ជាក់ជំនួសគំរូ បញ្ជាក់ចាត

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP B ក្រុម B

B1.

ប្រភេទត្រី	ជំនួសនឹងជាមធ្យមក្នុងគ្រួសារ			ជំនួសក្នុងមួយ		PORTION SIZE CODE ជាមធ្យមជាក់លេខកូដ
	១ដង	២	៣	១ដង	២	
ត្រីដង COD						
១ក្រាម						
១ពាងមានក្រាម						
ត្រី DOGFISH						
១ក្រាម						
១ពាងមានក្រាម						
ត្រី SNAPPER						
១ក្រាម						
១ពាងមានក្រាម						
ត្រី SNOW FISH						
១ក្រាម						
១ពាងមានក្រាម						
ត្រី MACKERAL						
១ក្រាម						
១ពាងមានក្រាម						
ត្រីទូណា TUNA						
១ក្រាម						
១ពាងមានក្រាម						

(បន្ត B1)

(continuation of B1)

GROUP B ក្រុម B

	ជាទូទៅ តើលោកអ្នកទទួលទានត្រីប៉ុន្មានដងក្នុងមួយ			ជាទូទៅ .... ក្នុងមួយឆ្នាំ		PORTION SIZE CODE
	សប្តាហ៍	ខែ	ឆ្នាំ			
ត្រី ROCKFISH						
នៅក្នុងរដូវ						
ពេលឯទៀតក្នុងឆ្នាំ						
ត្រី HERRING						
នៅក្នុងរដូវ						
ពេលឯទៀតក្នុងឆ្នាំ						

B2. ខ្ញុំនឹងសួរលោកអ្នក តើជាធម្មតា ពេលលោកអ្នកទទួលទានត្រីក្នុងក្រុម B [illegible] ។ [illegible] លោកអ្នកទទួលទានត្រីក្នុងក្រុម B ។ [illegible] ០-១០០% ។ ចម្លើយ ១ និង ២ ត្រូវតែស្មើ ១០០% ________. ---READ ALL CATEGORIES FIRST--- Please answer from 0-100%. Answers 1 & 2 must total 100%.

1) កាត់ហើយជាប់ស្បែក ____%
2) កាត់ហើយគ្មានស្បែក ____% (1 & 2 must total 100%) ១ និង ២ ត្រូវតែស្មើ ១០០%
3) ក្បាល ឆ្អឹង ពង គ្រឿងក្នុង: ____% (0-100%) ០ - ១០០%

B3. ខ្ញុំនឹងសួរលោកអ្នកអំពីតើលោកអ្នករៀបចំធ្វើម្ហូបយ៉ាងណា ចំពោះត្រីដែលលោកអ្នកបរិភោគក្នុងក្រុម B ។ ចំពោះប្រភេទត្រី [illegible] លោកអ្នកបរិភោគត្រីក្រុម B ធ្វើជាម្ហូបតាមរបៀបនេះ ។ [illegible] ចំពោះក្រុមនីមួយៗ ។ ចម្លើយត្រូវបូកបញ្ចូលគ្នា ១០០%-READ ALL METHODS FOR EACH CATEGORY FIRST--- Answers must total 100%.

1) ដុត ចៀន អាំង ឬ [illegible] ____%
2) [illegible] ស្ងោរ [illegible] ____%

B4. តើលោកអ្នកស្លាប់ ឬ រងរបួសប្រហែលប៉ុន្មានក្នុងក្រុម B តើលោកអ្នកយកទឹកស្លាប់ ឬ ជីពុលចោះសម្លាប់ត្រីកម្ចាត់?

1) ជាក់លាក់ ____% 2) យកទុកស្ងួត ឬដុតម្ហូប ____% 3) ទុកលក់ ____%

B5. ចំណាយប្រេងឥន្ធនៈ សម្រាប់ប៉ាន់ តាមការកត់ត្រា តើចំនួនប៉ុន្មានភាគរយនៃត្រីក្នុងក្រុម B ដែលត្រូវបាន ____: ---READ ALL CATEGORIES--- Answers must total 100%. សរសេរ ប្រភេទ ចម្លើយត្រូវបានសរុប ១០០%

1) ហាងលក់ម្ហូប / អ្នកលក់តាមផ្លូវ ____%
2) ត្រីដែលតម្រូវយកនៅទីតាំងសមុទ្រ Puget Sound ដោយខ្លួនលោកអ្នកផ្ទាល់, ដោយសាមីខ្លួនគ្រួសារ, ឬមិត្ត ____%
3) ត្រីដែលត្រូវបានយកនៅទីតាំង ដោយក្រៅ Puget Sound ដោយខ្លួនលោកអ្នក, គ្រួសារ, ឬមិត្ត ____%
4) ផ្សេងទៀត ____%

--- SHOW PORTION MODEL, PICTURE CARD --- បង្ហាញ ជ័រកាត់ តំណាង បណ្ណរូបភាព

GROUP C ក្រុម C

C1. តាមដូចម្តេច តើលោកអ្នកទុកត្រីដែលចាប់បានប៉ុន្មាន

ប្រភេទត្រី	ចំនួនជ័រកាត់ដែលទុកក្នុងមួយ			ជ្រើសរើស... ម្តងម្នាក់		PORTION SIZE CODE
	តែមួយ	½	០			
ត្រីឆ្មា Catfish.						
ត្រីសាលម៉ុន						
ត្រីសាលម៉ុនត្រីកន្ទ						
ត្រីត្រីប៉ី CRAPPIE						
ត្រីប្រាដែ						
ត្រីសាលម៉ុនត្រីកន្ទ						
ត្រីកាប CARP						
ត្រីប្រាដែ						
ត្រីសាលម៉ុនត្រីកន្ទ						

(continuation of C1) (បន្ត C1)

GROUP C ក្រុម C

ប្រភេទ ត្រី	ចំនួនជាភាគរយនៃការប្រើប្រាស់...			ចំនួនទាំង....	ផ្សេងៗ	PORTION SIZE CODE
	សម្រាប់	២	៣			
ត្រី PECH						
សាច់ក្រៀមស្ងួត						
ពងស្រីក្រៀមស្ងួត						
ត្រីត្រីធ Tilapia						
សាច់ក្រៀមស្ងួត						
ពងស្រីក្រៀមស្ងួត						
ត្រី BASS						
ក្រៀមស្ងួត						
ពងស្រីក្រៀមស្ងួត						

C2. តើអ្នកស្រីសូមប្រាប់ពីភាគរយនៃត្រីក្នុងក្រុម C ដែលកាត់ចេញពីការប្រើប្រាស់ សូមជ្រើសរើសចម្លើយ ០-១០០% ។ ចម្លើយ ១ និង ២ ត្រូវបូកបានសរុប ១០០%។ --READ ALL CATEGORIES FIRST--- Please answer from 0-100%. Answers 1 & 2 must total 100%.

1) សាច់ស្រស់ ____%
2) សាច់ស្ងួតសរសៃ ____% (1 & 2 must total 100%) ១ និង ២ ត្រូវបូកបានសរុប ១០០%
3) ក្រូម ____% (0-100%) (0 – ១០០%)

C3. តើអ្នកស្រីសូមប្រាប់ ពីវិធីប្រើប្រាស់ត្រីក្នុងក្រុម C ដែលកាត់ចេញ ជាមធ្យម ។ ចំណាត់ថ្នាក់ទាំងអស់ សូមនិយាយម្តងមួយ ---READ ALL METHODS FOR EACH CATEGORY FIRST--- Answers must total 100%. ចម្លើយ ត្រូវបូកបានសរុប ១០០%

1) ផ្តុតត្រី ____%
2) ផ្ទាក់ចំបើង ____%

C4. ប្រភេទអ្នកណា ឬ ជំនួយ ត្រូវបានប្រមូលពីក្នុងគ្រួសារ C តើភាគរយប៉ុន្មានដែលជាមួយ ?

1) ជាប់ខាង ____% 2) ចម្ងាយកណ្តាល ____% 3) ទទួលទាន ____%

C5. ជ្រើសរើសនូវសន្ទស្សន៍ សូមចំណាយពេលប្រហែលរយៈពេលប៉ុន្មានដែលគ្រួសារ C ____: ---READ ALL CATEGORIES--- Answers must total 100%. ចម្លើយត្រូវបូកបានសរុប ១០០%

1) ហាងលក់ទូទៅ/អ្នកលក់ត្រីតាមផ្លូវ ____%
2) ត្រីចាប់ផ្តើមពីសមុទ្র Puget Sound រៀងរាល់ឆ្នាំ ដោយការចាប់យក, លក់ដោយផ្ទាល់ និងប្រើប្រាស់ ____%
3) ត្រីចាប់ផ្តើមពីក្នុង Puget Sound ដែលមានការចាប់យក លក់ដោយផ្ទាល់ និងប្រើប្រាស់ ____%
4) ការជួលផ្ទះ ____%

--- SHOW PORTION MODEL, PICTURE CARD ---
Group D

D1.

ប្រភេទត្រី	ចំនួនជាមធ្យមទទួលទានក្នុងមួយ...			ចំនួនវេន... ក្នុងមួយឆ្នាំ		PORTION SIZE CODE
	១ថ្ងៃ	១	១			
ត្រីកណ្តាលធំ Halibut						
ត្រីស្រស់						
ត្រីកកក						
ត្រី Sole ឬ Flounder						
ត្រីស្រស់						
ត្រីកកក						
ត្រី Sturgeon						
ត្រីស្រស់						
ត្រីកកក						

(continuation of D1) (បន្ត D1)

GROUP D (ក្រុម D)

ប្រភេទស្ករ	ចំនួនដងញុំាដែលទទួលទាន ក្នុង			ចំនួនដង - ---	ក្នុងមួយឆ្នាំ	PORTION SIZE CODE
	សប្តាហ៍	ខែ	ឆ្នាំ			
ស្ករ Suckers						
ស្ករស						
[illegible]						

D2. តើជាធម្មតាអ្នកញុំាចំណីនៃស្ករក្នុងក្រុម D ដែលអ្នកបរិភោគ ។ សូមឆ្លើយថាប៉ុន្មានភាគរយ ពេលអ្នកទទួលទានស្ករក្រុម D ។ ---READ ALL CATEGORIES FIRST--- Please answer from 0-100%. Answers 1 & 2 must total 100%.
អានគ្រប់ប្រភេទជាមុនសិន សូមឆ្លើយពី ០ – ១០០%
ចម្លើយ ១ និង ២ ត្រូវបូករួម ១០០%

1) ញុំាពេលញុំាអាហារ: ____%
2) ញុំាក្រៅពេលអាហារ ____% (1 & 2 must total 100%) (១ និង ២ ត្រូវបូក ១០០%)
3) ក្នុងរវាងពេលគេង: ____% (0-100%) (០ – ១០០%)

D3. តើជាធម្មតាអ្នកទទួលបានស្ករក្រុម D ដែលអ្នកបរិភោគ ។ តាមរបៀបណា សូមប្រាប់ពីភាគរយនៃពេលដែលអ្នកបរិភោគស្ករក្រុម D ដែល ---READ ALL METHODS FOR EACH CATEGORY FIRST--- Answers must total 100%. / អានរបៀបទាំង ១ ជាមុនសិន សូមអានគ្រប់វិធីនៃប្រភេទនីមួយៗ
ចម្លើយត្រូវបូករួម ១០០%

1) ទិញ ធ្វើ ... ពីហាងលក់ដូរ ... ____%
2) ដាក់ក្នុង ... ____%

D4. បើពេលអ្នកញុំាមិនអស់ស្ករក្នុងក្រុម D តើពេលអ្នកយកវាទៅធ្វើអ្វី?

1) ចាក់ចោល ____% 2) យកទុកញុំា ____% 3) ទទួលទាន ____%

D5. ---READ ALL CATEGORIES---

Answers must total 100%.

1) _____%
2) _____%
3) _____%
4) _____%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP E

E1.

						PORTION SIZE CODE

(continuation of E1)

Group E

บางครั้งบริโภค	ปริมาณที่บริโภคใช้โดยเฉลี่ยครั้งหนึ่ง					PORTION SIZE CODE
	ครั้ง	ถ้วย	ชิ้น			
หอยแมลงภู่ (Geoduck clams)						
ดิบ						
ต้มหรือนึ่ง						
ดิบ						
ต้มหรือนึ่ง						
ดิบ						
ต้มหรือนึ่ง						
หอยนางรม (Oysters)						
ดิบ						
ต้มหรือนึ่ง						
หอยแมลงภู่ (Mussels)						
ดิบ						
ต้มหรือนึ่ง						
ดิบ						
ต้มหรือนึ่ง						
ดิบ						
ต้มหรือนึ่ง						

ប្រើប្រាស់ ខ្នាតគំរូ ប័ណ្ណរូបភាព

--- SHOW PORTION MODEL, PICTURE CARD ---

E2. តើអ្នកណាខ្លះក្នុងគ្រួសារធ្លាប់ស្គាល់ ឬដឹងពីខ្នាតណា ញ៉ាំញ៉ាប់យ៉ាងណាមិនមាន ?

ប្រភេទម្ហូប	ចំនួនប៉ុន្មានខ្នាតមានក្នុងគ្រួសារ...			ចំនួនប៉ុន្មាន... ក្នុងមួយថ្ងៃ		PORTION SIZE CODE ខ្នាតតូច តម្រិត តម្លាត
	តូចណាស់	តូច	ធំ			
ក្តៅ ឬ ត្រជាក់						
ទេ ក្នុងមួយ						
ពេលប្រើក្នុងមួយ						
ភាគ						
ក្នុងមួយ						
ពេលប្រើក្នុងមួយ						
ត្រី ម៉ាត (រៀមណ)						
ទេ ក្នុងមួយ						
ពេលប្រើក្នុងមួយ						
ផ្លែឈើ (ដូច ម៉ាងគីង)						
ទេ ក្នុងមួយ						
ពេលប្រើក្នុងមួយ						
ល្ងាចសម្ងួត						
ទេ ក្នុងមួយ						
ពេលប្រើក្នុងមួយ						
ទេ ក្នុងមួយ						
ពេលប្រើក្នុងមួយ						
ប៉ាវ						
ក្នុងមួយ						
ពេលប្រើក្នុងមួយ						

បង្ហាញ ចំណែកគំរូ និង បណ្ណរូបភាព

--- SHOW PORTION MODEL and PICTURE CARD ---

ចំនួនភាគរយ នៃ ប្រភេទនីមួយៗ ត្រូវសរុបទាំងអស់ ១០០%

E3. . Percentages for each species must total 100%.

ប្រភេទ	ទាំងមូល	ទាំងមូលដោយយកសំបកចេញ			TOTAL 100%
ងាវ (Manila/Littleneck)					TOTAL 100%
គ្រំសេះ (Horse clams)					TOTAL 100%
					TOTAL 100%
គ្រំ[illegible] (geoduck clam)					TOTAL 100%
គ្រំ					TOTAL 100%
					TOTAL 100%
ខ្យង[illegible] (oysters)					TOTAL 100%
គ្រំចំពុះទា (Mussel)					TOTAL 100%
					TOTAL 100%
					TOTAL 100%
[illegible] (Scallops)					TOTAL 100%

(continuation of E3) (បន្ត E3)

Group E

កំពិស	ទុកទាំងមូល (ទុកទាំងក្បាល) %	ដកខួរ %	ដកក្បាល %	TOTAL 100%
ក្តាម	ក្តាមទាំងមូល (សាច់ក្តាមទាំងខួរ) %	ដកសាច់ %	ដកខួរ %	TOTAL 100%
មឹក	មឹកទាំងមូល ___%	ដកស្នូក (ទុកទាំងស្រោម) ___%	------------------------	TOTAL 100%
អួរដិន (Sea Urchin)	ទុកទាំងមូល %	ដកពង %	------------------------	TOTAL 100%
ល្ងៀស បុក	ទុកទាំងមូល %	ដកសាច់ %	------------------------	TOTAL 100%
ខ្យងក្តក់ (Moon snail)	ទុកទាំងមូល %	ដកសាច់ %	------------------------	TOTAL 100%
បង្កង	ទុកទាំងមូល (ទុកទាំងក្បាល) %	ដកខួរ %	%	TOTAL 100%

E4. [illegible] ---READ ALL METHODS FOR EACH CATEGORY FIRST-- Answers must total 100%. [illegible] ១០០%

1) [illegible] ___%

2) [illegible] ___%

E5. [illegible] ?

1) ____% 2) ____% 3) ____%

E6. [illegible]--READ ALL [illegible] CATEGORIES--- Answers must total 100%.
[illegible] ១០០%

1) [illegible] ____%
2) [illegible] Puget Sound [illegible] ____%
3) [illegible] Puget Sound [illegible] ____%
4) [illegible] ____%

--- SHOW PORTION MODEL and PICTURE CARD --- [illegible]

GROUP F [illegible] F
F1. [illegible]

[illegible]	[illegible]					PORTION SIZE CODE [illegible]
	[illegible]	[illegible]	[illegible]			
[illegible]						
[illegible]						
[illegible]						
[illegible]						
[illegible]						
[illegible]						

F2. ចំពោះប្រភេទខ្យងគោក? សូមប្រាប់ភាគរយនៃចំនួន ... ដែលលោកអ្នកបានហូប គ្រឿងសមុទ្រ ក្នុងក្រុម F ដែលបានមក ពី:

---READ ALL CATEGORIES--- Answers must total 100%.
សូមអាន គ្រប់ប្រភេទ ចំលើយត្រូវបូកបញ្ចូលគ្នាអោយ ១០០%

1) ហាងលក់ម្ហូប/អ្នកលក់តាមផ្សារ ___%
2) គ្រឿងសមុទ្រ ដែលចាប់នៅក្នុងសមុទ្រ Puget Sound ដោយខ្លួនឯង ឬ ដោយលោកអ្នកស្គាល់ គ្រួសារ មិត្ត ___%
3) គ្រឿងសមុទ្រ ដែលចាប់ក្រៅឈូងសមុទ្រ Puget Sound ដោយខ្លួនឯង ឬ ដោយលោកអ្នក គ្រួសារ មិត្ត ___%
4) ផ្សេងៗ ទៀត ___%

តើលោកអ្នកហូបសមុទ្រ [illegible] ដែលលោកអ្នក [illegible]? ☐ 1 បាទ ☐ 2 ទេ (If no, go to H1)
[illegible]

G1. តើរយៈពេលប៉ុន្មាន លោកអ្នកបរិភោគ ?

ប្រភេទរបស់ម្ហូប សមុទ្រ	ចំនួនភាគ ដែលលោកបានហូបក្នុងមួយ...			ចំនួនដង...	ក្នុងមួយឆ្នាំ	PORTION MODEL CODE លេខសម្គាល់ [illegible]
	សប្តាហ៍	ខែ	ឆ្នាំ			

---SOCIAL EVENTS --- ពេលបុណ្យទាន

H1. សំនួរតទៅនេះ នឹងសួរលោកអ្នកអំពីការហូបបរិភោគនៅពេលបុណ្យទានក្នុងសង្គម។ នៅក្នុងរយៈពេល ១២ ខែមុន ឧទាហរណ៍: តើលោកអ្នកបានចូលរួម បុណ្យក្នុងសង្គមប៉ុន្មានដង [illegible] ចំនួន ... ដង ... ក្នុងរយៈពេល ១២ ខែកន្លងទៅនេះ (If 0, go to no. I 1) បុណ្យ [illegible], បុណ្យ [illegible], [illegible])
ចូលទៅសំនួរ I

H2. តើក្នុងចំនួនភាគរយនៃបុណ្យទាំងនោះលោកអ្នកបរិភោគ ? Please answer from 0-100% ___% (If answer is 0, go to I 1)
ម្ហូបសមុទ្រ សូមឆ្លើយពី ០ – ១០០% (ចូលទៅសំនួរ ទៅ I1)

---SHOW PORTION MODEL and PICTURE CARD ---

H3. _____ (លេខសម្គាល់ ចំណាកគ្រឿ) ? ___ oz.(PORTION MODEL CODE: __)

H4. _____ ? You may answer from 0-100%. (លោកអ្នកអាចដាក់ពី 0-100%)

_____ ___% _____ ___% _____ ___%

I1. _____ ___ _____ ? 18-29 ☐1 30-54 ☐2 55 + ☐3

I2. _____ ___ lbs. OR ___ kg.

I3. _____ ___ feet ___ inches OR ___cm.

I4. _____ ?

☐1 0-10,000 ☐2 10,001-15,000 ☐3 15,001-20,000 ☐4 20,001-25,000

☐5 25,001-35,000 ☐6 35,001-45,000 ☐7 45,001 +

I5. _____ ?

I6. _____ ☐1 _____ ☐2 _____

☐3 _____ ☐4 _____ ☐5 _____

CONCLUSION សេចក្ដីបញ្ជប់

សូមសរសេរអំពីការកត្តាដែលជះឥទ្ធិពលដល់ការសម្ភាសន៍ ១ ការចូលរួមរបស់លោកអ្នក ដូចជាការគិតគូរ ជាដើម ១ ការយល់ដឹងរបស់លោកអ្នក ១ ការពន្យល់ សម្រាប់ចម្លើយ ១ ការវាយតម្លៃ ១ ការពិភាក្សា ១ ការកត់ត្រា ១ ការកែតម្រូវ ១ ការប្រាស្រ័យ ១ ចម្លើយ ១ ការតបវិញ ១ ការសម្ភាសន៍

ម៉ោងប៉ុន្មានបានបញ្ចប់ការសម្ភាសន៍

NOTE TIME INTERVIEW ENDS: ___:___ ☐1 am ☐2 pm

ការកត់ចំណាំរបស់អ្នកសម្ភាសន៍

INTERVIEWER REMARKS

J1. Respondent's cooperation was: ☐1 Very good (ល្អណាស់) ☐2 Good (ល្អ) ☐3 Fair (គ្រប់គ្រាន់) ☐4 Poor (អាក្រក់)

J2. The quality of respondent's answers were: ☐1 High quality (គុណភាពខ្ពស់) ☐2 Generally reliable (ជាទូទៅគួរឲ្យទុកចិត្ត) ☐3 Questionable (គួរឲ្យសង្ស័យ) ☐4 Unreliable (មិនគួរជឿ)

J3. What was the main reason for the questionable or unreliable quality of the interview?

_____

J4. Respondent's Gender Female (ស្ត្រី) ☐1 Male (ប្រុស) ☐2

J5. Further comments: (សេចក្ដីអត្ថាធិប្បាយបន្ថែមរបស់អ្នក)

_____

_____

Appendix K.

Chinese Language Questionnaire

問卷编号：1 1 1 1

亚太人对海鮮食物之消费研究

日期		
1) 1 1 1 1 月 日 年	2) 1 1 1 1 月 日 年	3) 1 1 1 1 月 日 年
会面预约時間		
1) __:__ □1am □2pm	2) __:__ □1am □2pm	3) __:__ □1am □2pm
结果		
1) 完成会面 □1	2) 失约，再约時间 □2	3) 其他 □3

会面地点 □1 被访者家中 □2 顾客会服務中心 □3 飲食場所 □4 其他

被访者簽名 _____ 訪问員编号 1 1 1 1

介绍

哈罗，我是 _____ 我是中国人，现在要在景郎地区进行一项关于华人食用海鲜的研究，对各项问题的回答，可以帮助了解亚太人社区对海鲜的消费，如何烹饪，及何种海鲜经常购食。所有资料，是自愿提供及守秘。你的答案，将与其他人的答案混在一起，不能个别分别出来。

会面日期 _____ | | | | 会面开始时间 __:__ □1am □2pm
月 日 年

我问你一些问题，以决定是否在那一组作研究。

a) 你住在景郎吗？ 是 □1 否 □2 (IF NO, TERMINATE INTERVIEW)

b) 你吃海鲜吗？ 是 □1 否 □2 (IF NO, TERMINATE INTERVIEW)

c) 你是那一族裔？ 只选一项

菲律宾 □1 日本 □2 韩国 □3 中国 □4 越南 □5

柬国 □6 泰 □7 芒 □8 孟加拉 □9 柬埔寨 □10

d) 你在美国出生吗？ 是 □1 否 □2

(如否，你在美国居住了几年？) 0-5 □1 6-10 □2 11-20 □3 21+ □4

e) 你父亲或母亲在美国出生吗？ 是 □1 否 □2

f) 你父母都在美国出生吗？ 是 □1 否 □2

(TERMINATE INTERVIEW IF BOTH "D", "F" ARE YES)

g) 你年滿十八歲嗎 ? 是 ☐1 否 ☐2 (IF NO, TERMINATE INTERVIEW)

1. 我準備問你，你吃什麼類海鮮，吃的份量及是否經常吃.

你吃海鮮的份量及次數，以每年次數計算。例如，有季節性的是否常吃海鮮。請以西餐方法回答：新鮮的，或冰凍的、乾的、醃決的等。請以最熟悉的方法回答。記得包括早餐、午餐和晚餐，以及小食等。但不要包括特別節日的吃的海鮮，如假日度假、中國新年、日本新年、婚宴、和西文化活動等。這些在後面有問Q。

--- FILL OUT CONSUMPTION FORM --- SHOW PORTION MODEL, PICTURE CARD ---

GROUP A

A1. 你是否經常吃這些...

魚類	每 吃的份量			每年有幾個		PORTION SIZE CODE
	星期	月	年	星期	月	
三文魚						
季節						
其他時間						
三文魚扒						
季節						
其他時間						
鱈魚						
季節						
其他時間						
內臣魚類						
季節						
其他時間						

--- SHOW PORTION MODEL and PICTURE CARD ---

A2. 我要问你在A组的食物中，你吃掉一部份。请告诉我在你吃A组食物时之比率。请看各类食，然後回答0-100%。回答1及2时，全部总数应为100%

A2.
1) 肉连皮 : ___%
2) 肉不连皮 : ___% (1 & 2 total 100%)
3) 头、骨、屋内脏 : ___% (0-100%)

A3. 我要问你A组食物你如何烹饪。下列四项请告诉我你烹饪A组食物的方法。请先读各种方法。答案须100%

---READ ALL CATEGORIES FIRST---Please answer 0-100%. **Answers 1 & 2 must total 100%.**

1) 焗、煮、烤、煲、煎或蒸 : ___%
2) 入罐、炸、生吃、烟熏、乾燥 ___% (1 & 2 must total 100%)

A4. 如A组食物以煮、蒸或煎方法，你如何处理食水 ?

1) 抛弹 ___% 2) 用以再煮 ___% 3) 饮用 ___%

A5. A组食物，你是如何得到的 ?

---READ ALL CATEGORIES--- **Answers must total 100%.**

1) 杂货店 / 街市 ___%
2) 你，你的家人或朋友从营捉员/渔民捉获 ___%
3) 你，你的家人或朋友从营捉员以外的已捉获 ___%
4) 餐馆 ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP B
B1. 你是否经常吃这些...

菜肴	每 吃的份量			每年有多少个		PORTION SIZE CODE
	星期	月	年	星期	月	
玉米粥						
季节						
其他时间						
鱿鱼						
季节						
其他时间						
红烧肉						
季节						
其他时间						
鲤鱼						
季节						
其他时间						
鱼香肉						
季节						
其他时间						
金线鱼						
季节						
其他时间						

(continuation of B1)

GROUP B

鱼类	每 吃的份量			每年有鱼很		PORTION SIZE CODE
	每频	月	年	每频	月	
在大鱼						
季节						
其他时间						
淡水鱼						
季节						
其他时间						

B2. 我要问你B组鱼类你吃那一部份，请告诉我在你吃B组鱼类时之比率

_____. ---READ ALL CATEGORIES

FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) 肉连皮 : ___%
2) 肉不连皮 : ___% **(1 & 2 must total 100%)**
3) 头、骨、皮、内脏 : ___% **(0-100%)**

B3. 我要问你B组鱼类你如何烹饪。请告诉我下列两类烹饪法的比率

_____. ---READ ALL METHODS FOR EACH

CATEGORY FIRST--- **Answers must total 100%.**

1) 焗、煮、烤、烧、煎或蒸 : ___%
2) 入镬、炒、生吃、烟熏、干制 ___%

B4. B组海鲜如以煮或蒸方法，你如何处理剩水？

1) 抛弃 ___% 2) 用以再煮 ___% 3) 饮用 ___%

B5. B组鱼类，你是如何得到的。

: ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) 杂货店/街摊 ___%
2) 你、你的家人或朋友从美国境内的地区捉鱼. ___%
3) 你、你的家人或朋友从美国境内以外地区捉鱼 ___%
4) 餐馆 ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP C

C1. 你是否经常吃这些…

鱼类	每	吃的份量		每年有几次		PORTION SIZE CODE
	星期	月	年	星期	月	
鲈鱼						
季节						
其他时间						
CRAPPIE						
季节						
其他时间						
鲤鱼						
季节						
其他时间						

(continuation of C1)

GROUP C

鱼类	每 吃的份量			每年有关细		PORTION SIZE CODE
	频率	日	年	频率	日	
鲤鱼						
季节						
其他时间						
TILAPIA						
季节						
其他时间						
鲶鱼						
季节						
其他时间						

C2. 我要问你C组鱼类你吃那一部份。请告诉我你吃C组鱼类的比率 _____. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) 肉连皮 : ___%
2) 肉不连皮 : ___% **(1 & 2 must total 100%)**
3) 头,骨,眼,内脏 : ___% **(0-100%)**

C3. 我要问你C组鱼类你如何烹饪。请告诉我下列烹饪方法的份比率 _____. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.**

1) 焗、煮、烤、烧、煎或蒸 ___%
2) 入罐、炸、生吃、烟熏、晒干 ___%

C4. C组海鮮如以煮或蒸方法，你如何知道魚水？

1) 新鮮 ___ % 2) 用以再煮 ___ % 3) 飲用 ___ %

C5. C組魚類，你是如何得到的 : ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) 雜貨店/街檔 ___ %
2) 你、你的家人或朋友從漁船附近捉獲 ___ %
3) 你、你的家人或朋友從漁塘以外地方捉獲 ___ %
4) 忘記 ___ %

--- SHOW PORTION MODEL, PICTURE CARD ---

Group D

D1. 你是否經常吃這些... ...

魚類	每	吃的份量		每年有幾個		PORTION SIZE CODE
	魚類	月	年	魚類	月	
比目魚						
季節						
其他時間						
鮭魚						
季節						
其他時間						
鱈魚						
季節						
其他時間						

(continuation of D1)

GROUP D

食物	每	吃的份量		每年有多少个		PORTION SIZE CODE
	份数	日	年	份数	年	
鸡蛋						
鸡蛋						
其他时间						

D2. 我要问你 D 组食物你吃的一部份. 请告诉我你吃 D 组食物的比率.

---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%.**

Answers 1 & 2 must total 100%.

1) 肉连皮 : ___%
2) 肉不连皮 : ___% **(1 & 2 must total 100%)**
3) 头, 骨, 蹄, 内脏 : ___% **(0-100%)**

D3. 我要问你 D 组食物你如何烹饪. 请告诉我下列两种烹饪方法的份的比率.

---READ ALL METHODS FOR EACH CATEGORY FIRST---

Answers must total 100%.

1) 焖, 煮, 炖, 烧, 煎或蒸 ___%
2) 入烧, 炸, 烤, 烟熏, 干制 ___%

D4. D 组海鲜如以煮或蒸方法, 你如何处理剩余物?

1) 扔掉 ___% 2) 用以再煮 ___% 3) 饭用 ___%

D5. D组总数，你是如何得出的. : ---READ ALL CATEGORIES---

Answers must total 100%.

1) 新货店/摊档 ___%
2) 你，你的家人或朋友经营餐馆的收益 ___%
3) 你，你的家人或朋友经营餐馆以外地区 ___%
4) 零售. ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP E

E1. 你是否经常吃这些...

食品类	每 吃的份量			每年有几个月		PORTION SIZE CODE
	点心	月	年	点心	月	
鱼						
雪糕						
其他时间						
虾						
雪糕						
其他时间						
刀鱼						
雪糕						
其他时间						
鱿鱼						
雪糕						
其他时间						

(continuation of E1)

Group E

具体数	每	吃的份量		每年有几个		PORTION SIZE CODE
	星期	月	年	星期	月	
家教蛋						
季节						
其他时间						
Macma 蛋						
季节						
其他时间						
汤圆						
季节						
其他时间						
糕						
季节						
其他时间						
贝壳贝						
季节						
其他时间						
粽子						
季节						
其他时间						
饼子						
季节						
其他时间						

--- SHOW PORTION MODEL, PICTURE CARD ---

E2. 你是否经常吃这些…

食物类	每 吃的份量			每年有几个		PORTION SIZE CODE
	点/期	月	年	点/期	月	
虾						
季节						
其他时间						
蟹						
季节						
其他时间						
鱿鱼						
季节						
其他时间						
海胆						
季节						
其他时间						
海参						
季节						
其他时间						
蛤蜊						
季节						
其他时间						
龙虾						
季节						
其他时间						

--- SHOW PORTION MODEL and PICTURE CARD ---

E3. 我要问你，你吃那一部份 . Percentages for each species must total 100%.

种类	全部	全部 没去骨部	全部但没去内脏	全部但没去内脏骨	TOTAL 100%
蟹					TOTAL 100%
虾蟹					TOTAL 100%
西施蟹					TOTAL 100%
刀蟹					TOTAL 100%
象拔蚌					TOTAL 100%
Macoma 蟹					TOTAL 100%
海扇					TOTAL 100%
虾蛄					TOTAL 100%
贻贝					TOTAL 100%
鲍鱼					TOTAL 100%
蛏子					TOTAL 100%

(continuation of E3)

Group E

蝦	全隻(身体及头) ___%	身体 ___%	頭 ___%	TOTAL 100%
蟹	全隻(蟹肉及膏) ___%	蟹肉 ___%	膏 ___%	TOTAL 100%
魷魚	全隻 ___%	肉(身体及鬚) ___%	----------	TOTAL 100%
海胆	全隻 ___%	膏 ___%	----------	TOTAL 100%
海参	全隻 ___%	肉 ___%	----------	TOTAL 100%
蝦米	全隻(身体及头) ___%	身体 ___%	----------	TOTAL 100%
龍蝦	全隻(身体及头) ___%	身体 ___%	頭 ___%	TOTAL 100%

E4. 今要向你 E组里分数你如何烹飪. 請告訴我下列四類烹飪方法的份量比率.
---READ ALL METHODS FOR EACH CATEGORY FIRST-- **Answers must total 100%.**

1) 焗、煮、燒、燉、煎或蒸 ___%
2) 入鑊、炸、生吃、煙燻或乾製 ___%

E5. E组具有如此惹我注意力，你如何处理其如此？

1) 扣扣 ___% 2) 用以再查 ___% 3) 饱用 ___%

E6. E组具有，你是如何得到的 ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) 杂货店/种子摊 ___%
2) 你、你的家人或朋友维持摊位提供 ___%
3) 你、你的家人或朋友维持摊位以外地区提供 ___%
4) 猎物 ___%

--- SHOW PORTION MODEL and PICTURE CARD ---

GROUP F

F1. 你经常吃这些...

海产种类	每	吃的份量		每年有几个		PORTION SIZE CODE
	星期	月	年	星期	月	
海带						
干品						
其他时间						
海菜						
干品						
其他时间						

F2. 干贝海鲜你是如何得到的

---READ ALL CATEGORIES--- **Answers must total 100%.**

1) 新货商/批发 ___%
2) 你、你的家人或朋友从当地捕捞的 ___%
3) 你、你的家人或朋友从当地以外地区捕捞的. ___%
4) 养殖 ___%

还有没有其他海鲜你有吃但上面没有提及? ☐ 1 有 ☐ 2 无 (If no, go to H1)

G1. ...

海鲜类	每 吃的份量			有多有几个		PORTION MODEL CODE
	克数	月	年	克数	月	

---SOCIAL EVENTS ---

H1. 以下的问题，是有关你在社交场合的吃的方式。过去十二个月，共有多少次出席特别庆祝(如假日庆祝，中国新年、日本新年，文化或社区活动，婚宴等等) ___ 在过去十二个月 (If 0, go to no. I 1)

H2. 在这些社交场合，你吃的海鲜佔多少? Please answer from 0-100% ___% (If answer is 0, go to I 1)

---SHOW PORTION MODEL and PICTURE CARD ---

H3. 在这些祝宴场合，通常每天吃多少海鲜? ____oz.(PORTION MODEL CODE: __)

H4. 在祝宴场合，你吃下列海鲜所佔比例是? You may answer from 0-100%.

貝类(蟹、蛤、蝦). ____% 海带海藻 ____% 魚 ____%

I1. 请于你的年龄 ____. 成年龄组别 ____.

18-29 ☐1 30-54 ☐2 55 + ☐3

I2. 请于你的体重 ____ lbs. OR ____ kg.

I3. 请于你的体高 ____ feet ____ inches OR ____cm.

I4. 你的家庭收入每年是多少 ____?

☐1 0-10,000 ☐2 10,001-15,000 ☐3 15,001-20,000 ☐4 20,001-25,000

☐5 25,001-35,000 ☐6 35,001-45,000 ☐7 45,001 +

I5. 这项你收入共有多少人支持? ____

I6. 你的教育水平如何. ☐1 高中畢業 ☐2 高中未完成

☐3 大学畢業 ☐4 大学未畢業 ☐5 其他

CONCLUSION

多謝你的合作，參加這項調查研究。這些重要資料，可協助保護自然資源，及提供社區以策保健計劃指導。

NOTE TIME INTERVIEW ENDS: __:__ ☐1 am ☐2 pm

INTERVIEWER REMARKS

J1. Respondent's cooperation was: ☐1 Very good ☐2 Good ☐3 Fair ☐4 Poor

J2. The quality of respondent's answers were: ☐1 High quality ☐2 Generally reliable ☐3 Questionable ☐4 Unreliable

J3. What was the main reason for the questionable or unreliable quality of the interview?

J4. Respondent's Gender Female ☐1 Male ☐2

J5. Further comments:

Appendix L.

Filipino Language Questionnaire

Bilang ng Tanong: | | | |

Pananaliksik Sa Paggamit at Pagkain ng mga Pagkaing-Dagat Ng Mga Asyano at Pacifico

Araw ng Pananaliksik 1) | | | | Buwan / Araw / Taon	2) | | | | Buwan / Araw / Taon	3) | | | | Buwan / Araw / Taon
Oras ng Pananaliksik 1) __:__ ☐1am ☐2pm	2) __:__ ☐1am ☐2pm	3) __:__ ☐1am ☐2pm
Resulta ng Pananaliksik 1) Kumpleto ☐1	2) Nakaligtaan _____ ☐2	3) ATBP ☐3

Lugar ng Pananaliksik ☐1 Bahay ☐2 RFSC ☐3 Kainan ☐4 ATBP

Lagda ng Respondante _____ Identipikasyon ng Nagtatanong | | | |

Pangunang

Ako ay si . At ako ay (lahi) Gumawa kami ng isang pananaliksik tungkol sa paggamit at pagkain ng mga pagkaing dagat ng ibat-ibang lahi sa Kanluran ng King County. Ang pananaliksik na ito ay gagamitin upang malaman at maintindikan sa komunidad o lugar ng mga Asyano at Pacifico ang kanilang pagkain at kung anong klase ng mga pagkaing dagat ang kanilang nakokomsumo o nagagamit

Araw ng pananaliksik __ __ __ Oras ng pananaliksik __:__ ☐1am ☐2pm

Buwan / Araw / Taon

Ang mga katanungang ito ay upang malaman kung kayo ay isa sa mga grupong nagagamit sa pananaliksik na ito.

a) Nakatira sa King County? Oo ☐1 Hindi ☐2 (IF NO, TERMINATE INTERVIEW)

b) Kumakain ng mga pagkaing dagat? Oo ☐1 Hindi ☐2 (IF NO, TERMINATE INTERVIEW)

c) Saang grupo kayo nalalagay. Mag-kahon ang isang kahon lamang.

Filipino ☐1 Japan ☐2 Koryano ☐3 Intsik ☐4 Vietnami ☐5

Lao ☐6 Mien ☐7 Hmong ☐8 Samoa ☐9 Cambodian ☐10

d) Ipinanganak sa Amerika? Oo ☐1 Hindi ☐2

(Kung hindi, ilang taon na nakatira sa Amerika?) 0-5 ☐1 6-10 ☐2 11-20 ☐3 21+ ☐4

e) Isa ba sa mga magulang ay ipinanganak sa Amerika? ☐1 Oo Hindi ☐2

f) Ipinanganak ba pareho ang mga magulang sa Amerika? Oo ☐1 Hindi ☐2

(TERMINATE INTERVIEW IF BOTH "D", "F" ARE YES)

g) May labing-walong taong gulang Oo ☐1 Hindi ☐2 (IF NO, TERMINATE INTERVIEW)

1. Anong klase, gaano karami at gaano kadalas ang pagkain o paggamit ng mga pagkaing dagat?

Ang rami at dalas ng paggamit at pagkain ng mga pagkaing dagat ay depende sa bahagi ng taon. Halimbawa, kung may bahagi ng taon o kapanahunan ang mga paggamit ng mga pagkaing-dagat. Sagutin sa dalawang paraan:
Kung ito ay sariwa o nilagay sa freezer, pinatuyo o dinaing, nakalata at iba pa. Sagutin ayon sa pagkaya'tindi. Isama ang agahan, tanghalian, hapunan at meryenda. Huwag isama ang mga nagagamit sa mga espesyal na okasyon, ito'y tatanungin namanya

--- FILL OUT CONSUMPTION FORM --- SHOW PORTION MODEL, PICTURE CARD ---

GROUP A

A1. Gaano kadalas ang inyong pagkain na mga sumusunod:

Klase ng isda	Ilang bahagi ang inyong nakakain sa isang Linggo	Buwan	Taon	Ilan sa isang Taon Linggo	Buwan	PORTION SIZE CODE
Salmon						
Kapanahunan						
Nalalabing						
bahagi ng taon						
Itlog ng Salmon						
Kapanahunan						
Nalalabing						
bahagi ng taon						
TROUT						
Kapanahunan						
Nalalabing						
bahagi ng taon						
SMELT						
Kapanahunan						
Nalalabing bahagi ng taon						

--- SHOW PORTION MODEL and PICTURE CARD ---

A2. Anong bahagi ng isda ang inyong kinakain sa Grupo A. Basahing mabuti ang mga kategorya ng nakasaad. Inyong sagutin ng 0--100% (porsiyento). Ang inyong kasagutan sa unang at pangalawa ay dapat isang daang porsiyento.

A2.
1) Nahati na may balat (Fillet) ___%
2) Nahati na walang balat ___% (1 & 2 total 100%)
3) Ulo, Buto o Tinik, Itlog o Laman loob ___% (0-100%)

A3. Paano ang inyong pagluto sa mga isda sa Grupo A. Sa sumusunod na dalawang kategorya, Inyong sabihin kung ilang porsiyento ng inapapanahong isda sa Grupo A ang inyong kinakain pangunito. READ ALL CATEGORIES FIRST---Please answer 0-100%. Answers 1 & 2 must total 100%. Basahin mabuti ang mga paraan para sa bawat kategorya. Ang inyong sagot dapat isang daang porsiyento.

1) Pinais sa Hilaga, Inihaw, Tinostao pinasingawan ___%
2) Nakatata, Piniritong, Sariwa, Pinatuyo o Dinaing ___% (1 & 2 must total 100%)

A4. Kung ang isda ay inyong linaga o pinasingawan sa Grupo A, anong ginagawa ninyo sa tubig na ginamit o pinagkuluan
1) Tinatapon ___% 2) Ginagamit sa pagluto ___% 3) Iniinom ___%

A5. Sa mga sumusunod na kategorya, inyong sabihing kung ilang porsiyento ng isda sa Grupo A. Ang inyong ---READ ALL CATEGORIES--- Answers must total 100%. ~~Grupo A~~ pinagkukunan. Basahin mabuti ang mga kategorya. Sagutin sa isang daang porsiyento
1) Groserya/Talipapa ___%
2) Isda na nahuli sa baybay sa Puget Sound ng sarili, ng kasamahan sa pamilya o kaibigan ___%
3) Isda nahuli sa labas ng baybay sa Puget Sound ___%
4) Restaurant ng sarili, kasamahan sa pamilya o kaibigan ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP B

B1. Gaano Kadalas ang inyong pagkain sa mga Sumusunod:

Klase ng isda	Ilang bahagi ang inyong nakakain sa isang			Ilan sa isang taon		PORTION SIZE CODE
	Linggo	Buwan	Taon	Linggo	Buwan	
COD						
Kapanahunan						
Nalalabing						
bahagi ng taon						
Asong Isda						
Kapanahunan						
Nalalabing						
bahagi ng taon						
SNAPPER						
Kapanahunan						
Nalalabing						
bahagi ng taon						
SNOWFISH						
Kapanahunan						
Nalalabing						
bahagi ng taon						
MAKEREL						
Kapanahunan						

Nalalabing
bahagi ng taon
TUNA
Kapanahunan
Nalalabing bahagi
ng taon

(continuation of B1)

GROUP B

Klase ng Isda	Ilang bahagi ang inyong nakakain			Ilang sa isang taon		PORTION SIZE CODE
	Linggo	Buwan	Taon	Linggo	Buwan	
Isdang Bato						
Kapanahunan						
Nalalabing						
bahagi ng taon						
HERRING						
Kapanahunan						
Nalalabing bahagi ng taon						

B2. Anong bahagi ng isda sa Grupo Ba ang inyong Kinakain?
Inyong sabihin, ilang porsiyento ang inyong nakakain sa mga ---READ ALL CATEGORIES
FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.** sumusunod na Kategorya sa Grupo Ba

1) Nahati na may balat ___%
2) Nahati na walang balat ___% **(1 & 2 must total 100%)**
3) Ulo, Buto, Itlog, lamang loob ___% **(0-100%)**

B3. Paano ang inyong pagluto sa mga isda sa Grupo Ba na inyong Kinakain. Sa mga Sumusunod na Kategorya. Inyong Banggitin Kung ilang porsiyento ---READ ALL METHODS FOR EACH
CATEGORY FIRST--- **Answers must total 100%.** ng Isda sa Grupo Ba ang inyong iniluto ganito:

1) Pinaalsa Inihaw Pinasingawan ___%
2) Nakalata Prinito, Kinilaw, pinausokan, ___%
pinatuyo o dinaing.

B4. Kung inyong nilaga opinasingawan ay isa sa mga laman dagat sa Grupo B, Among ginawa sa lubig na ginamit sa pinagkuluan.

1) Tinatagoro ___% 2) Ginagamit sa ___% 3) Iniinom ___%

B5. Sa mga sumusunod na kategorya ng pagkain inyong sabihin kung ilang porsiyento sa Grupo B ang inyong pinangkukunan ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Groserya / Talipapa ___%
2) Isda na nahuli sa baybay ng Puget Sound ng sarili, kasamahan sa pamilya o kaibigan ___%
3) Isda na nahuli sa labas ng baybay ng Puget Sound ng sarili, kasamahan sa pamilya o kaibigan ___%
4) Restawran ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP C

C1. Gaano kadalas ang pagkain sa mga sumusunod:

Klase ng isda	Ilang bahagi inyong nakakain sa Linggo	Buwan	Taon	Ilan sa isang taon Linggo	Buwan	PORTION SIZE CODE
HITO						
Kapanahunan						
~~Bahagi ng~~						
Nalalabing						
bahagi ng taon						
CRAPPIE						
Kapanahunan						
Nalalabing						
bahagi ng taon						
CARP						
Kapanahunan						
Nalalabing bahagi ng taon						

(continuation of C1)

GROUP C

Klase ng isda	Ilang bahagi ay inyong nakakain sa Isang			Ilang sa isang Taon		PORTION SIZE CODE
	Linggo	Buwan	Taon	Linggo	Buwan	
PERCH						
Kapanahunan						
Nalalabing						
bahagi ng Taon						
TILAPIA						
Kapanahunan						
Nalalabing						
bahagi ng Taon						
BASS						

Kapanahunan, Nalalabing bahagi ng taon

C2. Anong bahagi ng isda sa Grupo KA ay inyong kinakain Inyong sabihin kung ilang. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.** porsiyento sa mga sumusunod na kategorya sa Grupo KA.

1) Nahati na may balat ____%
2) Nahati na walang balat ____% **(1 & 2 must total 100%)**
3) Ulo, buto, itlog, laman loob ____% **(0-100%)**

C3. Paano ay inyong pagluto ~~sa~~ ng isda sa Grupo KA na inyong kinakain. Sa mga sumusunod na kategorya. Inyong sabihin kung ilang porsiyento ng isda sa Grupo KA. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.** ay inyong lumuto gani to:

1) Pinaalsa, Nilaga, Inihaw, Pinasingawan ____%
2) Nakalata, Pinirito, Kinilaw, ____%
Pinausukan, Pinatuyo o Dinaing

C4. Kung inyong tinaga opinasingawan ay isa sa mga ~~lamon~~ laman dagat sa Grupo Ka Anong giniigawa sa tubig na ginamit sa pinagkuhan?

1) Tinutapon ___ % 2) Ginagamit sa pagluto ___ % 3) Iniinom ___ %

C5. Sa mga sumusunod na kategorya inyong sabihin kung ilang porsiyento sa Grupo Ka ang inyong pinagkukunan. ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Groserya / Talipapa ___ %
2) Isda na nahuli sa baybay ng Puget Sound ng sarili, kasamahan sa pamilya o kaibigan ___ %
3) Isda na nahuli sa labas ng baybay ng Puget Sound ng sarili, kasamahan sa pamilya o kaibigan ___ %
4) Restawran ___ %

--- SHOW PORTION MODEL, PICTURE CARD ---

Group D

D1. Gaano kadalas ang pagkain sa mga sumusunod:

Klase ng isda	Ilang bahagi inyong nakakain ~~sa~~ Linggo	Buwan	Taon	Ilan sa isang tron Linggo	Buwan	PORTION SIZE CODE
HALIBUT						
Kapanahunan						
Nalalabing						
bahagi ng tron						
SOLE / FLOUNDER						
Kapanahunan						
Nalalabing						
bahagi ng tron						
STURGEON						
Kapanahunan						
Nalalabing bahagi ng tron						

(continuation of D1)

GROUP D

Klase ng isda	Ilang bahagi ng ang inyong nakakain sa isang			Ilan sa isang taon		PORTION SIZE CODE
	Linggo	Buwan	Taon	Linggo	Buwan	
SUCKERS						
Kapanaluman						
~~Ilang bahagi~~						

Nalalabing bahagi ng taon

D2. Anong bahagi ng isda sa Grupo Da ay inyong kinakain
Inyong sabihin kung ilang porsiyento sa. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%.**
Answers 1 & 2 must total 100%. mga sumusunod na kategorya sa Grupo Da

1) Nakati na may balat ___%
2) Nakati na walang balat ___% **(1 & 2 must total 100%)**
3) Ulo, Buto, itlog, laman loob ___% **(0-100%)**

D3. Paano ay inyong pagluto sa mga isda sa Grupo Da inyong kinakain sa mga sumusunod na kategorya
Inyong sabihin kung ilang porsiyento ang. ---READ ALL METHODS FOR EACH CATEGORY FIRST---
Answers must total 100%. isda sa Grupo Da inyong linuluto ganito.

1) Pinaalsa, nilaga iniihaw o pinasingawan ___%
2) Nakalata pinirito, kiniliaw ___%
Pinausukan, pinatuyo o dinaing

D4.
Kung inyong linagaw o pinasingawan ay isa sa mga lamang dagat sa Grupo Da ?
Anong ginagawa sa tubig na ginamit sa pinagkukuan
1) Tinatapon ___% 2) Ginagamit sa pagluto ___% 3) Inumin ___%

D5. Sa mga sumusunod na kategorya inyong sabihin kung ilang porsiyento---READ ALL CATEGORIES---
Answers must total 100%. sa Grupo Da inyong pinag kukunan.

1) Groserya / Talipapa ___%
2) Isda na nahuli sa baybay ng Puget Sound ng sarili, kasamahan sa pamilya o kaibigan ___%
3) Isda na nahuli sa labas ng baybay ng Puget Sound ng sarili, kasamahan sa ___%
4) Restawran pamilya o kaibigan ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP E

E1 Gaano kadalas ang pagkain sa mga sumusunod:

Klase ng pagkain dagat	Ilang bahagi ay inyong nakakain Linggo	Buwan	Taon	Ilan sa ~~mga~~ isang tao Linggo	Buwan	PORTION SIZE CODE
Tulya (Manila/littleneck)						
Kapanahunan						
Nalalabing bahagi ng taon						
HORSE CLAMS						
Kapanahunan						
Nalalabing bahagi ng taon						
RAZOR CLAMS						
Kapanahunan						
Nalalabing bahagi ng taon						
BUTTER CLAMS						
Kapanahunan						
Nalalabing bahagi ng taon						

(continuation of E1)

Group E

Klase ng lamon dagat	Ilang bahagi ay inyong nakakainsakang			Ilan sa isang taon		PORTION SIZE CODE
	Linggo	Buwan	Taon	Linggo	Buwan	
GEODUCK CLAMS						
Kapanahunan						
Nalalabing bahagi ng taon						
MACOMA CLAMS						
Kapanahunan						
Nalalabing bahagi ng taon						
COCKLES						
Kapanahunan						
Nalalabing bahagi ng taon						
TALABA						
Kapanahunan						
Nalalabing bahagi ng taon						
TAYANG						
Kapanahunan						
Nalalabing bahagi ng taon						
Capis						
Kapanahunan						
Nalalabing bahagi ng taon						

--- SHOW PORTION MODEL, PICTURE CARD ---

E2. Gaano Kadalas ang inyong pagkain sa mga sumusunod:

Klase ng laman dagat	Ilang bahagi ng inyong kinakain sa isang Linggo	Buwan	Taon	Ilan sa isang taon Linggo	Buwan	PORTION SIZE CODE
HIPON						
Kapanahunan						
Nalalabing						
bahagi ng taon						
ALIMASAG						
Kapanahunan						
Nalalabing						
bahagi ng taon						
PUSIT						
Kapanahunan						
Nalalabing						
bahagi ng taon						
Salungg... g						
Kapanahunan						
Nalalabing						
bahagi ng taon						
SEA CUCUMBER						
Kapanahunan						
Nalalabing						
bahagi ng taon						
KUHOL						
Kapanahunan						
Nalalabing						
bahagi ng taon						

--- SHOW PORTION MODEL and PICTURE CARD ---

E3. Anong bahagi ng mga sumusunod ay nyong kinakain? Percentages for each species must total 100%.

Klase	Buo	Buo na walang bituka	Buo na may siphon tip na tinanggal	Buo na may siphon tip na tinanggalin ng bituka	TOTAL 100%
Tulya - (Manila Littleneck)					TOTAL 100%
Horse Clams					TOTAL 100%
Butter Clams					TOTAL 100%
Razor Clams					TOTAL 100%
Geoduck Clams					TOTAL 100%
Macoma Clams					TOTAL 100%
Simbabay (COCKLES)					TOTAL 100%
TALABA					TOTAL 100%
TAHONG					TOTAL 100%
ABALONG					TOTAL 100%
CAPIS					TOTAL 100%

(continuation of E3)

Group E

HIPON	Buo (Katawan at ulo) %	Katawan lamang %	Ulo lamang %	TOTAL 100%
ALIMASAG	Buo Alimasag (Laman at aligi) %	Laman lamang %	Aligi ng alimasag % lamang	TOTAL 100%
PUSIT	Buong Pusit ___%	Laman lamang ___% Katawan at galamay	----------	TOTAL 100%
Sakurago	Buong Katawan %	Itlog lamang %	----------	TOTAL 100%
(SEA CUCUMBER) BALAT	Buong Katawan %	Lamang lamang %	----------	TOTAL 100%
Kuhol	Buong Katawan %	Laman lamang %	----------	TOTAL 100%
SUGPO	Buong Katawan (Katawan at ulo) %	Katawan lamang %	Ulo lamang %	TOTAL 100%

E4. Paano ang inyong pagluto sa laman dagat sa Grupo E sa inyong kinakain. Sa mga sumusunod na dalawang kategorya. Inyong sabihin kung ilang porsiyento ng laman dagat sa ---READ ALL METHODS FOR EACH CATEGORY FIRST-- **Answers must total 100%.** Grupo E ay inyong pinuluto ganito.

1) Pinaalsa, nilaga, iniihaw, pinasingawan ___%
2) Nakalata, pinirito, kinilaw, pinausuka, o dinaing ___%

E5. Kung inyong linaga o pinasingawan ay isa sa mga lamang dagat sa Grupo E
Among ginagawa sa tubig na ginamit sa pinakuluan
1) Tinatapon ___% 2) Ginagamit sa Paglute ___% 3) Iniinom ___%

E6. Sa mga sumusunod na kategorya inyong sabihin kung ilang porsiyento ---READ ALL CATEGORIES--- **Answers must total 100%.** Sa Grupo E inyong pinagkukunan.

1) Groserya / Taliptip ___%
2) Lamang dagat na kinuli sa baybay ng Puget Sound ng sariling kasambahan ___%
3) Lamang dagat na nahuli sa labas ng Baybay ng Sa pamilya okaribigan ___%
4) Restaurant Puget Sound ng sariling kasambahan sa pamilya okaribigan ___%

--- SHOW PORTION MODEL and PICTURE CARD ---

GROUP F

F1 Gaano kadalas ang inyong pagkain sa mga sumusunod:

Klase ng pagkaing dagat	Ilang bahagi ay inyong kinakain Linggo	Buwan	Taon	Ilan sa isang taon Linggo	Buwan	PORTION SIZE CODE
Halamang dagat						
Kapanahunan						
Nalalabing						
bahagi ng taon						
KELP - Halamang dagat						
Kapanahunan						
Nalalabing bahagi ng taon						

E2. Sa mga sumusunod na Kategorya ay inyong Sabihin Kung ilang ~~porsiento~~ porsiyento ng lamang dagat sa Grupo E. ay inyong _____ ---READ ALL CATEGORIES--- **Answers must total 100%.**
Pinagkukunan

1) Groseryan/Talipapa ___%
2) Nahuli sa baybay ng Puget Sound ng sarili, kasamahan sa pamilya o kaibigan ___%
3) Nahuli sa labas ng Baybay ng Puget Sound ng sarili, kasamahan sa pamilya o kaibigan ___%
4) Restaurant ___%

May mga pagkain ba dagat na hindi nabanggit? ☐ 1 ___ ☐ 2 ___ (If no, go to H1)
sa naturang talatanungan

G1 Gaano kadalas ang inyong pagkain

Klase ng pagkaing dagat	Ilang bahagi ay inyong nakakain sa isang			Ilang sa isang taon		PORTION MODEL CODE
	Linggo	Buwan	Taon	Linggo	Buwan	

---SOCIAL EVENTS ---

H1 Ang mga sumusunod na Kataonangan ay kungkol sa paggamit at pagkain ng mga pagkaing dagat sa mga espesyal na okasyon o Selebrasyon (Pista, Paskó, Bagong Taon, Kasalan, binyagan at bp.
_____ Ilang beses sa nakaraang (If 0, go to no. I 1)
labing dalawang taon

H2. Ilang porsiyento sa mga okasyong ito? Please answer from 0-100% ___% (If answer is 0, go to I 1)
ay inyong paggamit o pagkain ng mga pagkaing dagat?

---SHOW PORTION MODEL and PICTURE CARD ---

H3. Sa mga okasyong ito gaano karami ang inyong _____ ? ___ oz.(PORTION MODEL CODE: __)
nakakain o nagagamit?

H4 Gaano kadalas ang inyong pagkain at paggamit ng inga ? You may answer from 0-100%.
pagkaing dagat sa mga okasyong ganito?

Laman dagat ___ % _____ ___ % _____ ___ %
(alimasag, tulya, hipon)

I1. Anong gulang _____. Kung inyong ililiban, piliin ang kategorya ng inyong gulang

18-29 ☐1 30-54 ☐2 55 + ☐3

I2. Gaano kayo kabigat ____ lbs. OR ____ kg.

I3. Gaano kayo katas ____ feet ___ inches OR ____ cm.

I4. Magkano ang inyong kita sa isang taon ?

☐1 0-10,000 ☐2 10,001-15,000 ☐3 15,001-20,000 ☐4 20,001-25,000

☐5 25,001-35,000 ☐6 35,001-45,000 ☐7 45,001 +

I5. Ilang tao ang nasusuportahan sa inyong kita?

I6. Iras ng pinag-aralan. ☐1 Tapos ng Matataas na Paaralan ☐2 Hindi tapos ng Matataas na Paaralan

☐3 Tapos ng Kolehiyo ☐4 Hindi tapos ng Kolehiyo ☐5 ATBP

CONCLUSION

Maraming salamat sa inyong Kooperasyon sa pananaliksik na ito. Ang inyong partisipasyon ay magbibigay ng mga mahahalagang impormasyon na makakatulong sa pamahalaang lupa at yamang dagat at upang makapagbigay kaalaman sa pampublikong pangkalusugan sa inyong mga lugar.

NOTE TIME INTERVIEW ENDS: __:__ ☐1 am ☐2 pm

INTERVIEWER REMARKS

J1. Respondent's cooperation was: ☐1 Very good ☐2 Good ☐3 Fair ☐4 Poor

J2. The quality of respondent's answers were: ☐1 High quality ☐2 Generally reliable ☐3 Questionable ☐4 Unreliable

J3. What was the main reason for the questionable or unreliable quality of the interview?

_____

J4. Respondent's Gender Female ☐1 Male ☐2

J5. Further comments:

_____

_____

Appendix M.

Hmong Language Questionnaire

Nqe Lus Nug Tus Lej:1 1 1 1

ASIA THIAB PACIFIC ISLANDER KEV SOJ NTSUAM KAWM TXOG KHOOM NOJ NRUAB DEG.

NHUB HU 1) 1 1 1 1 hl nh xy	2) 1 1 1 1 hl nh xy	3) 1 1 1 1 hl nh xy
LUB NAV MAIM TUAJ XAM PHAJ 1) _ _ _ _ _ 1am 2pm	2) _ _ _ _ _ 1am 2pm	3) _ _ _ _ _ 1am 2pm
QHOV TAU TUS CODES 1) Tiav kev xam phaj 1	2) Tuaj tsis tau: Nav maim dua 2	3) Lwm yam 3

QHOV CHAW XAM PHAJ 1Tus teb lub tsev 2RFSC 3Ntawm tus noj 4Lwm yam _____

TUS TEB SUAM NPE_____ TUS NUG TUS LEJ 1__1__1__1

KEV SIB QHIA KOM PAUB

Nyob zoo. Kuv npe yog _____ thiab kuv yog (Pab neeg twg). Peb yuav nriav kev kawm kom totaub txog kev noj khoom noj nruab deg ntawm tej haiv neeg nyob hauv King County. Cov ntsiab lus teb rau cov lus nug no yuav pab tau koom haum Asia Pacific Islander totaub txog tej feem ntawm kev ua khoom nruab deg los noj. Tagnro tej lus teb uas tau nug no yog los ntawm kev pab thiab tej lus yuav tsis pub tawm rau lwm tus. Koj cov lus yuav muab coj mus xyaw rau lwm tus li kom tsis txhob sib paub.

NHUB XAM PHAJ l__l__l__l
Hl Nh Xy

LUB SIJ HAWM XAM PHAJ __ __ : __ __ 1am 2pm

Kuv yuav nug koj txog tej cov lus nug saib koj puas nyob rau hauv tej pab neeg uas tsim nyog peb yuav kawm.

a) Koj puas nyob hauv King County? Nyob 1 Tsis nyob 2 (IF NO, TERMINATE INTERVIEW)

b) Koj puas noj khoom hav dej? Noj 1 Tsis noj 2 (IF NO, TERMINATE INTERVIEW)

c) Cov neeg nram qab no koj yog pab twg. Maim ib qhe xwb.

Filipino	1	Nyiv Poom	2	Kaus Lim	3	Suav	4	Nyab Laj	5
Nplog	6	Co	7	Hmoob	8	Samoan	9	Qhab Meem	10

d) Koj puas yog yug nyob America? Yog 1 Tsis yog 2
(Yog tsis yog no koj nyob America tau tsawg xyoo?) 0-5 1 6-10 2 11-20 3 21+ 4

e) Puas yog ib tug ntawm koj niam koj txiv yug America no? Yog 1 Tsis yog 2

f) Koj niam thiab koj txiv puas yoj yug nyob America tagnrho? Yog 1 Tsis yog 2

(TERMINATE INTERVIEW IF BOTH "D", "F" ARE YES)

g) Koj puas tau muaj 18 xyoo? Muaj 1 Tsis muaj 2 (IF NO, TERMINATE INTERVIEW)

1. Kuv yuav nug koj saib yam tsiaj nruab deg twg uas koj noj, noj npaum li cas, thiab noj heev npaum li cas.

Koj noj nqaij nruab dej ntau pestsawg thiab npaum li cas ntawd tej zaum nyob ntawm lub caij muaj txua xyoo. Yog hais tias muaj txawv caij no koj ho noj nqaij nruab dej npaum li cas. Koj teb ua 2 yam txawv xws li: lub caij muaj tej nqaij tshiab thiab lub caij uas muab tsau ua khov, muab ziab qhuav, muab ua khoom kau poom, muab tu cia, los lwm yam. Teb li koj paub, nco ntsoov hais txog pluas tshais, su, hmo thiab txom cauj. Tsis txhob hais txog tej uas luag caw koj mus noj xws li (nhub so) xyoo txhiab, rooj sib yuav thiab lwm yam kev mus noj ua qhua. Tej ntawd mam nug tuaj tom qab.

--- FILL OUT CONSUMPTION FORM --- SHOW PORTION MODEL, PICTURE CARD ---

GROUP A

A1. Koj noj heev los ntau npaum li cas raws li nram qab no...

YAM NTSES	TUS LEJ KOJ NOJ NPAUM LI CAS			TUS LEJ NTAWM IB XYOO		PORTION SIZE CODE
	LIM TIAM	HLI	XYOO	LIM TIAM	HLI	
Ntses Salmon						
raws caij						
thawm xyoo						
Nqe Salmon						
raws caij						
thawm xyoo						
Ntses trout						
raws caij						
thawm xyoo						
Ntses smelt						
raws caij						
thawm xyoo						

--- SHOW PORTION MODEL and PICTURE CARD ---

A2. Kuv yuav nug koj saib yog qhov twg ntawm ntses lub cev hauv pawg A no uas koj noj. Qhia kuv saib pestsawg feem pua ntawm cov ntses uas koj noj es tau hais los nyob rau pawg A. Nyeem kom tas tej uas hais los no ua ntej. Teb tib zoo 0-100%. Tej 1 & 2 yuav tsum puv 100%.

1) Daim ntses nrog tawv: ___%
2) Daim ntses tsis nrog tauv: ___% **(1 & 2 total 100%)**
3) Taub hau, pob txha, qe, plab nyhuv ___% **(0-100%)**

A3. Kuv yuav nug koj cov ntses uas nyob hauv pawg A no koj ua li cas ua noj. Rau li 2 nqe hauv qab no qhia kuv saib pestsawg feem pua ntawm lub sijhawm ua koj noj cov ntses no koj ua li cas ua ---READ ALL CATEGORIES FIRST ---Please answer 0-100%. **Answers 1 & 2 must total 100%.**

1) Ci, hau, txhiab, kib, ncu los cub: ___%
2) Ua rau koos poom, kib, noj nyoos, muab qha, los ua qhuav ___% **(1 & 2 must total 100%)**

A4. Yog koj hau, cub los ncu cov ntses nyob rau pawg A, koj muab cov kua ua cas lawm?

1)Ncuav povtseg ___% 2)Siv ua lwm yam ___% 3) Haus ___%

A5. Raws li tej uas hais los nram qab no, qhia rau kuv saib ntxim li pestsawg feem pua ntawm cov ntses nyob hau pawg A koj tau los -- READ ALL CATEGORIES --- **Answers must total 100%.**

1) Yuav hauv taj laj / tej tsheb muag tom kev. ___%
2) Tej ntses uas koj, koj tsev neeg, tej phooj ywg nuv los ntawm Puget Sound thiab ib ncig ze. ___%
3) Tej ntses uas koj, koj tsev neeg, tej phooj ywg nuv los ntawm tej dej uas tawm hauv Puget Sound no lawm ___%
4) Hauv tej lab ua khoom noj ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP B

B1. Koj noj heev los ntau npaum li cas cov uas hais los nram no.

YAM NTSES	TUS LEJ, KOJ NOJ NTAU NPAUM LI CAS			TUS LEJ NTAWM IB XYOO		PORTION SIZE CODE
	LIM TIAM	HLI	XYOO	LIM TIAM	HLI	
Ntses Cod						
raws caij						
thawm xyoo						
Ntses Dogfish						
raws caij						
thawm xyoo						
Ntses snapper						
raws caij						
thawm xyoo						
Ntses snowfish						
raws caij						
thawm xyoo						
Ntses mackeral						
raws caij						
thawm xyoo						
Ntses tuna						
raws caij						
thawm xyoo						

(continuation of B1)

GROUP B

YAM NTSES	TUS LEJ, KOJ NOJ NTAU NPAUM LI CAS			TUS LEJ NTAWM IB XYOO		PORTION SIZE CODE
	LIM TIAM	HLI	XYOO	LIM TIAM	HLI	
Ntses Rockfish						
raws caij						
thawm xyoo						
Ntses Herring						
raws caij						
thawm xyoo						

B2. Kuv yuav nug koj saib qhov twg ntawm ntses lub cev hauv pawg B no uas koj noj. Qhia rau kuv saib pestsawg feem pua ntawm txhua lub sijhawm ua koj noj cov ntses uas tau hais hauv pawg B. --- READ ALL CATEGORIES FIRST --- Please answer from 0-100%. **Answers 1 & 2 must total 100%.**

1) Daim ntses nrog tawv: ___%
2) Daim ntses tsis nrog tawv: ___% **(1 & 2 must total 100%)**
3) Taub hau, pob txha, qe, plab nyhuv ___% **(0-100%)**

B3. Kuv yuav nug koj cov ntses uas nyob hauv pawg B no koj ua li cas ua noj. Rau li 2 nqe hauv qab no qhia kuv saib pestsawg feem pua ntawm cov ntses uas koj noj nyob hauv pawg B no koj ua li cas ua ---READ ALL CATEGORIES FIRST ---Please answer 0-100%. **Answers 1 & 2 must total 100%.**

1) Ci, hau, txhiab, kib, ncu los cub: ___%
2) Ua rau koos poom, kib, noj nyoos, muab qha, los ua qhuav ___%

B4. Yog koj hau, cub los ncu cov ntses nyob rau pawg B, koj muab cov kua ua cas lawm?

1)Ncuav povtseg ___% 2)Siv ua lwm yam ___% 3) Haus ___%

B5. Raws li tej uas hais los nram qab no, qhia rau kuv saib ntxim li pestsawg fęem pua ntawm cov ntses nyob rau pawg B koj tau los -- READ ALL CATEGORIES --- **Answers must total 100%.**

1) Yuav hauv taj laj / tej tsheb muag tom kev ___%
2) Tej ntses uas koj, koj tsev neeg, tej phooj ywg nuv los ntawm Puget Sound thiab ib ncig ze. ___%
3) Tej ntses uas koj, koj tsev neeg, tej phooj ywg nuv los ntawm tej dej uas tawm hauv Puget Sound no lawm ___%
4) Hauv tej lab ua khoom noj ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP C

C1. Koj noj heev los ntau npaum li cas cov uas hais los nram no.

YAM NTSES	TUS LEJ, KOJ NOJ NTAU NPAUM LI CAS			TUS LEJ NTAWM IB XYOO		PORTION SIZE CODE
	LIM TIAM	HLI	XYOO	LIM TIAM	HLI	
Ntses Catfish						
raws caij						
thawm xyoo						
Ntses Crappie						
raws caij						
thawm xyoo						
Ntses Carp						
raws caij						
thawm xyoo						

(continuation of C1)

GROUP C

YAM NTSES	TUS LEJ, KOJ NOJ NTAU NPAUM LI CAS			TUS LEJ NTAWM IB XYOO		PORTION SIZE CODE
	LIM TIAM	HLI	XYOO	LIM TIAM	HLI	
Ntses Perch						
raws caij						
thawm xyoo						
Ntses Tilapia						
raws caij						
thawm xyoo						
Ntses Bass						
raws caij						
thawm xyoo						

C2. Kuv yuav nug koj saib qhov twg ntawm ntses lub cev hauv pawg C no uas koj noj. Qhia rau kuv saib pestsawg feem pua ntawm txhua lub sijhawm ua koj noj cov ntses uas tau hais hauv pawg C. --- READ ALL CATEGORIES FIRST --- Please answer from 0-100%. **Answers 1 & 2 must total 100%.**

1) Daim ntses nrog tawv: ___%
2) Daim ntses tsis nrog tawv: ___% **(1 & 2 must total 100%)**
3) Taub hau, pob txha, qe, plab nyhuv ___% **(0-100%)**

C3. Kuv yuav nug koj cov ntses uas nyob hauv pawg C no koj ua li cas ua noj. Rau li 2 nqe hauv qab no qhia kuv saib pestsawg feem pua ntawm cov ntses uas koj noj nyob hauv pawg C no koj ua li cas ua ---READ ALL CATEGORIES FIRST ---Please answer 0-100%. **Answers 1 & 2 must total 100%.**

1) Ci, hau, txhiab, kib, ncu los cub: ___%
2) Ua rau koos poom, kib, noj nyoos, muab qha, los ua qhuav ___%

C4. Yog koj hau, cub los ncu cov ntses nyob rau pawg B, koj muab cov kua ua cas lawm?

1)Ncuav povtseg ___% 2)Siv ua lwm yam ___% 3) Haus ___%

C5. Raws li tej uas hais los nram qab no, qhia rau kuv saib ntxim li pestsawg feem pua ntawm cov ntses nyob hau pawg C koj tau los -- READ ALL CATEGORIES --- **Answers must total 100%.**

1) Yuav hauv taj laj / tej tsheb muag tom kev. ___%
2) Tej ntses uas koj, koj tsev neeg, tej phooj ywg nuv los ntawm Puget Sound thiab ib ncig ze. ___%
3) Tej ntses uas koj, koj tsev neeg, tej phooj ywg nuv los ntawm tej dej uas tawm hauv Puget Sound no lawm ___%
4) Hauv tej lab ua khoom noj ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP D

D1. Koj noj heev los ntau npaum li cas cov uas hais los nram no.

YAM NTSES	TUS LEJ, KOJ NOJ NTAU NPAUM LI CAS			TUS LEJ NTAWM IB XYOO		PORTION SIZE CODE
	LIM TIAM	HLI	XYOO	LIM TIAM	HLI	
Ntses Halibut						
raws caij						
thawm xyoo						
Ntses sole/flounder						
raws caij						
thawm xyoo						
Ntses Sturgeon						
raws caij						
thawm xyoo						

(continuation of D1)

GROUP D

YAM NTSES	TUS LEJ, KOJ NOJ NTAU NPAUM LI CAS			TUS LEJ NTAWM IB XYOO		PORTION SIZE CODE
	LIM TIAM	HLI	XYOO	LIM TIAM	HLI	
Ntses Suckers						
raws caij						
thawm xyoo						

D2. Kuv yuav nug koj saib qhov twg ntawm ntses lub cev hauv pawg D no uas koj noj. Qhia rau kuv saib pestsawg feem pua ntawm txhua lub sijhawm ua koj noj cov ntses uas tau hais hauv pawg D. --- READ ALL CATEGORIES FIRST --- Please answer from 0-100%. **Answers 1 & 2 must total 100%.**

1) Daim ntses nrog tawv: ___%
2) Daim ntses tsis nrog tawv: ___% **(1 & 2 must total 100%)**
3) Taub hau, pob txha, qe, plab nyhuv ___% **(0-100%)**

D3. Kuv yuav nug koj cov ntses uas nyob hauv pawg D no koj ua li cas ua noj. Raws li 2 nqe hauv qab no qhia kuv saib pestsawg feem pua ntawm cov ntses uas koj noj nyob hauv pawg D no koj ua li cas ua ---READ ALL CATEGORIES FIRST ---Please answer 0-100%. **Answers 1 & 2 must total 100%.**

1) Ci, hau, txhiab, kib, ncu los cub: ___%
2) Ua rau koos poom, kib, noj nyoos, muab qha, los ua qhuav ___%

D4. Yog koj hau, cub los ncu cov ntses nyob rau pawg B, koj muab cov kua ua cas lawm?

1)Ncuav povtseg ___% 2)Siv ua lwm yam ___% 3) Haus ___%

D5. Raws li tej uas hais los nram qab no, qhia rau kuv saib ntxim li pestsawg feem pua ntawm cov ntses nyob hau pawg D koj tau los -- READ ALL CATEGORIES --- **Answers must total 100%.**

1) Yuav hauv taj laj / tej tsheb muag tom kev. ___%
2) Tej ntses uas koj, koj tsev neeg, tej phooj ywg nuv los ntawm Puget Sound thiab ib ncig ze. ___%
3) Tej ntses uas koj, koj tsev neeg, tej phooj ywg nuv los ntawm tej dej uas tawm hauv Puget Sound no lawm ___%
4) Hauv tej lab ua khoom noj ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP E

E1. Koj noj heev los ntau npaum li cas cov uas hais los nram no.

YAM PIAG DEG	TUS LEJ, KOJ NOJ NTAU NPAUM LI CAS			TUS LEJ NTAWM IB XYOO		PORTION SIZE CODE
	LIM TIAM	HLI	XYOO	LIM TIAM	HLI	
Clams (Qwj)						
raws caij						
thawm xyoo						
Horse clams						
raws caij						
thawm xyoo						
Razor clams						
raws caij						
thawm xyoo						
Butter clams						
raws caij						
thawm xyoo						

--- SHOW PORTION MODEL, PICTURE CARD ---

E2. Koj noj heev los ntau npaum li cas cov uas hais los nram no.

YAM TSIAJ SHELLFISH	TUS LEJ, KOJ NOJ NTAU NPAUM LI CAS			TUS LEJ NTAWM IB XYOO		PORTION SIZE CODE
	LIM TIAM	HLI	XYOO	LIM TIAM	HLI	
Shrimp						
raws caij						
thawm xyoo						
Crab (Roob ris)						
raws caij						
thawm xyoo						
Squid						
raws caij						
thawm xyoo						
Sea urchin						
raws caij						
thawm xyoo						
Sea cucumber						
raws caij						
thawm xyoo						
Moonsnail						
raws caij						
thawm xyoo						
Lobster						
raws caij						
thawm xyoo						

--- SHOW PORTION MODEL and PICTURE CARD ---

E3. Kuv yuav nug koj saib qhov twg ntawm cov hauv qab no es koj noj. Percentages for each species must total 100%.

YAM TSIAJ	IB TUG	IB TUG MUAB LAIB PLAB TAWM	IB TUG MUAB TUS TW TAWM	IB TUG MUAB LUB PLAB/TW TAWM	TOTAL 100%
CLAM (Qwj) Tej tsiaj/ caj dab me					TOTAL 100%
HORSE CLAMS					TOTAL 100%
BUTTER CLAMS					TOTAL 100%
RAZOR CLAMS					TOTAL 100%
GEODUCKCLAMS					TOTAL 100%
MACOM CLAMS					TOTAL 100%
COCKLES					TOTAL 100%
OYSTERS					TOTAL 100%
MUSSELS					TOTAL 100%
ABALONE					TOTAL 100%
SCALLOPS					TOTAL 100%

E5. Yog koj hau, cub los ncu cov ntses nyob rau pawg E, koj muab cov kua ua cas lawm?

1)Ncuav povtseg ___% 2)Siv ua lwm yam ___% 3) Haus ___%

E6. Raws li tej uas hais los nram qab no, qhia rau kuv saib ntxim li pestsawg feem pua ntawm cov tsiaj nruab deg hauv pawg E koj tau los -- READ ALL CATEGORIES --- **Answers must total 100%.**

1) Yuav hauv taj laj / tej tsheb muag tom kev. ___%
2) Tej ntses uas koj, koj tsev neeg, tej phooj ywg nuv los ntawm Puget Sound thiab ib ncig ze. ___%
3) Tej ntses uas koj, koj tsev neeg, tej phooj ywg nuv los ntawm tej dej uas tawm hauv Puget Sound no lawm ___%
4) Hauv tej lab ua khoom noj ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP F

F1. Koj noj heev los ntau npaum li cas cov uas hais los nram no.

YAM TSIAJ NRUAB DEG	TUS LEJ, KOJ NOJ NTAU NPAUM LI CAS			TUS LEJ NTAWM IB XYOO		PORTION SIZE CODE
	LIM TIAM	HLI	XYOO	LIM TIAM	HLI	
SEAWEED						
raws caij						
thawm xyoo						
KELP						
raws caij						
thawm xyoo						

F2. Raws li tej uas hais los nram qab no, qhia rau kuv saib ntxim li pestsawg feem pua ntawm cov tsiaj nruab deg hauv pawg F koj tau los -- READ ALL CATEGORIES --- **Answers must total 100%.**

1) Yuav hauv taj laj / tej tsheb muag tom kev. ___%
2) Tej ntses uas koj, koj tsev neeg, tej phooj ywg nuv los ntawm Puget Sound thiab ib ncig ze. ___%
3) Tej ntses uas koj, koj tsev neeg, tej phooj ywg nuv los ntawm tej dej uas tawm hauv Puget Sound no lawm ___%
4) Hauv tej lab ua khoom noj ___%

Puas tseem muaj tej yam khoom noj nruab deg uas peb tsis tau hais txog? 1 Muaj 2 Tsis Muaj (If no, go to H1)

G1. Koj noj heev los ntau npaum li cas cov uas hais los nram no.

YAM TSIAJ NRUAB DEG	TUS LEJ, KOJ NOJ NTAU NPAUM LI CAS			TUS LEJ NTAWM IB XYOO		PORTION SIZE CODE
	LIM TIAM	HLI	XYOO	LIM TIAM	HLI	

--- SOCIAL EVENTS ---

H1. Cov lus nug ntxiv mus no yuav nug koj txog kev muaj mus no mus haus. Yav tas los 12 lub hli koj puas mus pestsawg zaus rau kev noj haus tshwj xeeb (kev noj peb caug, tej koom haum kev noj haus, rooj sib yuav noj tsoob, thiab lwm yam ___ Pes tsawg zaus ntawm 12 lub hli tag no. (IF 0, go to no. I1)

H2. Pestsawg feem pua ntawm tej kev noj haus no es koj noj tej nqaij nruab deg? Please answer from 0-100% ___% (IF answer is 0, go to I1)

--- SHOW PORTION MODEL and PICTURE CARD ---

H3. Tej rooj kev noj haus li no ib zaug twg koj noj nqaij nruab dej ntau npaum li cas ?__ __ __oz. (PORTION MODEL CODE __ __)

H4. Koj mus noj mus haus li no koj puas noj nqaij nruab deg pes tsawg zaus? You may answer from 0-100%.

Tsiaj nruab deg(qwj, roojris, cw...)__ __ __% SEAWEED/KELP __ __ __% NTSES __ __ __%

I1. Qhia koj nhoob nyoog __ __ __. Yog koj tsis qhia, koj xaiv tau raws li nram no.

18-29 1 30-54 2 55+ 3

I2. Qhia koj qhov nyhav __ __ __ lbs. OR __ __ __ kg.

I3 Qhia koj qhov siab __ __ __feet __ __ inches OR __ __ __ cm.

I4. Koj tsev neeg tau nyiaj npaum li cas rau ib xyoo?

1	0-10,000	2	10,001-15,000	3	15,001-20,000	4	20,001-25,000
5	25,001-35,000	6	35,001-45,000	7	45,001+		

I5. Pestsawg leeg neeg uas cov nyiaj no los yug?_____

I6. Qhia kev kawm ntawv saib siab li cas. 1Tas qeb kaum ob high school 2 Tsis tas qeb kaum ob.
3 Kawm tas nrog college 4 Kawm tsis tas college 5 Lwm yam _____

CONCLUSION

Ua koj tsaug rau qhov uas koj pab peb koom tes txog qhov kev kawm no. Qhov koj koom tes pab peb no tseem ceem thiab yuav pab tau peb txog kev paub ntau tej yam ua koom haum saib xuas kev noj nyob txhim kho thiab ceev txog ib ncig zej zog.

NOTE TIME INTERVIEW ENDS: __ __:__ __ 1am 2pm

INTERVIEWER REMARKS

J1. Respondents' cooperation was: 1 Very good 2 Good 3 Fair 4 Poor

J2. The quality of respondent's answers were: 1 High quality 2 Generally reliable 3 Questionable 4 Unreliable

J3. What was the main reason for the questionable or unreliable quality of the interview?

J4. Respondent's Gender Female 1 Male 2

J5. Further comments:

_____

_____

Appendix N.

Korean Language Questionnaire

설문지 번호 : | | | |

아시아계 및 태평양 제도인의 해산물 소비 연구

전화건 시각		
1) | | | | 월 일 년	2) | | | | 월 일 년	3) | | | | 월 일 년
인터뷰 약속 시간		
1) __:__ ☐1am ☐2pm	2) __:__ ☐1am ☐2pm	3) __:__ ☐1am ☐2pm
결과 코드		
1) 인터뷰 완료 ☐1	2) 약속 불이행, 다시 예정 ☐2	3) 기타 ☐3

인터뷰 장소 ☐1 응답자의 자택 ☐2 난민협회회관 ☐3 간이식당 ☐4 기타

응답자의 성명 머릿글자 _____ 회전자 코드 | | | |

소개

안녕하세요! 제 이름은 OOO이고, 저는 한국인입니다. 저희는 킹카운티 한국인들의 해산식품 섭취형태를 이해하기 위한 연구를 하고 있습니다. 이 설문서에 대한 응답으로 얻은 정보는 아시아계 및 태평양제도인들의 해산식품 소비량과, 식사조리법, 늘상 소비하는 해산식품의 유형을 이해하는 것을 도와줄 것입니다. 이 인터뷰에 제공되는 정보는 전부 자발적인 것이며 비밀이 지켜질 것입니다. 귀하의 대답은 다른 분들의 대답과 섞이어서 누구의 대답인지 알수 없게 될것입니다.

인터뷰 일자 _____ 1 1 1 1 (월 일 년) 인터뷰 시작 __ __:__ __ ☐1am ☐2pm

귀하가 우리가 연구하려는 그룹에 속하는지 결정하기 위해서 몇가지 여쭈어보겠습니다.

a) 킹카운티에 사십니까? 예 ☐1 아니오 ☐2 (IF NO, TERMINATE INTERVIEW)

b) 해산물을 잡수시죠? 예 ☐1 아니오 ☐2 (IF NO, TERMINATE INTERVIEW)

c) 다음중 어떤 민족에 속하신다고 할수 있나요. 하나만 표시하세요.

필리핀계 ☐1 일본계 ☐2 한국계 ☐3 중국계 ☐4 월남계 ☐5

라오스계 ☐6 미얀마계 ☐7 흐몽계 ☐8 사모아계 ☐9 카보디아계 ☐10

d) 미국에서 태어나셨습니까? 예 ☐1 아니오 ☐2

(아니면, 미국에 몇년동안 사셨습니까?) 0-5☐1 6-10☐2 11-20☐3 21+☐4

e) 부모님중 적어도 한분이 미국에서 태어나셨습니까? 예 ☐1 아니오 ☐2

f) 부모가 모두 미국에서 태어나셨습니까? 예 ☐1 아니오 ☐2

(TERMINATE INTERVIEW IF BOTH "D", "F" ARE YES)

g) 몇 여러분이 넘으십니까 ? 예 □1 아니오 □2 (IF NO, TERMINATE INTERVIEW)

1. 이번 종류의 해산식품을 드시고, 얼마나 드시는지, 얼마나 자주 드시는지 여쭤보겠습니다.

드시는 해산식품의 양이나 빈도는 철에 따라 다를지도 모르지요. 예를 들어, 제철에 따라 얼마나 자주 먹는지가 다르면 두가지로 대답하세요. 신선하고 쉽게 구할 수 있을때와 냉동, 건조, 통조림, 저장식품 등은 드실때와 계절 상관 없이 대답하세요. 아침, 점심, 저녁식사 그리고 간식을 포함시키는 것을 기억하세요. 특히 축하 행사때 드시는 것을 포함시키지 마세요(명절, 음력설, 양력설, 결혼식, 공민행사 문화행사들). 뒤에 여쭈어 보겠습니다.

--- FILL OUT CONSUMPTION FORM --- SHOW PORTION MODEL, PICTURE CARD ---

GROUP A

A1. 다음의 것들을 얼마나 자주 드세요? ...

생선 종류	먹는 부위의 수			연간 숫자		PORTION SIZE CODE
	주	월	년	열주	열 달	
새 뽈						
제철						
연중 나머지 기간						
여어 알						
제철						
연중 나머지 기간						
송어						
제철						
연중나머지기간						
바다빙어						
제철						
연중 나머지 기간						

--- SHOW PORTION MODEL and PICTURE CARD ---

A2. A 그룹의 있는 생선의 어떤 부위를 잡수시는지 여쭈보겠습니다. A 그룹의 생선을 드실때 다음 범주의 것을 드시는 때가 몇 퍼센트나 되는지 말씀해 주세요. ... 모든범주를 다 합의 줄라 — 0 에서 100 퍼센트로 답하시오. 1과 2의 답이 100 퍼센트가 되어야 합니다.

A2.
1) 껍질째로 살 : ___%
2) 껍질 빼고 살만 ___% (1 & 2 total 100%)
3) 머리. 뼈. 알. 내장 : ___% (0-100%)

A3. A 그룹의 생선을 드실 때 어떻게 조리하시는지 여쭈보겠습니다. A그룹의 생선을 드실때 다음 범주에 속하는 식으로 조리해서 드시는 경우가 몇 퍼센트가 되는지 말씀해 주세요.

---READ ALL CATEGORIES FIRST---Please answer 0-100%. **Answers 1 & 2 must total 100%.**

1) 베이크해서, 삶아서, 구워서, 로스트로, 데쳐서, 찌져서 : ___%
2) 튀김으로, 튀겨서, 날로, 훈제로, 말려서: ___% (1 & 2 must total 100%)

A4. A 그룹의 생선중 어느것이든지 삶거나 찌거나 데치는경우, 남은 조리한 물을 어떻게 하시는 ?

1) 버린다 ___% 2) 요리에 쓴다 ___% 3) 마신다 ___%

A5. A 그룹의 생선을 구하실 때 대개 몇퍼센트를 다음 범주중에서 구하는지 말씀해 주세요.

---READ ALL CATEGORIES--- **Answers must total 100%.**

1) 고기잡이, 길가 상인 ___%
2) 본인이나 가족, 친구들이 뜨겟사으로 및 2 주변에서 잡은 생선 ___%
3) 본인이나 가족, 친구들이 뜨겟사으로 밖이나 2 주변에서 잡은 생선 ___%
4) 식당 ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP B

B1. 다음의 것을 얼마나 자주 드십니까?

식품군 종류	먹는 부위의 수			연간 숫자		PORTION SIZE CODE
	주별	월별	연간	몇주	몇달	
대구						
지지털						
연중 나머지 기간						
곱상어(도그피쉬)						
지지털						
연중 나머지 기간						
돌미						
지지털						
연중 나머지 기간						
스토피쉬						
지지털						
연중 나머지 기간						
고등어						
지지털						
연중 나머지 기간						
참치(튜나)						
지지털						
연중 나머지 기간						

(continuation of B1)

GROUP B

생선 종류	먹는 부위의 숫자			얼마 횟수		PORTION SIZE CODE
	주	월	년	몇 주	몇 달	
라크대쉬(모든메기)						
제철						
연중 나머지 기간						
청어						
제철						
연중 나머지 기간						

B2.
B 그룹 생선의 어떤 부위를 드시는지 여쭈어 보겠습니다. B 그룹의 생선을 드실때 다음 범주에 속하는 부위를 드시는 퍼센트가 얼마인지 말씀해 주세요. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) 껍질채로 살 : ___%
2) 껍질빼고 살만 : ___% **(1 & 2 must total 100%)**
3) 머리, 뼈, 알, 내장 : ___% **(0-100%)**

B3.
B 그룹 생선을 드실때 어떻게 조리하시는지 여쭈어 보겠습니다. B 그룹의 생선을 드실때 다음 범주에 드는 식으로 조리해서 드시는 경우가 몇 퍼센트나 되는지 말씀해 주세요. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.**

1) 베이크해서, 삶아서, 구워서, 로스트로, 데워서, 찌워서 : ___%
2) 통조림으로, 튀겨서, 날로, 훈제로, 말려서 : ___%

B4. B 그룹의 해산식품을 삶거나 찌는경우 그것 넣고 조리한 물을 어떻게 하시나요?

1) 버린다 ___ ___ ___% 2) 앞에 사용한다 ___ ___ ___% 3) 마신다 ___ ___ ___%

B5. B 그룹의 생선을 구하실때 대개 몇 퍼센트를 다음 범주 중에서 구하는지 말씀하여 주세요 _____: ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) 고기잡이, 길가상인 ___ ___ ___%
2) 본인이나 가족, 친구들이 뜨낏사용으로 강 그 주변에서 잡은 생선 ___ ___ ___%
3) 본인이나 가족, 친구들이 뜨낏사용으로지역 밖이나 그 주변에서 잡은 생선 ___ ___ ___%
4) 식당 ___ ___ ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP C

C1. 다음의 것들을 얼마나 자주 드십니까?

생선 종류	먹는 횟수의 수			연습 회수		PORTION SIZE CODE
	주	월	연	주	달	
메기						
지리						
연습내지기간						
개복치(크래피)						
지리						
연습내지 기간						
잉어						
지리						
연습내지기간						

(continuation of C1)

GROUP C

생선 종류	먹는 부위의 중량			- 연간 횟수		PORTION SIZE CODE
	주	월	년	주	달	
동어(퍼치)						
지지체						
연중내내 기간						
틸라피아						
지지체						
연중내내 기간						
동어 (바스)						
지지체						
연중내내 기간						

C2. C 그룹에 있는 생선의 어떤 부위를 잡수시는지 여쭤보겠습니다. C 그룹의 생선을 드실때 다음 범주의 것을 드시는데 몇퍼센트나 되는지 말씀해 주세요. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) 껍질채로 살 : ___%
2) 껍질빼고 살만 : ___% **(1 & 2 must total 100%)**
3) 머리, 뼈, 알, 내장 : ___% **(0-100%)**

C3. C 그룹의 생선을 드실때 어떻게 조리하시는지 여쭤보겠습니다. A 그룹의 생선을 드실때 다음 범주에 속하는 식으로 조리해서 드시는 경우가 몇 퍼센트가 되는지 말씀해 주세요. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.**

1) 베이크해서, 삶아서, 구워서, 로스트로, 데쳐서, 찌워서 ___%
2) 튀김으로, 튀겨서, 날로, 훈제로, 말려서 ___%

C4. C 그룹의 해산식품을 살거나 지는 경우, 그걸 넣고 조리한 물을 어떻게 하세요?

1) 버린다 ___% 2) ___% 3) 마신다 ___%

C5. C 그룹의 생선을 대개 몇 퍼센트나 다음 범주에서 획득하는지 알려 주세요 : ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) 고기잡이. 길가 상인 ___%
2) 본인이나 가족 친구들이 물고기 사냥으로 잡은 생선 ___%
3) 본인이나 가족 친구들이 물고기 사냥으로 얻은 생선 ___%
4) 식당 ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

Group D

D1.

생선 종류	먹는 부위의 숫자			먹는 회수		PORTION SIZE CODE
	주	월	년	주	달	
명치						
지지						
연줄나비지 기고						
허가자미 / 가자미						
지지						
연줄나비지 기고						
청강 상어						
지지						
연줄나비지 기고						

(continuation of D1)

GROUP D

생선종류	먹은 부위의 숫자			얼마 횟수		PORTION SIZE CODE
	주	월	년	주	달.	
양이 (서거)						
제철						
연중내내 기간						

D2. D 2줄에 있는 생선의 어떤 부위를 드시는지 여쭈어보겠습니다. D 2줄의 생선을 드실때 다음 범주에 속하는 부위를 드시는 경우가 몇 퍼센트나 되는지 말씀해 주세요. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) 껍질채로 살 : ___%
2) 껍질빼고 살만 : ___% **(1 & 2 must total 100%)**
3) 머리, 뼈, 알, 내장 : ___% **(0-100%)**

D3. D 2줄의 생선을 드실때 어떻게 조리하시는지 여쭈어보겠습니다. D 2줄의 생선을 드실때 다음 범주에 속하는 식으로 조리해서 드시는 경우가 몇 퍼센트 되는지 말씀해 주세요. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.**

1) 베이크해서, 삶아서, 쪄서, 로스트로, 데쳐서, 찌셔서 ___%
2) 튀김으로, 튀겨서, 날로, 훈제로, 말려서 ___%

D4. D 2줄의 해산식품을 삶거나 찌는경우 그걸 넣고 조리한 물을 어떻게 하시나요?

1) 버린다 ___% 2) 요리에 쓴다 ___% 3) 마신다 ___%

D5. D2줄의 생선을 구하실 때 대개 몇 퍼센트를 다음 범주들에서 구하는지 말씀해 주세요: ---READ ALL CATEGORIES---
Answers must total 100%.

1) 고래잡이, 길가상인 ___%
2) 본인이나 가족, 친구들이 뭄짓사울드 지역 및 그 주변에서 잡은 생선 ___%
3) 본인이나 가족, 친구들이 뭄짓사울드 지역 밖이나 그 주변에서 잡은 생선 ___%
4) 식당 ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP E

E1. _____

갑각류의 종류	먹는 부위의 숫자			연중 회수		PORTION SIZE CODE
	주	월	년	주	달	
마냐나 클램						
제철						
연중 나머지 기간						
호스 클램						
제철						
연중 나머지 기간						
맛조개(리이조 클램)						
제철						
연중 나머지 기간						
버터 클램						
제철						
연중 나머지 기간						

(continuation of E1)

Group E

감각류의 종류	먹은 부위의 숫자			연령	횟수	PORTION SIZE CODE
	주	월	연			
주이 덕						
제철						
연중 나머지 기간						
마코마 콩게						
제철						
연중 나머지 기간						
새조개						
제철						
연중나머지 기간						
굴						
제 철						
연중나머지 기간						
홍 합						
제철						
연중나머지기간						
전복						
제철						
연중나머지 기간						
스캘롭						
제철						
연중나머지 기간						

--- SHOW PORTION MODEL, PICTURE CARD ---

E2. _____

음식류의 종류	먹는 부위의 숫자			먹는 횟수		PORTION SIZE CODE
	주	월	연	주	달	
새우						
제철						
연중내내지기는						
게						
제철						
연중내내지기는						
오징어						
제철						
연중내내지 기는						
성게						
제철						
연중내내지기는						
해삼						
제철						
연중내내지기는						
문어						
제철						
연중내내지기는						
가재(롭스터)						
제철						
연중내내지기는						

--- SHOW PORTION MODEL and PICTURE CARD ---

E3. 다음 것들의 어떤부위를 드시는지 여쭤보겠습니다. Percentages for each species must total 100%.

종류	전체	내장 제거한 전체	발판 끝 제거한 전체	발판 끝 및 내장 제거한 전체	TOTAL 100%
마닐라 클램					TOTAL 100%
홍스 클램					TOTAL 100%
버터 클램					TOTAL 100%
레이조 클램 (맛조개)					TOTAL 100%
주이 덕					TOTAL 100%
마코마 클램					TOTAL 100%
새조개					TOTAL 100%
굴					TOTAL 100%
홍합					TOTAL 100%
전복					TOTAL 100%
스캘롭					TOTAL 100%

(continuation of E3)

Group E

새우	전부(몸체와 머리) ___%	몸체만 ___%	머리만 ___%	TOTAL 100%
게	전부(게살과 껍질에 붙은 부분) ___%	살만 ___%	껍질에 붙은 부분만 ___%	TOTAL 100%
오징어	오징어 전체 ___%	살만 (몸체와 다리) ___%	----------	TOTAL 100%
성게	전부 ___%	알만 ___%	----------	TOTAL 100%
해삼	전체 ___%	육질만 ___%	----------	TOTAL 100%
문스네일	전체 ___%	육질만 ___%	----------	TOTAL 100%
가재	전체(몸체와 머리) ___%	몸체만 ___%	머리만 ___%	TOTAL 100%

E4. E 그룹의 갑각류를 도살 전에 어떻게 준비하시는지 여쭤보겠습니다. E 그룹의 갑각류를 도살 전에 다음 방법에 속하는 식으로 준비해서 도시는 경우는 몇 퍼센트나 되는지 말씀해 주세요. ---READ ALL METHODS FOR EACH CATEGORY FIRST-- **Answers must total 100%.**

1) 버너로 해서, 삶아서, 로스트해서, 튀기거나, 찌서 ___%
2) 통째로, 튀겨서, 날로, 훈제로, 말려서 ___%

(continuation of E3)

Group E

새우	전부(몸체와 머리) ___%	몸체만 ___%	머리만 ___%	TOTAL 100%
게	전부(게살과 껍질에 붙은 부분) ___%	살만 ___%	껍질에 붙은 부분만 ___%	TOTAL 100%
오징어	오징어 전체 ___%	살만 (몸체와 다리) ___%	----------	TOTAL 100%
성게	전부 ___%	알만 ___%	----------	TOTAL 100%
해삼	전체 ___%	움직만 ___%	----------	TOTAL 100%
문스네일	전체 ___%	움직만 ___%	----------	TOTAL 100%
가재	전체(몸체와 머리) ___%	몸체만 ___%	머리만 ___%	TOTAL 100%

E4. E 그룹의 갑각류를 드실때 어떻게 조리하시는지 여쭤보겠습니다. E 그룹의 갑각류를 드실때 다음 방법에 속하는 식으로 조리해서 드시는 경우는 몇 퍼센트나 되는지 말씀해 주세요. ---READ ALL METHODS FOR EACH CATEGORY FIRST-- **Answers must total 100%.**

1) 레이크해서, 삶아서, 로스트해서, 튀기거나, 찌워서 ___%
2) 통조림으로, 튀겨서, 날로, 훈제로, 말려서 ___%

E5. B 그룹의 감각류를 살거나 지는경우, 그걸 병 혹 준비한 물을 어떻게 하시나요 ?

1) 버린다 ___% 2) 집에 쓸다 ___% 3) 마신다 ___%

E6. B 그룹의 생선을 구하실때 대개 몇퍼센트를 다음 범주중에서 구하는지 말씀해 주시기요 ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) 고기잡이, 길가상인 ___%
2) 본인이나 가족, 친구들이 뒤짓사울 지역 및 그 주변에서 잡은 생선 ___%
3) 본인이나 가족, 친구들이 뒤짓사울 지역 밖이나 그 주변에서 잡은 생선 ___%
4) 식당 ___%

--- SHOW PORTION MODEL and PICTURE CARD ---

GROUP F

F1. 다음의 것들을 얼마나 자주 드십니까 ...

해산식품종류	먹는 부위의 수			연중 횟수		PORTION SIZE CODE
	주	월	연	주	달	
게						
지렁						
연중내내지 기고						
다시마						
지렁						
연중 내내지기고						

F2. F 그룹의 해산식품을 구하실때 대개 몇퍼센트를 다음 범주중에서 구하시는지 알려주세요

---READ ALL CATEGORIES--- **Answers must total 100%.**

1) 그로서리, 길가상인 ___%
2) 본인이나 가족, 친구들이 유적지로 지역 및 그 주변에서 잡은 해산식품 ___%
3) 본인이나 가족 친구들이 유적지로 지역 밖이나 그 주변에서 잡은 해산식품 ___%
4) 식당 ___%

이상에 언급되지 않은 다른 해산식품을 드시는게 있나요? ☐ 1 예 ☐ 2 아니오 (If no, go to H1)

G1.

해산식품 종류	먹는 빈도			연중 횟수		PORTION MODEL CODE
	주	월	연	주	달	

---SOCIAL EVENTS ---

H1. 다음을 위하여 사교모임에서 무엇을 어떻게 드시는지를 여쭈어보겠습니다. 지난 열두달 동안 특별행사(결혼식, 음력설, 양력설, 문화, 교환행사 결혼식등)에 몇번이나 참석하셨습니까?

___ ___ (If 0, go to no. I 1)

H2. 그런 행사에서 해산식품을 드신것은 몇퍼센트나 되나요? Please answer from 0-100% ___% (If answer is 0, go to I 1)
0에서 100 퍼센트로 답하세요

---SHOW PORTION MODEL and PICTURE CARD ---

H3. 이런 경우에 한번에 해산식품을 대개 얼마나 잡수세요 ? ___ oz.(PORTION MODEL CODE: __)

H4. 다음의 해산식품을 이런경우에 얼마나 자주 드세요 ? You may answer from 0-100%.

갑각류(게, 조개, 새우) ___ % 김, 다시마 ___ % 생선 ___ %

I1. 나이를 말씀해 주세요 ___. 말하고 싶지 않으시면, 어느 범위에 드는지 표시해 주세요.

18-29 ☐1 30-54 ☐2 55 + ☐3

I2. 몸무게를 말씀해 주세요 ___ lbs. OR ___ kg.

I3. 키를 말씀해 주세요 ___ feet ___ inches OR ___ cm.

I4. 댁의 1년수입을 얼마나 되세요 ?

☐1 0-10,000 ☐2 10,001-15,000 ☐3 15,001-20,000 ☐4 20,001-25,000

☐5 25,001-35,000 ☐6 35,001-45,000 ☐7 45,001 +

I5. 이 수입전부로 몇식구가 사세요 ? ___

I6. 학교 교육을 얼마나 받으셨어요. ☐1 고등학교 졸업 ☐2 고등학교 중퇴

☐3 대학졸업 ☐4 대학 중퇴 ☐5 기타

CONCLUSION

이 연구에 참여, 협조해 주셔서 감사합니다. 귀하가 참여해 주셔서 천연자원을 보호하고 귀하가 속한 교민 사회를 위한 응급 헬스프로그램에 대한 지침을 제공하는데 필요한 중요한 정보를 보태주게 될 것입니다.

NOTE TIME INTERVIEW ENDS: 인터뷰 끝낸시각 __:__ ☐1 am ☐2 pm

INTERVIEWER REMARKS

J1. Respondent's cooperation was: ☐1 Very good ☐2 Good ☐3 Fair ☐4 Poor

J2. The quality of respondent's answers were: ☐1 High quality ☐2 Generally reliable ☐3 Questionable ☐4 Unreliable

J3. What was the main reason for the questionable or unreliable quality of the interview?

J4. Respondent's Gender Female ☐1 Male ☐2

J5. Further comments:

Appendix O.

Laotian Language Questionnaire

ຂໍ້ຖາມເລກທີ : | | | |

ຂໍ້ສຶກສາກ່ຽວກັບການບໍລິໂພກອາຫານຫະເລຂອງຊາວເຮືອນເລະປາຈືນ້ຳ

ວັນທີ ບອກ		
1) | | | | ເດືອນ,ມື້,ປີ	2) | | | | ເດືອນ,ມື້,ປີ	3) | | | | ເດືອນ,ມື້,ປີ
ເວລາຫມາຍນັດສຳພາດ		
1) __ __:__ __ ☐1am ☐2pm	2) __ __:__ __ ☐1am ☐2pm	3) __ __:__ __ ☐1am ☐2pm
ເຫດທີ່ໄດ້ຮັບ		
1) ການສຳພາດໄດ້ຄົບຖ້ວນ ☐1	2) ບໍ່ມາຕາມນັດຫມາຍ,ນັດໃຫ່ຫີ ☐2	3) ເລະອື່ນໆ ☐3

ບ່ອນໃດທີ່ການສຳພາດ ☐1ທີ່ເຮືອນຜູ້ຮັບຕອບເອງ ☐2ສູນການຈານ ເອພຍ ☐3ສານັ ອາຫານ ☐4 ເລະອື່ນໆ

ໃຊ້ຕົວອັກສອນຫນັ້ງສືຂອງຜູ້ຮັບຕອບ _____ ເຄື່ອງຫມາຍຂອງຜູ້ສຳພາດ | | | |

ການແນະນຳ

ສະບາຍດີ, ຊື່ຂ້າພະເຈົ້າແມ່ນ ..... ແລະ ຂ້າພະເຈົ້າເປັນ ເຊື່ອມໂຍງ ລາວ. ພວກເຮົາກຳລະນຸກເອົາ ຂໍ້ແນະນຳ ກ່ຽວກັບການກິນອາຫານຂອງຄົນເຫົ່າ ທີ່ອາຍຸຢູ່ໃນເຂດການແພດ ຄວນເພີ່ນ ມາເລົ່າໃຫ້ຂ້າພະເຈົ້າ. ຂໍ້ການ ທີ່ທ່ານຕອບ ມານັ້ນ ຈະຊ່ວຍໃຫ້ຊຸມນຸນ ຊົນ ລາວ ອາເມລິກ ແລະ ປາຊິຟິກ ໄດ້ແຈ້ງ ຈາກ ຄ່າ ຂອງ ອາຫານ ທະ ເລ ໃນການ ບໍ່ ດີ ໂພດ ທ, ທີ່ໄດ້ ຖືກ ນຳ ມາ ຄວ ກິ ນ. ທຸກ ຂໍ້ ຄວາ ມ ຖືກ ສ ຳ ພາ ດ ນັ້ ນ ແ ມ ນ ຄ ວ ້ ອ ຄ ວ າ ມ ສ ະ ດ ວ ກ ທ ີ່ ແ ທ ້ ຈ ແ ລ ະ ທ ີ່ ແ ທ ້ ຈ ິ ງ ຄ ວ າ ມ ລ ັ ບ . ຄ ຳ ຕ ອ ບ ຂ ອ ງ ທ ່ ານ ຈ ະ ຮ ັ ກ ສ າ ຄ ວ າ ມ ສ ະ ດ ວ ກ ສ ະ ບ າ ຍ ຂ ອ ງ ທ ່ ານ ເ ປ ັ ນ ຄ ຳ ຕ ອ ບ ຂ ອ ງ ທ ່ ານ ເ ທ ົ ່ າ ນ ັ ້ ນ ; ບ ໍ ່ ມ ີ ຜ ູ ້ ໃ ດ ຈ ະ ຮ ູ ້ ຄ ຳ ຕ ອ ບ ຂ ອ ງ ທ ່ ານ ວ ່ າ ແ ມ ນ ຄ ຳ ຕ ອ ບ ຂ ອ ງ ທ ່ ານ ບ ໍ ່ ມ ີ ຜ ູ ້ ໃ ດ ຈ ະ ຮ ູ ້ ຄ ຳ ຕ ອ ບ ຂ ອ ງ ທ ່ ານ.

ວັນທີ່ທີ່ສຳພາດ ____ | | | | ____ ເດືອນ ມື້ ປີ ເວລາເລີ່ມ ສຳພາດ ____ __ : __ __ ☐1am ☐2pm

ຂ້າພະເຈົ້າ (ຫຼື ຂອງຂັ) ຈະໄດ້ຖາມ ທ່ານ ບາງ ບັ ນ ຫາ ທີ່ ກ ່ ຽ ວ ຂ ອ ງ ຊ ີ ວ ິ ດ ຄ ະ ນ ະ ທີ່ ທ ່ ານ ຜ ູ ້ ນ ຶ ່ ງ ຜ ູ ້ ດ ຽ ວ ຈ ຸ ຄ ນ ັ ດ ຄ ວ າ ຂ ອ ງ ພ ວ ກ ເ ຮ ົ າ.

a) ທ່ານ ຜູ້ ດ ຽ ວ ຂ ອ ດ ທ ່ ານ ການ ແ ພ ດ ຄ ວ ນ ບ ໍ ? ແ ມ ນ ☐1 ບ ໍ ່ ແ ມ ນ ☐2 (IF NO, TERMINATE INTERVIEW)

b) ທ່ານ ບ ໍ ່ ເ ຄ ີ ຍ ກ ິ ນ ອ າ ຫ ານ ທ ະ ເ ລ ? (ຈ ົ ດ ຈ ່ ງ ຍ) ແ ມ ນ ☐1 ບ ໍ ່ ແ ມ ນ ☐2 (IF NO, TERMINATE INTERVIEW)

c) ແ ມ ນ ຈ ຸ ນ ຈ າ ກ ເ ຜ ົ ່ າ ໃ ດ ທ ີ່ ທ ່ ານ ນ ັ ບ ຖ ື ກ ຳ ເ ນ ີ ດ ຈ ິ ງ ບ ອ ກ ພ ວ ກ ພ ວ ກ ເ ຮ ົ າ ວ ັ ນ ດ ຽ ວ.

ຟິ ລິ ປ ປິ ນ ☐1 ຍ ີ ປ ຸ ່ ນ ☐2 ເ ກ າ ຫ ລ ີ ☐3 ຈ ີ ນ ☐4 ອ າ ເ ມ ລ ິ ກ ☐5

ລ າ ວ ☐6 ພ ູ ມ ິ ☐7 ພ ະ ມ ່ າ ☐8 ສ ະ ຫ ວ ອ ນ ☐9 ວ ຽ ດ ນ າ ມ ☐10

d) ທ ່ ານ ໄ ດ ້ ເ ກ ີ ດ ຢ ູ ່ ໃ ນ ສ ະ ຫ ະ ຣ ັ ດ ອ ະ ເ ມ ຣ ິ ກ າ ບ ໍ ? ແ ມ ນ ☐1 ບ ໍ ່ ແ ມ ນ ☐2

(ຖ້ າ ບ ໍ ່ , ຈ ົ ດ ຈ ່ ງ ຍ) ທ ່ ານ ຢ ູ ່ ໃ ນ ສ ະ ຫ ະ ຣ ັ ດ ອ ະ ເ ມ ຣ ິ ກ າ ນ ຳ ບ ໍ ?) 0-5 ☐1 6-10 ☐2 11-20 ☐3 21 + ☐4

e) ບ ໍ ່ ແ ມ ນ ຂ ອ ງ ທ ່ ານ ນ ຶ ດ ເ ຫ ັ ນ ຜ ູ ້ ນ ຶ ່ ງ ໄ ດ ້ ເ ກ ີ ດ ຢ ູ ່ ໃ ນ ສ ະ ຫ ະ ຣ ັ ດ ອ ະ ເ ມ ຣ ິ ກ າ ບ ໍ ? ແ ມ ນ ☐1 ບ ໍ ່ ແ ມ ນ ☐2

f) ບ ໍ ່ ແ ມ ນ ຂ ອ ງ ທ ່ ານ ໄ ດ ້ ເ ກ ີ ດ ຢ ູ ່ ໃ ນ ສ ະ ຫ ະ ຣ ັ ດ ອ ະ ເ ມ ຣ ິ ກ າ ບ ໍ ? ແ ມ ນ ☐1 ບ ໍ ່ ແ ມ ນ ☐2

(TERMINATE INTERVIEW IF BOTH "D", "F" ARE YES)

g) ທ່ານມີອາຍຸຮອດ 18 ປີແລ້ວບໍ? ແມ່ນ ☐1 ບໍ່ແມ່ນ ☐2 (IF NO, TERMINATE INTERVIEW)

1. ຂໍນະຄຸນຈະຖາມທ່ານກ່ຽວກັບອາຫານທີ່ທ່ານກິນ, ຈຳນວນເທົ່າໃດທ່ານກິນ, ແລະທ່ານກິນແນວໃດແດ່ນໍ.

ຈຳນວນອາຫານທະລວທ່ານກິນ ແລະ ກິນແນວໃດນັ້ນແມ່ນຂຶ້ນກັບການລວມສະຫຼຸບ ປະຈຳປີ, ລະດູການຕ່າງ, ຖ້າມີການແຕ່ງງານ ທ່ານກິນອາຫານທະລວແນວໃດບໍ, ກະລຸນາຕອບສອງທາງຕ່າງກັນ: ເມື່ອໃດທີ່ມັນສົດ ແລະ ພວມທີ່ໃຊ້ໄດ້ ແລະ ເມື່ອໃດທີ່ມັນເປັນນ້ຳແຂ็ງ, ເມື່ອໃດທີ່ມັນປ່ຽນສະປາບ, ເມື່ອໃດເກັບໄວ້ ແລະ ອື່ນໆ. ກະລຸນາຕອບຄຳຖາມທີ່ທ່ານເຄີຍຮູ້ຈັກ, ເຊັ່ນ ໄວ້ຈັ່ງ ລວມທັງເຂົ້າຈີ່, ເຂົ້າໜ່ຽ, ເຂົ້າແຈ ແລະ ອາຫານອື່ນ. ທ່ານກິນອາຫານທະລວໃນງານພິເສດ (ວັນສະຫຼອງງານ, ປີໃຫ່ມ່ວນ, ປີໃຫ່ມ່ວນ, ງານ, ສະຫຼອງ ຊຸມນຸມ ຊຸມ ຫຼື ວັດທະນະທຳ ແລະ ອື່ນໆ) ພວກເພີ່ນຈະຖາມຕາມທີ່ນີ້.

--- FILL OUT CONSUMPTION FORM --- SHOW PORTION MODEL, PICTURE CARD ---

GROUP A

A1. ມື້ວານນີ້ ທ່ານກິນຕາມລາຍການຕໍ່ໄປນີ້.

ສະບຽງອາຫານ	ຈຳນວນກິນເທົ່າໃດ ຕໍ່			ຈຳນວນເທົ່າໃດ ຕໍ່ ປີ		PORTION SIZE CODE
	ອາທິດ	ເດືອນ	ປີ	ຈຳນວນອາທິດ	ຈຳນວນເດືອນ	
ປາຂາວ ແລ້ນ						
ເມນລະດູ						
ຕະຫຼອດປີ						
ເຂ້ປາຂາວ ແລ້ນ						
ເມນລະດູ						
ຕະຫຼອດປີ						
ປາ ເຫດ						
ເມນລະດູ						
ຕະຫຼອດປີ						
ປາ ສະ ແລນສ						
ເມນລະດູ						
ຕະຫຼອດປີ						

--- SHOW PORTION MODEL and PICTURE CARD ---

A2. ຂໍ້ພະຈົ້າ ຈະຖາມທ່ານ ກຽ່ວກັບ ພາກສ່ວນ ຂອງປາດຽວ ໃນຫມໍ້ "ຄ 9" ທີ່ທ່ານກິນ - ກະລຸນາບອກ ຂໍ້ພະຈົ້າ ຈັກເປີເຊັນ ທີ່ທ່ານ ກິນ ປາ ຕາມ ສະ ນິດ ຕ່າງໆ ເຜື່ອ ທ່ານ ກິນ ດຽວ ໃນ ຫມໍ້ "ຄ 9". ຖ້າທ່ານ ອ່ານ ຫມົດ ທຸກ ສະ ນິດ ກ່ອນ.... ກະລຸນາ ຕອບ 0 - 100% - ຕອບ 1 ແລະ 2 ຫັ້ງ ຫມົດ ຕ້ອງ ຖ້າ ເກີ ນ 100%

A2.
1) ສັນ ປາ ທັ້ ນ ຫນັ ງ ຕິ ດ: ___%
2) ສັ ນ ປາ ທີ່ ບໍ່ ມີ ຫນັ ງ ຕິ ດ ___% **(1 & 2 total 100%)**
3) ຫອ ຍ, ກະ ເທ ກ ປາ, ຖ່ ຍ, ເຄ ື ່ ອ ງ ໃ ນ ປາ ___% **(0-100%)**

A3. ຂໍ້ ພ ະ ຈ ົ ້ າ ຈ ະ ຖ າ ມ ທ່ ານ ດ ວ ັ ບ ວ ິ ທ ີ ຕ ົ ດ ທ ີ ທ່ ານ ແ ຕ່ ງ ກ ິ ນ ປ າ ຢ ູ່ ຫ ມ ໍ ້ ຄ 9 ". ຖ ້ າ ທ ່ ານ ບ ອ ກ ຂ ໍ ້ ພ ະ ຈ ົ ້ າ ວ່ າ ປ າ 2 ສ ະ ນ ິ ດ ຕ່ າ ງ ໄ ປ, ຈ ັ ກ ເ ປ ີ ເ ຊ ັ ນ ທ ີ ທ ່ ານ ໄ ດ ້ ແ ຕ່ ງ ກ ິ ນ ຢ ູ່ ຫ ມ ໍ ້ ". ຖ ້ າ ທ ່ ານ ທ ຸ ກ ວ ິ ທ ີ ທ ັ ້ ງ ຫ ມ ົ ດ ແ ຕ່ ລ ະ ສ ະ ນ ິ ດ ກ ່ ອ ນ - ຕ ອ ບ ຕ ້ ອ ງ ຖ ້ າ ເ ກ ີ ນ 100%

---READ ALL CATEGORIES FIRST---Please answer 0-100%. **Answers 1 & 2 must total 100%.**

1) ປ້ ຳ ຜ ມ ທ າ ງ ກ ້ ຳ ຕ ັ ນ, ປ ້ ຳ ຜ ມ ທ າ ງ ເ ທ ິ ງ, ຈ ັ ບ, ຈ່ ຫ ຼ ື ນ ້ ຳ: ___%
2) ກ ະ ປ ໋ ຳ, ຈ ິ ນ, ດ ິ ບ, ຈ ັ ບ ຄ ວ ັ ນ ໄ ຟ, ຫ ຼ ື ແ ຂ ວ ນ ້ ຳ: ___% **(1 & 2 must total 100%)**

A4. ຖ ້ າ ທ ່ ານ ຕ ົ ນ, ປ ້ ຳ ຫ ຼ ື ຈ່ ຫ ຼ ື ນ ນ ້ ຳ ສ ະ ລ ະ ນ ້ ຳ ຢ ູ່ ຫ ມ ໍ ້ ຄ 9 " ແ ຈ້ ງ ຕ ົ ນ ນ ້ ຳ ຫ ຍ ່ ສ ຸ ດ ແ ບ ບ ໃ ດ ?

1) ທ ຸ ລ ະ ກ ະ ນ ້ ຳ ບ ອ ກ ___% 2) ຄ ຸ ້ ນ ນ ້ ຳ ຫ ມ າ ກ ສ ະ ຕ ິ ກ ___% 3) ຄ ື ນ ນ ້ ຳ ___%

A5.
ຕ າ ມ ສ ະ ນ ິ ດ ຕ່ າ ງ ໄ ປ, ຖ ້ າ ທ ່ ານ ບ ອ ກ ຂ ໍ ້ ພ ະ ຈ ົ ້ າ ແ ຕ່ ວ່ າ ຈ ັ ກ ເ ປ ີ ເ ຊ ັ ນ ຂ ອ ງ ປ າ ດ ຽ ວ ໃ ນ ຫ ມ ໍ ້ ". ທ ີ ທ ່ ານ ໄ ດ ້ ມ າ ຈ າ ກ ຕ ະ ຫ ລ າ ດ.....

---READ ALL CATEGORIES--- **Answers must total 100%.**

1) ຮ ານ ຂ າ ຍ ຂ ອ ງ ທ ່ ານ / ຄ ົ ນ ຂ າ ຍ ຕ າ ມ ທ າ ງ ___%
2) ນ ຳ ໄ ດ ້ ມ າ ຈ າ ກ ອ ່ າ ວ ທ ະ ລ ະ ລ (Puget Sound) ແ ລ ະ ຂ ອ ດ ອ ອ ກ ແ ລ ້ ນ ຂ ອ ງ ທ ່ ານ ເ ອ ງ, ຈ າ ກ ເ ມ ືອ ງ ຄ ວ ບ ຄ ວ ິ ຫ ຼ ື ເ ມ ື ອ ງ ___%
3) ນ ຳ ໄ ດ ້ ມ າ ຈ າ ກ ນ ອ ກ ອ ່ າ ວ ທ ະ ລ (Puget Sound) ແ ລ ະ ຂ ອ ດ ອ ອ ກ ແ ລ ້ ນ ຂ ອ ງ ທ ່ ານ ເ ອ ງ, ຈ າ ກ ເ ມ ືອ ງ ຄ ວ ບ ຄ ວ ິ ຫ ຼ ື ເ ມ ື ອ ງ ___%
4) ຮ ານ ອ າ ຫ ານ ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP B

B1. ທ່ານໄດ້ກິນເທົ່າໃດ ແລະ ທ່ານກິນຕາມລາຍການຕໍ່ໄປນີ້

ສະນິດຂອງປາ	ຈຳນວນກິນເທົ່າໃດ			ຈຳນວນເທົ່າໃດຕໍ່ປີ		PORTION SIZE CODE
	ອາທິດ	ເດືອນ	ປີ	ຈຳນວນອາທິດ	ຈຳນວນເດືອນ	
ປາຄາດ (ປາຂາວ)						
ຈຳນວນ						
ຕະລອດປີ						
ປາດອກຟີລີ						
ຈຳນວນ						
ຕະລອດປີ						
ປາສະຫວນຍະ						
ຈຳນວນ						
ຕະລອດປີ						
ປາສະຫີນຟີລີ						
ຈຳນວນ						
ຕະລອດປີ						
ປາແຫນກເຄີ້ຣານລີ						
ຈຳນວນ						
ຕະລອດປີ						
ປາຫູນາ						
ຈຳນວນ						
ຕະລອດປີ						

(continuation of B1)

GROUP B

ສະມັດຂອງປາ	ຈຳນວນກີນເທົ່າໃດຕໍ່			ຈຳນວນເທົ່າໃດຕໍ່ປີ		PORTION SIZE CODE
	ອາທິດ	ເດືອນ	ປີ	ຈຳນວນອາທິດ	ຈຳນວນເດືອນ	
ປາເຂດກະສິດ						
ເຫນືອ						
ຕະວັນອອກ						
ປາເຂດຊົນນະບົດ						
ເຫນືອ						
ຕະວັນອອກ						

B2.
ຂໍເວົ້າວ່າທ່ານ ຫຼາຍທ່ານ ຫຼ່ອ ກັບ ພາກສ່ວນ ຂອງປາເຫນືອ ແມ່ນ "ບໍ່" ທີ່ທ່ານກິນ ຫຼື ຮູ້ນາ ບອກ ຂໍພະເຈົ້າ, ຈົ່ງເປີເຊັນ ທີ່ທ່ານກິນ ປາ ຕາມ ສະມັດ ຕໍ່ ລົງໄປ ເມື່ອ ທ່ານ ກິນ ເຫນືອ "ບໍ່". ໃຫ້ທ່ານ ອ່ານ ໝົດ ທຸກ ສະມັດ ທ່ານ. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) ສັນປາ ທີ່ນ້ຳ ຫນັ້ງ ຕາ: ___%
2) ສັນ ປາ ທີ່ ບ່ໍ ນ້ຳ ຫນັ້ ງ ຕາ ___% **(1 & 2 must total 100%)**
3) ຫອຍ ປາ, ກະ ຄຸ ກ ປາ, ງົ່ ວ ປາ, ເຄື່ ອ ງ ໃນ ປາ ___% **(0-100%)**

B3.
ຂໍພະເຈົ້າ ວ່າ ທ່ານ ດອ ຍ ວິ ທີ ໃດ ທີ່ ທ່ານ ແຕ່ ງ ກິ ນ ປາ ເຫນືອ ແມ່ນ "ບໍ່" ໃຫ້ ທ່ານ ບອ ກ ຂໍ ພ ະ ເ ຈ ົ ້ າ ວ່ າ ປ າ 2 ສ ະ ມ ັ ດ ຕ ໍ ່ ລ ົ ງ ໄ ປ , ຈ ົ ່ ວ ເ ປ ີ ເ ຊ ັ ນ ທ ີ ່ ທ ່ ານ ໄ ດ ້ ແ ຕ ່ ງ ກ ິ ນ ເ ຫ ນ ື ອ "ບ ໍ ່ ". ໃ ຫ ້ ທ ່ ານ ທ ຸ ກ ວ ິ ທ ີ ທ ີ ່ ທ ່ ານ ນ ຳ ໃ ຊ ້ (ສ ະ ມ ັ ດ) ທ ່ ານ ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.**

1) ປີ້ ງ ໄ ຟ ທ່ ານ ທ ານ (ຫ ນ ້) , ປ ີ ້ ງ ໄ ຟ ທ ່ ານ (ເ ຫ ນ ື) , ອ ບ , ອ ຸ (ຫ ຼ ື) ___%
2) ກ ະ ປ ໍ ້ (( ) , ( ) , ( ) , ( ) ( ) ( ) ___%

B4. ທ່ານ ຕົ້ນ ຫຼື ນ້ຳ ອາ ຫານ ທະ ລະ ຊູ ດ ຈົ ມ ຫມ ອ ກ "ນ ້ ". ເ ຈ້ ຕ ຊ ນ ນ ້ ໄ ສ່ ກ ະ ຍ ດ ດ ?

1) ກ ອ ກ ນ ້ ອ ອ ກ ___ % 2) ດ ຊ ນ ້ ດ ຈ ນ ທ ານ ຄ ດ ກ ນ ___ % 3) ຄ ນ ນ ້ ___ %

B5. ທ ານ ສ ະ ນ ດ ຕ່ ລ ດ ໄ ປ ດ ຫ ້ ທ ່ ນ ບ ອ ກ ຂ ້ ພ ະ ເ ຈ້ ກ ະ ລ ຸ ນ າ ວ່ າ ຈ ້ ກ ເ ປ ີ ເ ຊ ນ ຂ ອ ງ ປ າ ດ ຈ ນ ຫ ມ ອ ກ "ນ ". ທ ີ ທ ່ ນ ໄ ດ ້ ນ າ ຈ າ ກ ໄ ສ.....
_____: ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) ຊ ານ ້ ຂ າ ຍ ອ າ ຫ ານ / ຄ ນ ຂ າ ຍ ຕ ານ ທ ານ ___ %
2) ປ ານ ໄ ດ ້ ນ າ ຈ າ ກ ອ ່ າ ວ ທ ະ ລ ະ (Puget Sound) ແ ລ ະ ຊ ອ ງ ອ ນ ນ ະ ນ ນ ດ ວ ັ ທ ່ ນ ເ ອ ງ, ຈ າ ກ ຄ ນ ຈ ດ ຫ ມ ຄ ວ ນ ຄ ວ ຫ ຼ ື ເ ນ ີ ນ ___ %
3) ປ ານ ໄ ດ ້ ນ າ ຈ າ ກ ມ ອ ກ ອ ່ າ ວ ທ ະ ລ ະ (Puget Sound) ແ ລ ະ ຊ ອ ງ ອ ນ ນ ະ ນ ນ ດ ວ ັ ທ ່ ນ ເ ອ ງ, ຈ າ ກ ຄ ນ ຈ ດ ຫ ມ ຄ ວ ນ ຄ ວ ຫ ຼ ື ເ ນ ີ ນ ___ %
4) ຊ ານ ້ ອ າ ຫ ານ ___ %

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP C

C1. ປ ີ ຈ ່ ານ ກ ະ ທ ່ ອ ຍ ປ ີ ທ ່ ານ ກ ິ ນ ຕ ານ ລ າ ຍ ການ ຕ ່ ໄ ປ ນ ີ ້

ສ ະ ນ ດ ຂ ອ ງ ປ າ	ຈ ຳ ນ ວ ນ ກ ິ ນ ເ ທ ່ າ ດ ດ ຕ ່			ຈ ຳ ນ ວ ນ ເ ທ ່ າ ດ ດ ຕ ່ ປ ີ		PORTION SIZE CODE
	ອ າ ທ ິ ດ	ເ ຄ ື ອ ນ	ປ ີ	ຈ ຳ ນ ວ ນ ອ າ ທ ິ ດ	ຈ ຳ ນ ວ ນ ເ ຄ ື ອ ນ	
ປ າ ແ ຊ ຄ ຟ ິ ກ ສ ໍ						
ຕ ມ ລ ະ ດ ູ						
ຕ ະ ລ ອ ດ ປ ີ						
ປ າ ກ ະ ລ ຍ ປ ີ						
ຕ ມ ລ ະ ດ ູ						
ຕ ະ ລ ອ ດ ປ ີ						
ປ າ ຄ າ ບ ພ ໍ						
ຕ ມ ລ ະ ດ ູ						
ຕ ະ ລ ອ ດ ປ ີ						

(continuation of C1)

GROUP C

ສະນິດ ຂອງ ຢາ	ຈຳນວນ ກິນ ເທົ່າ ໃດ ຕໍ່			ຈຳນວນ ເທົ່າ ໃດ ຕໍ່ ປີ		PORTION SIZE CODE
	ມື້ ນີ້	ເດືອນ	ປີ	ຈຳນວນ ມື້ ນີ້	ຈຳນວນ ເດືອນ	
ຢາ ເນີ້ດສ໌						
ຕົນລະ ຄູ						
ຕະລອດ ປີ						
ຢາ ທີ່ລະ ເນີ້ນ						
ຕົນ ລະ ຄູ						
ຕະ ລອດ ປີ						
ຢາ ເຍ ດສ໌						
ຕົນ ລະ ຄູ						
ຕະ ລອດ ປີ						

C2. ຂ້າພະເຈົ້າ ຈະ ຖາມ ທ່ານ ກ່ຽວ ກັບ ຢາ ທີ່ ສ່ວນ ຂອງ ຢາ ຕົນ ທັງ ໝົດ "ຊຸ" ທີ່ ທ່ານ ກິນ. ກະ ລຸນາ ບອກ ຂ້າພະເຈົ້າ, ຈັກ ເປີ ເຊັ່ນ ທີ່ ທ່ານ ກິນ ຢາ ຕາມ ສະ ນິດ ຕ່າງ ໆ ທີ່ ທ່ານ ກິນ ທັງ ໝົດ "ຊຸ". ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) ສັ່ນ ຢາ ທີ່ ມີ ເນ້ ນ ໝັ ກ ດ: ___%
2) ສັ່ນ ຢາ ທີ່ ບໍ່ ມີ ເນ້ ນ ໝັ ກ ດ: ___% **(1 & 2 must total 100%)**
3) ຫລິ ຢາ, ກະ ຄູ ກ ຢາ, ຈ ຂ ຢາ, ເຄື່ ອ ງ ດື ມ ຢາ: ___% **(0-100%)**

C3. ຂ້າພະເຈົ້າ ຈະ ຖາມ ທ່ານ ດ້ ວ ຍ ວິ ທີ ຕ່ າ ງ ທີ່ ທ່ານ ເຮ ັ ດ ກ ານ ກິ ນ ຢ າ ຂ ອ ງ ທ່ ານ ທ ັ ງ ໝ ົ ດ "ຊ ຸ" ທ ີ່ ທ ່ ານ ກ ິ ນ ບ ອ ກ ຂ ້ າ ພ ະ ເ ຈ ົ ້ າ ວ່ າ ປ 2 ສ ະ ນ ິ ດ ຕ ່ າ ງ ໆ ຈ ັ ກ ເ ປ ີ ເ ຊ ັ ນ ທ ີ່ ທ ່ ານ ກ ິ ນ ຢ າ ຕ າ ມ ສ ະ ນ ິ ດ ຕ ່ າ ງ ໆ ທ ັ ງ ໝ ົ ດ "ຊ ຸ" ໃ ຫ ້ ທ ່ ານ ທ ່ ານ ບ ີ ທ ີ ທ ຸ ກ ໝ ົ ດ ເ ຮ ັ ດ ແ ຕ່ ລ ະ ສ ະ ນ ິ ດ ຫ ລ ັ ງ ກ ັ ນ. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.**

1) ປ້ ຳ ໄ ຟ ທ າ ງ ກ ້ ຳ, ຕ ັ ນ, ປ້ ຳ ໄ ຟ ທ າ ງ ເ ຮ ກ ້ ຳ, ວ ບ ັ, ວ ຫ ຼ ື ມ ີ ນ ້ ຳ ___%
2) ກ ະ ຢ ້ ຳ, ຈ ິ ມ, ຕ ີ ບ, ວ ບ ຄ ວ ນ ໄ ຟ, ຫ ຼ ື ເ ຍ ທ ້ ___%

C4. ທ່ານ ຕົ້ນ ທີ່ມີ້ ອາຫານ ຫະລະ ສູ່ຄົນ ຫລວດ "ຊີ" ເຈົ້າ ຫຼຸ້ນ ນຳ ໄປ ສ່ ເຍ ຍ ໄດ ?

1) ທຸກ ມ ນ້ ຈ ທ ___ % 2) ຄ ຈ ນ ້ ຄ ນ ທ ນ ຄ ດ ນ ___ % 3) ຄ ນ ນ ___ %

C5. ຕ ນ ສ ະ ລ ດ ຕ ່ ລ ຸ ໄ ປ ຄ ຫ ທ ່ ນ ຍ ທ ຂ ນ ະ ເ ຈ ້ ເ ຄ ່ ວ ່ ຈ ກ ເ ປ ້ ຄ ຊ ນ ຂ ປ ຄ ຄ ນ ຫ ລ ວ ດ "ຊ" ທ ທ ່ ນ ບ ດ ນ ຈ ກ ສ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) ຮ ນ ຂ ຍ ອ ຫ ນ / ຄ ນ ຂ ຍ ຕ ນ ທ ___ %
2) ປ ໄ ດ ນ ຈ ກ ທ ອ ຫ ະ ລ (Puget Sound) ເ ລ ະ ເ ຂ ດ ອ ນ ເ ນ ນ ຕ ວ ທ ່ ນ ອ ງ ຈ ກ ຄ ນ ຄ ນ ຄ ອ ຫ ຼ ເ ນ ນ ___ %
3) ປ ໄ ດ ນ ຈ ກ ທ ນ ອ ຫ ອ ຫ ະ ລ (Puget Sound) ເ ລ ະ ເ ຂ ດ ອ ນ ເ ນ ນ ດ ວ ທ ່ ນ ເ ອ ງ ຈ ກ ຄ ນ ຄ ນ ຄ ອ ຫ ຼ ເ ນ ນ ___ %
4) ຮ ນ ອ ຫ ນ ___ %

--- SHOW PORTION MODEL, PICTURE CARD ---

Group D

D1. ປ ຈ ກ ເ ທ ່ ທ ທ ່ ນ ກ ນ ຕ ນ ລ ຍ ຕ ນ ຕ ່ ລ ຸ ໄ ປ ນ ້ ...

ສ ະ ລ ດ ຂ ອ ງ ປ າ	ຈ ຳ ນ ວ ນ ກ ນ ເ ທ ່ າ ດ ດ ຕ ່			ຈ ຳ ນ ວ ນ ເ ທ ່ າ ດ ດ ຕ ່ ປ ີ		PORTION SIZE CODE
	ອ າ ທ ິ ດ	ເ ດ ີ ນ	ປ ີ	ຈ ຳ ນ ວ ນ ອ າ ທ ິ ດ	ຈ ຳ ນ ວ ນ ເ ດ ີ ນ	
ປ ານ ຣ າ ລ ີ ນ ຸ ດ						
ຄ ນ ລ ະ ຄ ຼ						
ຕ ະ ລ ອ ດ ປ ີ						
ປ ານ ີ ຊ ສ ີ / ເ ຜ ລ ີ ເ ດ ີ						
ຄ ນ ລ ະ ຄ ຼ						
ຕ ະ ລ ອ ດ ປ ີ						
ປ ານ ະ ເ ທ ີ ເ ສ ັ ນ						
ຄ ນ ລ ະ ຄ ຼ						
ຕ ະ ລ ອ ດ ປ ີ						

(continuation of D1)

GROUP D

ສະມັດຂອງຢາ	ຈຳນວນກິນເທົ່າໃດຕໍ່			ຈຳນວນເທົ່າໃດຕໍ່ປີ		PORTION SIZE CODE
	ອາທິດ	ເດືອນ	ປີ	ຈຳນວນອາທິດ	ຈຳນວນເດືອນ	
ຢາສັກເກີ						
ຢາມລະລູ						
ຫະລອດ						

D2. ຂໍນະເຈົ້າ ຈະຖາມທ່ານກ່ຽວກັບພາກສ່ວນ ຂອງຢາໃນຫມວດ "ດ" ທີ່ທ່ານກິນ, ກະລຸນາບອກຂໍນະເຈົ້າ, ຈັກເປີເຊັນທີ່ທ່ານກິນຢາຕາມສະມັດ ຕໍ່ລົງໄປ ເມື່ອ ທ່ານກິນໃນຫມວດ "ດ" ໃຫ້ທ່ານອ່ານ ໝົດທຸກສະມັດ ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) ສັນຢາ ທີ່ມີ ໜ້ານ້ຳ ____ : ___%
2) ສັນຢາ ທີ່ບໍ່ມີ ໜ້ານ້ຳ : ___% **(1 & 2 must total 100%)**
3) ຫລົ່ນ, ກະດູກ, ຢາ, ເຄື່ອງ ໃນ ___% **(0-100%)**

D3. ຂໍນະເຈົ້າ ຈະຖາມ ທ່ານ ຄວນ ວິທີ ທີ່ ທ່ານ ແຕ່ງ ກິນ ຢາ ໃນ ຫມວດ "ດ" ໃຫ້ ທ່ານ ບອກ ຂໍນະ ເຈົ້າ ວ່າ ຢາ 2 ສະ ມັດ ຕໍ່ ລົງ ໄປ, ຈັກ ເປີ ເຊັນ ທີ່ ທ່ານ ໄດ້ ແຕ່ງ ກິນ ຢູ່ ໃນ ຫມວດ "ດ" ໃຫ້ ທ່ານ ທຸກ ວິ ທີ ທັ້ງ ໝົດ. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.** ແຕ່ ລະ ສະ ມັດ ກ່ຽ ວ

1) ປີ້ງ ໄຟ ທາງ ຫວ່າ, ຫວ້, ປີ້ງ ໄຟ ທາງ ເທິ ງ, ອົບ, ຈູ ຫຼື ນ້ຳ ___%
2) ກະ ທ ງ, ຈຶ ນ, ຄົ ບ, ອົ ບ ຄວ ນ ໄຟ, ຫຼື ແ ຫ ້ ___%

D4.
ຖ້ າ ທ່ ນ ຫ ວ ້ ຫ ຼ ື ນ ້ ຳ ອ າ ຫ ານ ຫ ະ ລ ວ ຢ ູ ່ ໃ ນ ຫ ມ ວ ດ "ດ" ເ ຈ ົ ້ າ ຕ ້ ອ ງ ນ ຳ ຈ ັ ດ ແ ບ ບ ໃ ດ ? ___

1) ຖ ອ ກ ນ ຳ ້ ອ ອ ກ ___% 2) ຖ ິ ້ ມ ນ ຳ ້ ຄ ວ ນ ການ ຄ ວ ິ ດ ___% 3) ຄ ີ ນ ນ ຳ ___%

D5. ທານສະມັດຕໍ່ລົງໄປ ເຫັນທ່ານຍອກ ຂ້ານະຈົ່ງກ່ຽວ ກ່ຽວກັບເປີເຊັນ ຂອງປາຢູ່ຫຼົມ ຫມວດ "ດີ ຫຼາ": ---READ ALL CATEGORIES---
Answers must total 100%. ທ່ານໄດ້ມາຈາກໃສ

1) ຮ້ານ ຂາຍອາຫານ/ຄົວ ຂາຍຕາມ ທາງ ___%
2) ປາໄດ້ມາ ຈາກ ອ່າວ ທະ ລະ (Puget Sound) ແລະ ແຂ ງ ອ້ນ ແ ອ້ນ ດ້ວ ທ່ານ ເ ງ ,ຈ ກ ຄ ມ ຄ ຄ ຫ ເ ນ ___%
3) ປາໄດ້ ມ ຈ ທ ອ່ ທ ລ (Puget Sound) ແ ະ ແ ຂ ອ ນ ແ ນ ດ ທ່ ເ ,ຈ ກ ຄ ມ ຄ ຄ ຫ ເ ນ ___%
4) ຮ້ານ ອ ຫ ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP E
E1. ປີ ຈ ກ ເ ອ ຫ ທ່ ທ ທ ຕ ມ ລ ຕ ລ ໄ ມ ___

ສະ ມ ດ ຂ ງ ຫ ອ	ຈ ຳ ນ ວ ນ ທ ນ ເ ກ ດ ຕ			ຈ ຳ ນ ວ ນ ເ ກ ດ ຕ ປ		PORTION SIZE CODE
	ມ ຫ ດ	ຄ ດ ມ	ປ	ຈ ຳ ນ ວ ນ ອ ຫ ດ	ຈ ຳ ນ ວ ນ ຄ ດ ມ	
ຫ ອ ທ ຄ ມ ນ (ມ ມ ລ)						
ດ ມ ລ ຊ						
ຕ ລ ອ ດ ປ						
ຫ ອ ທ ນ ຄ (ນ ກ ນ ເ ຄ ມ)						
ດ ມ ລ ຊ						
ຕ ລ ອ ດ ປ						
ຫ ອ ທ ປ ດ ແ (ຫ ອ ທ ເ)						
ດ ມ ລ ຊ						
ຕ ລ ອ ດ ປ						
ຫ ອ ທ ບ ກ ຄ ມ						
ດ ມ ລ ຊ						
ຕ ລ ອ ດ ປ						

(continuation of E1)

Group E

ສະນິດ ຂອງ ຫວຍ	ຈຳນວນ ກີບ ເທົ່າໃດ ຕໍ່			ຈຳນວນ ເທົ່າໃດ ຕໍ່ ປີ		PORTION SIZE CODE
	ອາທິດ	ເດືອນ	ປີ	ຈຳນວນ ອາທິດ	ຈຳນວນ ເດືອນ	
ຫວຍງວດ (ສົ່ງຕ່າງປະເທດ)						
ເມນະຄູ						
ຕະລອດ ປີ						
ຫວຍກ້ຽມ ກ້ານ						
ເມນະຄູ						
ຕະລອດ ປີ						
ຫວຍ ແຄງ (ຫວຍ ຄ້ວ ກ ແລ້)						
ເມນະຄູ						
ຕະລອດ ປີ						
ຫວຍ ນາ ງ ລົ ນ (ຫວຍ ອ ອ ນ ສ ຕ)						
ເມນະຄູ						
ຕະ ລອ ດ ປີ						
ຫວຍ ກ ຕ ຄ ຣ (ຫວຍ ນ ຕ ສ ກ ຣ ວ ລ)						
ເມ ນ ລ ະ ຄ ູ						
ຕ ະ ລ ອ ດ ປ ີ						
ຫ ວ ຍ ປ ງ ້ (ຫ ວ ຍ ອ າ ບ າ ຣ ລ ນ)						
ເ ມ ນ ລ ະ ຄ ູ						
ຕ ະ ລ ອ ດ ປ ີ						
ຫ ວ ຍ ແ ຄ ງ ຄ ີ ຢ ່ ານ (ຫ ວ ຍ ສ ະ ກ າ ລ ັ ບ)						
ເ ມ ນ ລ ະ ຄ ູ						
ຕ ະ ລ ອ ດ ປ ີ						

--- SHOW PORTION MODEL, PICTURE CARD ---

E2. ນັບຈັກເທື່ອທີ່ທ່ານກິນຕາມລາຍການຕໍ່ໄປນີ້...

ຊະນິດຂອງອາຫານ ທີ່ຢາ	ຈຳນວນກິນເທື່ອດຽວ			ຈຳນວນເທື່ອດຽວ		PORTION SIZE CODE
	ອາທິດ	ເດືອນ	ປີ	ຈຳນວນອາທິດ	ຈຳນວນເດືອນ	
ກຸ້ງ (ກຸ້ງສົດນ້ຳ)						
ຄົນລະ ຄູ						
ຕະລອດປີ						
ກະປູ (ແຄນນ້ຳ)						
ຄົນລະ ຄູ						
ຕະລອດປີ						
ຢາສູບ (ມວນ)						
ຄົນລະ ຄູ						
ຕະລອດປີ						
ຫຼີ້ເຮືອນ ທານ						
ຄົນລະ ຄູ						
ຕະລອດປີ						
ຫຼີ້ກ້ອງ ຄານ ເປີ ທານ						
ຄົນລະ ຄູ						
ຕະລອດປີ						
ທານເບຍ (ຫຼຸ່ນສະເນນ)						
ຄົນລະ ຄູ						
ຕະລອດປີ						
ກຸ້ງ ຕົ້ມ (ລ້ວນສະ ຕີ)						
ຄົນລະ ຄູ						
ຕະລອດປີ						

--- SHOW PORTION MODEL and PICTURE CARD ---

E3. ຂ້າພະເຈົ້າຈະຖາມທ່ານກ່ຽວກັບພາກສ່ວນໃດທີ່ທ່ານກິນຕໍ່ລົງນີ້ Percentages for each species must total 100%.

ເປັນຊະນິດ	ທັງໝົດຕົວ	ແກະອອກເປືອກທັງຕົວ ກັບກະເພາະ	ແກະອອກເປືອກທັງຕົວ ກັບກາວນັ້ນຊີ້ນຕີນກາຍ	ແກະອອກເປືອກທັງຕົວ ກັບກາວນັ້ນຊີ້ນຕີນກາຍ ແລະກະເພາະ	TOTAL 100%
ຫອຍກີ້ຄີມອຍ (ແຄລຍ) (ພະສີລາ)					TOTAL 100%
ຫອຍກີ້ມ້າ (ຂອດສແຄລຍ)					TOTAL 100%
ຫອຍກີ້ປາກເຕີລນ ແຄລຍ					TOTAL 100%
ຫອຍກີ້ມີກແກ (ຫອຍກີ້ເຣເຊ)					TOTAL 100%
ຫອຍງວງຊ້າງ ແຄລຍ (ຫອຍຈີ່ໂອດາກາຄ)					TOTAL 100%
ຫອຍກີ້ແມກໂຄຍາ ແຄລຍ					TOTAL 100%
ຫອຍແຄງ (ຫອຍຄອກຄະເສີ້)					TOTAL 100%
ຫອຍນາງລົມ (ຫອຍອອຍສະເຕີ້)					TOTAL 100%
ຫອຍກີ້ດຳ (ຫອຍມັດໂຊລ)					TOTAL 100%
ຫອຍປ່າ (ຫອຍອາບາໂລນ)					TOTAL 100%
ຫອຍແຄງໃຫ່ຍ (ຫອຍສະກາລົບ)					TOTAL 100%

(continuation of E3)

Group E

ກຸ້ງ (ກຸ້ງສະຣີ)	ໝົດທັງຕົວ ກຸ້ງ (ຕົວ ແລະ ຫົວ) %	ຕົວ ເທົ່າ ນໍ້	ຫົວ ເທົ່າ ນໍ້ %	TOTAL 100%
ກະປູ (ແຄນ)	ໝົດທັງຕົວ ກະປູ (ຊີ້ນ ກະປູ ແລະ ນ້ຳມັນ) %	ຊີ້ນ ເທົ່າ ນໍ້ %	ນ້ຳມັນ ກະປູ ເທົ່າ ນໍ້ %	TOTAL 100%
ປາ ນ້ຳ ກ ນ ຈັບ (ສົ້ມ ຕ່ຳ)	ໝົດ ທັງ ຕົວ ປາ ນ້ຳ ___%	ຊີ້ນ ເທົ່າ ນໍ້ (ຫົວ ແລະ ຫາງ) ___%	----------	TOTAL 100%
ຊີ້ ເຮ ຊີ້ ນ ຫ ວ ຍ	ໝົດ ທັງ ຕົວ ຊີ້ ເຮ ຊີ້ ນ %	ຕ່ຽ ເທົ່າ ນໍ້ %	----------	TOTAL 100%
ຊີ້ ຄ ວ ຄ ານ ເປ ຫ ວ ຍ	ໝົດ ທັງ ຕົວ ຄ ວ ຄ ານ ເປ %	ກ ອ ນ ຊີ້ ນ ເທົ່า ນໍ້ %	----------	TOTAL 100%
ຫ ວ ຍ ໄ ຄ້ (ຫ ຼ ບ ສະ ເ ມ ນ)	ໝົດ ທັງ ຕົວ ຫ ວ ຍ ໄ ຄ້ %	ກ ອ ນ ຊີ້ ນ ເ ທ ົ່ ນ ໍ້ %	----------	TOTAL 100%
ກ ຸ້ ງ ຕ ົ ນ (ລ ວ ຍ ສ ະ ຕ ິ)	ໝ ົ ດ ທ ັ ງ ຕ ົ ວ ກ ຸ ້ ງ ຕ ົ ນ (ຕ ົ ວ ແ ລ ະ ຫ ົ ວ) %	ຕ ົ ວ ເ ທ ົ່ า ນ ໍ ້ %	ຫ ົ ວ ເ ທ ົ່ า ນ ໍ ້ %	TOTAL 100%

E4. ຂ້ານະ ເຈົ້ າ ຈະ ຖ າ ມ ທ່ າ ນ ດ ວ ັ ນ ອ ີ ທ ີ ຕ ິ ດ ທ ີ ທ່ າ ນ ແ ຕ່ ງ ງ ານ ຫ ວ ຍ ຢ ູ່ ຕ ະ ຫ ລ ອ ດ ມ ື ້ ນ ຈ ນ ເ ຖ ິ ງ ມ ື ້ ນ ີ້ ບ ໍ ່ ? ຂ ້ ານ ະ ເ ຈ ົ ້ า ຈ ະ ນ ັ ບ ເ ວ ລ າ ຂ ້ ານ ະ ເ ຈ ົ ້ า ວ ່ า 2 ສ ະ ບ ັ ດ ຕ ໍ ່ ມ ື ້ ໄ ປ ,ຈ ົ ນ ເ ຖ ິ ງ ມ ື ້ ນ ີ້ ທ ່ າ ນ ໄ ດ ້ ແ ຕ່ ງ ງ ານ ຢ ູ່ ຕ ະ ຫ ລ ອ ດ ມ ື ້ ນ ຈ ນ ເ ຖ ິ ງ ມ ື ້ ນ ີ້ ບ ໍ ? ຂ ້ ານ ະ ເ ຈ ົ ້ า ອ ່ า ນ ຫ ຼ າ ຍ ວ ິ ທ ີ ທ ັ ້ ງ ໝ ົ ດ ແ ຕ່ ລ ະ ສ ະ ບ ັ ດ ຫ ວ ່ ນ . ---READ ALL METHODS FOR EACH CATEGORY FIRST-- **Answers must total 100%.**

1) ປ້ ຳ ໄ ຟ ທ າ ງ ກ ອ ງ ,ຫ ຼ ັ ນ ,ປ ້ ຳ ໄ ຟ ທ າ ງ ເ ທ ິ ງ ,ອ ິ ນ ,ອ ື ່ ນ ໆ ຫ ຼ ີ ກ ນ ້ ຳ ___%
2) ກ ະ ປ ອ ງ ,ຈ ານ ,ຄ ີ ບ ,ອ ັ ນ ຄ ົ ວ ນ ້ ຳ ໄ ຟ , ຫ ຼ ີ ກ ເ ວ ທ ີ ___%

E5. ຖ້າທ່ານຕັ້ງໃຈຊື້ຫາປາສະດຶກໄດສະດຶກນ້ຳຊຸ່ມນອກ"ອີ" ເຈົ້າຄິດວ່າທ່ານຈະຊື້ _____?

1) ຖອກນ້ຳອອກ ___ ___ ___% 2) ຕຸ້ມນ້ຳຄືນສູ່ທະເລ ___ ___ ___% 3) ຄືນນ້ຳ ___ ___ ___%

E6. ຕາມສະດຶກຕ່າງໆ ໃຫ້ທ່ານບອກວ່າພວກເຂົາເຈົ້າແຕ່ລະຄົນ ຈັບປາເປັນເຊັ່ນໃດ ຫາປາຊຸ່ມນອກ"ອີ" ທີ່ທ່ານໄດ້ມາຈາກໃສ ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) ຮ້ານຂາຍອາຫານ/ຄົນ ຂາຍຕາມທາງ ___ ___ ___%
2) ຫາປາໄດ້ມາຈາກອ່າວທະເລ (Puget Sound) ແລະ ຂອງແຂວງ ດ້ວຍທ່ານເອງ, ຈາກຄົນອື່ນ ຄວບຄວ້ຍ ຫຼື ເຜີ້ນ ___ ___ ___%
3) ຫາປາໄດ້ມາຈາກນອກ ອ່າວທະເລ (Puget Sound) ແລະ ຂອງແຂວງ ດ້ວຍທ່ານເອງ, ຈາກ ຄົນອື່ນ ຄວບ ຄວ້ຍ ຫຼື ເຜີ້ນ ___ ___ ___%
4) ຮ້ານອາຫານ ___ ___ ___%

--- SHOW PORTION MODEL and PICTURE CARD ---

GROUP F

F1. ມື້ວານນີ້ ທ່ານກິນ ຕາມລາຍການຕໍ່ໄປນີ້...

ສະດຶດ ຂອງ ອາຫານທະເລ	ຈຳນວນ ກິນ ເທົ່າໃດ ຕໍ່			ຈຳ ນວນ ເທົ່າໃດ ຕໍ່ ປີ		PORTION SIZE CODE
	ມື້	ເດືອນ	ປີ	ຈຳນວນ ມື້	ຈຳນວນ ເດືອນ	
ຫອຍນ້ຳທະເລ						
ຫມາກກະ						
ຕະລອກ ປີ						
ເຂດ ຫມາ ລ						
ຫມາກ ກະ						
ຕະ ລອ ດ ປີ						

F2. ຕາມສະມິດຕໍ່ສົງໄປ ເຫັນທ່ານບອກວ່າພະວັກແດ່ ວ່າຈັກເປີເຊັນຂອງອາຫານທະເລ ທີ່ເປັນ ຫມວດ "ແຊບ" ທີ່ທ່ານໄດ້ມາຈາກ ໄສ... ເຫັນທ່ານ ຫມົດທຸກ ສະມິດ ທັງ ຫມົດ ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) ຮ້ານ ຂາຍອາຫານ/ຄົນ ຂາຍຕາມທາງ ___%
2) ອາຫານທະເລ ໄດ້ມາຈາກ ອ່າວທະເລ (Puget Sound) ແລະ ແຂວງ ແລ້ວ ດວ້ຍ ທ່ານ ເອງ, ຈາກ ຄົນ ທີ່ ຄວບ ຄຸ ມ ເຮືອ ___%
3) ອາຫານທະເລ ໄດ້ມາ ຈາ ກ ອ່ າ ວ ທ ະ ເ ລ (Puget Sound) ແ ລ ະ ແ ຂ ວ ງ ອ ື ນ ດ ວ ຍ ທ ່ ານ ເ ອ ງ , ຈ າ ກ ຄ ົ ນ ທ ີ ່ ຄ ວ ບ ຄ ຸ ມ ເ ຮ ື ອ ___%
4) ຮ້ານ ອາ ຫານ ___%

ນ້ ອ ງ ອ າ ຫ ານ ທ ະ ເ ລ ນ ີ້ ທ ີ ່ ທ ່ ານ ກ ິ ນ ນ ີ້ ໄ ດ ້ ມ າ ຈ າ ກ ບ ່ ອ ນ ຫ ຍ ັ ງ ຕ ັ ນ ? ☐ 1 ແມ່ນ ☐ 2 ບ່ ແ ມ ່ ນ (If no, go to H1)

G1. ນ້ ອ ງ ຈ ັ ກ ເ ທ ົ ່ າ ທ ີ ທ ່ ານ ກ ິ ນ ...

ສະ ມ ິ ດ ຂ ອ ງ ອ າ ຫ ານ ທ ະ ເ ລ	ຈ ຳ ນ ວ ນ ກ ິ ນ ເ ທ ົ ່ າ ດ ຽ ວ			ຈ ຳ ນ ວ ນ ເ ທ ົ ່ າ ດ ຽ ວ ປ ີ		PORTION MODEL CODE
	ອ າ ທ ິ ດ	ເ ດ ືອ ນ	ປ ີ	ຈ ຳ ນ ວ ນ ອ າ ທ ິ ດ	ຈ ຳ ນ ວ ນ ເ ດ ືອ ນ	

---SOCIAL EVENTS ---

H1. ຄ ຳ ຖ າ ມ ຕ ໍ ່ ສ ົ ງ ໄ ປ ຈ ະ ໄ ດ ້ ຖ າ ມ ທ ່ ານ ກ ່ ຽ ວ ກ ັ ບ ການ ກິ ນ ຂ ອ ງ ທ ່ ານ ໃ ນ ງ ານ ສ ັ ງ ຄ ົ ມ . ໃ ນ 12 ເ ດ ືອ ນ ສ ຸ ດ ທ ້ າ ຍ , ນ້ ອ ງ ຈ ັ ກ ເ ທ ົ ່ າ ທ ີ ທ ່ ານ ໄ ດ ້ ເ ຂ ົ້ າ ຮ ່ ວ ມ (ເ ປ ນ ຈ ັ ນ ສ ະ ຫ ນ ອ ງ ງ ານ , ປ ີ ໃ ຫ ມ ່ ຈ ີ ນ , ປ ີ ໃ ຫ ມ ່ ຍ ີ ປ ຸ ່ ນ , ງ ານ ສ ະ ຫ ນ ອ ງ ຈ ຸ ນ ນ ຸ ນ ຈ ຸ ນ ຫ ຼ ື ອ ກ ິ ດ ະ ນ ະ ທ ຳ , ງ ານ ເ ຕ ່ ງ ງ ານ ແ ລ ະ ອ ື ນ ໆ ___ ___ ___ ___ ຈ ວ ນ ໃ ນ 12 ເ ດ ືອ ນ ສ ຸ ດ ທ ້ າ ຍ (If 0, go to no. I 1)

H2. ຈ ັ ກ ເ ປ ີ ເ ຊ ັ ນ ທ ີ ທ ່ ານ ກ ິ ນ ອ າ ຫ ານ ທ ະ ເ ລ ໃ ນ ງ ານ ສ ັ ງ ຄ ົ ມ ເ ຫ ຼ ົ່ ານ ນ ີ້ ? Please answer from 0-100% ___% (If answer is 0, go to I 1)

---SHOW PORTION MODEL and PICTURE CARD ---

H3. ທ່ານສັ່ງສັ້ນຕ່າງໆ ຕາມປະເພດ ທ່ານກິນອາຫານຫະລວ ຫຼາຍເທົ່າໃດແຕ່ລະເທື່ອ? ___ ___ ___oz.(PORTION MODEL CODE: ___)

H4. ນັບຈາກເທື່ອ ທີ່ທ່ານກິນອາຫານຫະລວ ຄັ້ງຕໍ່ລົງໄປນີ້ ທ່ານສັ່ງສັ້ນຕ່າງໆ _____? You may answer from 0-100%.

ຫວຍ (ກະຢູ, ຫວຍກ້ຳ, ກຸ້ງ) ___ ___ ___% ຫມາກຫະລວ/ແກລນ້ຳ ___ ___ ___% ຢາ ___ ___ ___%

I1. ກະຣຸນາ ບອກ ອາຍຸ ຂອງ ທ່ານ ___ ___ ___. ຖ້າທ່ານບໍ່ບອກ; ກະຣຸນາ ເລືອກ ອາຍຸ ຂອງ ທ່ານ ຕາມ ຂັ້ນ

18-29 ☐1 30-54 ☐2 55 + ☐3

I2. ບອກ ເຖິງ ນ້ຳ ຫນັກ ຂອງ ທ່ານ ___ ___ ___ lbs. OR ___ ___ ___ kg.

I3. ບອກ ເຖິງ ຄວາມ ສູງ ຂອງ ທ່ານ ___ feet ___ inches OR ___ ___ ___cm.

I4. ລາຍຈ່າຍ ເດືອນ ຄອບຄົວ ຂອງ ທ່ານ ຕໍ່ ປີ ເທົ່າໃດ _____?

☐1 0-10,000 ☐2 10,001-15,000 ☐3 15,001-20,000 ☐4 20,001-25,000

☐5 25,001-35,000 ☐6 35,001-45,000 ☐7 45,001 +

I5. ລວມ ນັບ ຈາກ ຄົນ ທັງ ຫມົດ ທີ່ ໄດ້ ຮັບ ລາຍ ໄດ້ ນີ້? _____

I6. ບອກ ລະ ດັບ ຂອງ ການ ສຶກ ສາ ທີ່ ສູງ ເລີ ດ ຂອງ ___. ☐1 ຈົບ ໂຮງ ຮຽນ ມັດ ທະ ຍົມ ພາກ ປາຍ ☐2 ບໍ່ ຈົບ ໂຮງ ຮຽນ ມັດ ທະ ຍົມ ພາກ ປາຍ

☐3 ຈົບ ວິ ທະ ຍາ ໄລ ☐4 ບໍ່ ຈົບ ວິ ທະ ຍາ ໄລ ☐5 ແລະ ອື່ນ ໆ

CONCLUSION

ຂໍຂອບໃຈນຳທຸກທ່ານທີ່ໃຫ້ການຮ່ວມມືເຂົ້າຮ່ວມໃນການສຶກສາຄັ້ງນີ້. ການເຂົ້າຮ່ວມຂອງພວກທ່ານຈະເປັນສ່ວນປະກອບຂ່າວອັນສຳຄັນທີ່ຕອບການເພີ່ມຂຶ້ນປັດປັດໄຈພະນາການນຳພະລາດຂອງທ່ານ ແລະໃຫ້ການແນະນຳຕໍ່ໂຄງການສາທາລະນະສຸກສຳຫຼັບຊຸມຊົນຂອງທ່ານ ດວກ.

NOTE TIME INTERVIEW ENDS: __:__ ☐1 am ☐2 pm

INTERVIEWER REMARKS

J1. Respondent's cooperation was: ☐1 Very good ☐2 Good ☐3 Fair ☐4 Poor

J2. The quality of respondent's answers were: ☐1 High quality ☐2 Generally reliable ☐3 Questionable ☐4 Unreliable

J3. What was the main reason for the questionable or unreliable quality of the interview?
ແມ່ນເຫດຜົນຕົ້ນຕໍອັນໃດສຳຫຼັບຄຸນະພາບໃນການສະພາດຕໍ່ຄຳຖາມທີ່ບໍ່ເປັນຢັນຫາຫຼືອັນທີ່ບໍ່ໜ້າເຊື່ອຖືໄດ້ ?

J4. Respondent's Gender Female ☐1 Male ☐2

J5. Further comments:

Appendix P.

Mein Language Questionnaire

Waah naaic hoc (nam mberc):___/___/___/___

Zaah naaic taux Asie caux Pacific koiv-nzou janx nyanc koiv-lai nyei jauv

Heuc nyei hnoi 1) ____/____/___ Hlaax Hnoi Hnyangx	2) ____/_____/_____ Hlaax Hnoi hnyangx	3) ____/____/_____ Hlaax Hnoi Hnyangx
Naaic waac nyei ziangh hoc 1) ___ : ___ ☐1am ☐2pm	2) __ : __ ☐1am ☐2pm	3) __ : __ ☐ 1am ☐2pm
Setv mueiz jauv-louc 1) Zaah naaic ziangx miaqc ☐ 1	2) piaetv hnoi , ganh dunx jiex ☐	3) da'nyeih diuc ☐3

Naaic waac nyei dorngx ☐1 Dau waac mienh nyei biauv ☐2 RFSC Tengx piu-yiuh mienh nyei dorngx (Yaochien nyei zoux gong dorngx) ☐3 Hnaangh Poux ☐4 Da'nyeih norm dorngx

Dau waac mienh nyei mbuox (Mbuox nyei daauh norm nzangh maac) _____

Naaic waac mienh nyei hoh dauh (nam mberc) __/__/__/__

JIEX GORN WAAC

Longx nyei fai. Yie nyei mbuox heuc ____ Yie se fingx Iu-Mienh. Yie mbuo oix zaah naaic hiuv taux mbuo Iu-Mienh nyanc koiv-lai nyei jauv yiem naiv King County Nquenc zaangc. Fingx waac dau njiec naaiv deix waac-naaic nyei sou naaiv se haih tengx duqv mbuo Asie caux Pacific Koiv-Nzou janx mengh baeqc hiuv duqv taux nyanc Koiv-lai camv zoqc nyei jauv, beiv taux lungh donx naaic hnangv haix nor zoux nyanc caux zan-zanc nyanc nyei koiv-lai. Fingx yietc zungv dau bun njiec naaiv zeiv sou daaih nyei waac naaiv se ganh nyunc ziev oix daaih mv baac yie mbuo tengx meih gem jienv meih nyei mengh dauh nyei oc. Meih dau nyei waac se dorh mingh gapv zorpc jienv da'nyeih dauh mienh nyei, yaac mv maih haix dauh hiuv duqv meih nyei dongh haaix.

NAAIC WAAC NYEI HNOI ___/___/___ **JIEX GORN NAAIC WAAC NYEI**
Hla Hnoi hnya

ZIANGH HOC __ __:__ __ ☐1am ☐2pm

Yie oix naaic gaax meih mbuo se zeiz dongh yie mbuo oix zaah naaic hiuv taux wuov deix mienh nyei fai mv zeiz.

a) Meih yiem naaiv King County Nquenc zaangc fai? Zeiz ☐1 Maiv ☐2

b) Meih nyanc jiex koiv-lai nyei fai? Zeiz ☐1 Maiv ☐2

Ga'ndiev naaiv meih dongh haix fingx mienh. Mbiuv yietc nyungc hnangv.

Filipin ☐1 Yi benv ☐2 Korea ☐3 Kaev ☐4 Vietnam ☐5 La'zaa ☐6 Mien ☐7
Ba'miuh ☐8 Samoan ☐9 Ka'menx ☐10

d) Meih cuotv seix yiem Meiv Guoc fai? Zeiz ☐1 Maiv ☐2
(se gorngv maiv zeiz nor, meih yiem Meiv Guoc duqv mbuoqc ziex hnyangx aqv? 0-5 ☐1 6-10 ☐2 11-20 ☐3 21+ ☐4

Meih nyei die maa naaic maih dauh cuotv seix yiem Meiv Guoc fai? Zeiz ☐1 Maiv ☐2

f) Meih nyei die maa yietc zungv cuotv seix yiem Meiv Guoc fai? Zeiz☐1 Maiv ☐2

g) Meih nyei hnyangh jeiv 18 hnyangx gu'guaaix? Zeiz □1 Maiv □2

1. Yie oix naaic gaax meih nyanc haix nyungc koiv-lai, meih nyanc ndongc haix camv, yietc nyungc naaic nyanc ndongx haix maqc?

Yietc hnyungx koiv-lai naiv meih nyanc mbuoqc ziex, maqc ndongc haix naaic joc maaih ziangh hoc nyei. Beiv taux: nyanc koiv-lai naaic maqc nyei jauv naaic mv baac maaih cun-ciou nyei maiv fih hnangv. Tov dau naaiv mv fih hnangv nyei 2 diuc jauv: Dongh siang nyei caux haix zanc lorz yaac duqv nyei, aengx caux zuqc gitv jiex nam kaengx (wuom Gaengc, sorng) nyei, pui nqai nyei, dapv yangh tiec ndongh nyei, caux siou liouh da'nyeih diuc jauv nyei.) Tov meih dau naiv deix waac dongh meih hiuv guenx jiex nyei jauv hnangv oc. Jangx jienv liemh lungh-ndorm, lungh-aanx, lungh-muonz hnaangx caux ga'naih lanx funx jienv oc. Maiv dungx funx dongh meih nyanc nyei koiv-lai yiem lengc jeiv nyei yinh wuic dorngx (domh gingc, siangh hnyangx hnoi, cingh jaa yinh, domh zuongx nauc gitc nyei dorngx) naaiv deix liouh naaic yiem setv mueiz.

A Naaiv Jauv (Group A)

A1. Ga'ndiev mv deix koiv-lai meih nyanc ndongc haix maqc..

Haix nyungh . mbiauz	Nyanc ndongc haix camv yiem yietc norm			Mbuoqc ziex ..yietc hnyangx		mbuoqc ziex nyei hoh dauh
	li Baaix	Hlaax	Hnyangx	Li Baaix	Hlaax	
Salmon						
Yiem cun-ciou						
Ziangh hnyangx nyei						
Salmon Jaux						
Yiem cun-ciou						
Ziangh hnyangx nyei						
Trau (trout)						
Yiem cun-ciou						
Ziangh hnyangx nyei						
Smelt						
Yiem cun-ciou						
Ziangh hnangx nyeinyei						

A2. Yie oix naaic gaax meih nyanc dongh (Group) A wuov jauv mbiauz wuov meih nyanc haix deix dorngx.

Tov meih mbuox yie meih nyanc mbuoqc ziex persen camv dongh ga'ndiev mv jauv mbiaux yiem Group A mv jauv naaiv. . **Tov dau benx 0-100%. da'nyeic oix**

A2.
1) Liemh ndopv hliqv daaih zianh hlengx nyei: ____%
2) Hliqv nqoi ndopv nqoi ndopv ziangh hlengx nyei: ____%
3) M'nqonrgv, Mbungv, Jaux, Hnyiouv ga'nyuoz nyei ga'naaiv: ____%

A3. Yie oix naaic gaax meih dongh (Group)A wuov jauv mbiaauz wuov hnangv haix nor zoux nyanc. Yie oix meih mbuox yie dongh ga'ndiev bun zoux 2 nyungc hnangv mv nor zouv nyanc naaiv, yietc nyungc mbuoqc ziex persenh.

1) Ziqv, wuonh, ziqv ga'ndiev fuax, kangx opv, zouv, a'fai zaang ___%

2) Dapv yangh tiec ndong, cauv, nyanc nyiemz, kangx, pui nqai ___%

A4. Se gorngv meih wuonh, a'fai zouv mv deix mbiaauz yiem (Gruop) A wuov jauv nor, Ninh mv deix torng naaic meih hnangv nor zoux?

1) Dox guangc ____% 2) Longc zouv lai ___% 3) Longc hopv ___%

A5. Dongh ga'ndiev 4 nyungc dongx naaiv, Tov meih mbouox yie meih zorqv daaih nyei mbiaauz yiem Gruop A naaiv yietc norm dorngx naaic meih hnamv daaih mbuoqc ziex persenh:

1) Poux doih/ndaamh jauv hei ___%
2) Meih, meih nyei hmuongv doic, a'fai pongh youz zorqv daaih nyei mbiaauz yiem Puget Sound koiv ga'hlen mv buoqv haangh ndau ___%
3) Meih, meih nyei hmuangv doic, a'fai pongh youz zorqv daaih nyei mbiaauz yiem mv ga'nyiec maengx Puget sound koiv ga'hlen mv buoqv haangh ndau ___%
4) Hnaangh Poux ___%

Group B

B1. Meih nyanc ga'ndiev naaiv deix mbiaauz ndongc haix maqc

Haix nyungc mbiaauz	Nyanc zuqc mbuoqc ziex nzunc yiem yietc norm	Mbuoqc ziex ... yietc hnyaangx	PORTION SIZE CODE

	Li-baaix	Hlaax	hnyaangx	Li-baaix	hlaax	
Cod						
Yiem cun-ciou						
Ziangh hnyaangx nyei						
Snapper						
Yiem cun-ciou						
Ziangh hnyaangx nyei						
Snowfish						
Yiem cun-ciou						
Ziangh hnyaangx nyei						
Mackeral						
Yiem cun-ciou						
Ziangh hnyaangx nyei						
Tuna						
Yiem cun-ciou						
Ziangh hnyaangx nyei						

(Continueation of B1)

Group B

Haix nyungc Mbiaauz	Nyanc zuqc mbuoqc ziex yiem yietc norm	Mbuoqc ziex ... yietc hnyaangx	**PORTION SIZE CODE**

	Li-baaix	Hlaax	Hnyaangx	Li-baaix	Hlaax	
Mbiaauz la'bieiv						
Maaih cun-ciou						
Ziangh hnyaangx nyei						
Herring						
Maaih cun-ciou						
Ziangh hnyaangx nyei						

B2.

Yie oix naaic meih dongh Group B wuov jauv mbiaauz meih nyanc haix deix dorngx, Tov meih mbuox yie dongh gha'ndiev bun daaih buo nyungc zoux naaiv , yietc nyungc meih nyanc mbuoqc ziex gouqv (persenh).

1) Liemh ndopv hliqv daaih ziangh hlengx nyei ___%
2) Hliqv nqoi ndopv ziangh hlengx nyei ___%
3) Liemh m'nqorngv, mbungv, jaux caux jienv ga'nyuoz hnyiouv nyei ga'naaiv ___%

B3.

Yie oix naaic taux meih dongh (Group) B wuov jaubv mbiaauz meih hnangv haix nor zoux nyanc. Dongh ga'ndiev 2 nyungc hnangv mv nor zouv naaiv, yietc nyungc meih nyanc mbuoqc ziex Gouqv (persenh).

1) Ziqv, Wuonh, Longc doux ziqv, kangx opv, zouv, a'fai zaang: ___%
2) Dapv yangh tiec ndongh, Cauv, nyanc nyiemz, kangx, a'fai pui nqai ___%

Typed

_____ : 1 1 1 1

_____

_____ 1) 1 1 1 1 _____	2) 1 1 1 1 _____	3) 1 1 1 1 _____
_____ 1) __ __:__ __ ☐1am ☐2pm	2) __ __:__ __ ☐1am ☐2pm	3) __ __:__ __ ☐1am ☐2pm
_____ 1) _____ ☐1	2) _____ ☐2	3) _____ ☐3

_____ ☐1 _____ ☐2 _____ ☐3 _____ ☐4 _____

_____ _____ _____ 1 1 1 1

_____ typed

_____
_____
_____
_____
_____.

_____ 1 1 1 1 _____ __:__ ☐1am ☐2pm
___ ___ ___

_____.

a) _____? ____☐1 ____☐2 (IF NO, TERMINATE INTERVIEW)

b) _____? ____☐1 ____☐2 (IF NO, TERMINATE INTERVIEW)

c) _____. _____.

_____☐1 _____☐2 _____☐3 _____☐4 _____☐5

_____☐6 _____☐7 _____☐8 _____☐9 _____☐10

d) _____? _____☐1 _____☐2

(_____?) 0-5☐1 6-10☐2 11-20☐3 21 +☐4

e) _____? _____☐1 ____☐2

f) _____? _____☐1 ____☐2

(TERMINATE INTERVIEW IF BOTH "D", "F" ARE YES)

Typed

g) _____? _____ ☐ 1 _____ ☐ 2 (IF NO, TERMINATE INTERVIEW)

1. _____.

_____

_____

_____

_____

_____.

--- FILL OUT CONSUMPTION FORM --- SHOW PORTION MODEL, PICTURE CARD ---

GROUP A

A1. _____...

						PORTION SIZE CODE

Typed

--- SHOW PORTION MODEL and PICTURE CARD ---

A2._____

A2. 1) _____: ____%
2) _____: ____% **(1 & 2 total 100%)**
3) _____: ____% **(0-100%)**

A3._____

_____---READ ALL CATEGORIES FIRST---Please answer 0-100%. **Answers 1 & 2 must total 100%.**

1) _____: ____%
2) _____: ____% **(1 & 2 must total 100%)**

A4. _____?

1) _____ ____% 2) _____ ____% 3) _____ ____%

A5.

_____---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Yiem pouk doihf ndamh Jauv ____%
2) Zorqv yiem Puget Sound Koiv-Congx dnux ga'hlen naaiv buoqv haangh ndxu. ____%
3) Meih, meih mpi hmuongv doic a'fai ha'nzjauc doic zorqv yiem ga'nyeic maengx Puget Sound ____%
4) a'fai ga'nyeic maengx naaiv buoqv haangh ndxu daaih ____%
4 Hnaangh Poux.

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP B

B1. Meih nyanc ga'ndiev naaiv deix mbiauz ndongc haix magc

Haix Nyungc mbiauz	Nyanc ndongc haix camv yietc norm			Mbuogc ziex ... Yietc HNyangx		PORTION SIZE CODE
	Li baaix	Hlaax	Hnyangx	Li baaix	HLAAX	
COD						
'Cun-Ciou						
Ziangh hnyangx nyei						
Mbiauz-Juv						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						
Snaggen						
Yiem Cun-Ciou						
Ziangh hnyangx nyei						
Mbiauz-Sorng						
Yiem Cun-Ciou						
Ziangh hnyangx nyei						
Hlhorai						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						
Tuna						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						

(continuation of B1)

GROUP B

Haix Nyunqc Mbiauz	Nyanc ndongc haix camv yietc norm			mbuoqc ziex ... Yietc Hnyangx		PORTION SIZE CODE
	Li-beaix	Hlaax	Hnyangx			
Mbiauz La'bieiv						
Yiem Cun-Cion						
Ziangh Hnyangx Nyei						
HERRING						
Yiem Cun-Cion						
Ziangh Hnyangx Nyei						

B2.
Yie oix naaic gaax meih dongh Group B wuov jauv mbiauz meih nyanc haix deix dorngx, Tov meih mbuox yie dongh ga ndiev bun daaih naaiv deix mbiauz Yiem Group B naaiv meih nyanc yietc nyungc mbuoqc ziex persen. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) ~~Liemh~~ ndopv liqv daaih ziangh hlengx nyei ___%
2) Hliqv ngoi ndopv ziangh hlengx nyei ___% **(1 & 2 must total 100%)**
3) M'ngorngv, mbungv, jaux, ga'nyuoz maengx nyei ga'haaiv. ___% **(0-100%)**

B3.
Yie oix naaic gaax meih nyanc nyei mbiauz yiem group B wuov jauv wuov meih hnangv nor zoux nyanc. Ga'ndiev bun zoux 2 jauv naaiv meih hnangv nor zoux nyanc nyei persen ndongc haix camv. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.**

1) Ziqv, ziqv ga'ndievfaux, wuonh, opv, zaang: ___%
2) dapv yangh tiec, Ciauv, nyiemz, Congx, pui ngai ___%

B4. Se gorngv meih wuonh a'tai zaang Group B naaiv, jauv koiv-lai naaiv, ninh ?nyei tonng naaic dorh miengh hnangv haix nor zaux?

1) 'Dox x guongc __ __% 2) Longc zouv lai __ __% 3) Liouh hopv __ __ __%

B5. Dongh ga'ndiev mv deix 4 nyungc dorngx naaiv. Jov meih mbuox yie meih zorqv doih nyei mbianz yiem Group B mv jauv naaiv Yieto norm dorngx hnaic meih mbuoqc ziex gouv (Persenh) ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Poux doih / ndaam jauv hei __ __ __%
2) Meih, meih nyei hnuongv doic, ha'nziauc doic zorqv nyei mbianz naaic yiem Puget Sound Koiv naaiv buoqv haangh ndau __ __ __%
3) Meih, meih nyei hnuongv doic, pong-youz zorqv nyei mbianz yiem ga'ngiec Puget Sound Koiv caux ga'nein __ __ __%
4) Hnaangh Poux naaic buoqv naangh ndau __ __ __%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP C

C1. Meih nyanc ndongc haix magc ga'ndiev naaiv deix Koiv-lai . . .

Haix Nyungc mbianz	Nyanc ndongc haix camv yiem yietc norm			mbuoqc ziex ... yietc Hnyangx		PORTION SIZE CODE
	Li-baaix	Hlaax	Hnyangx	Li-baaix	Hlaax	
Mbiaux danx mieuh						
Yiem Cun-ciou						
Ziangh hnangx nyei						
Crappie						
Yiem Cun-ciou						
Ziangh hnyangx nyei						
CARP						
Yiem Cun-ciou						
Ziangh hnyangx nyei						

(continuation of C1)

GROUP C

Haix nyungx mbiauz	Nyanc zaug ndongc haix camv yiem yietc norm			mbuogc ziex - -- Yietc Hnyangx		PORTION SIZE CODE
	Li-baaix	Hlaax	Hnyangx	Li-baaix	Hlaax	
PERCH						
Yiem Cun-Cròu						
Ziangh Hnyangx nyei						
Tilapia						

C2. Yie oix naaic gaax meih Group C naaiv jauv mbiauz meih nyanc haix deix dorngx hnangv. Tov meih mbuox yie gorngv meih nyanc mbuogc ziex persen dongh. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.** ga'ndiev ngaiv deix ziex nyungc zigei zoux naaiv meih nyanc mbuogc ziex gouqv (persenh)

1) Liemh ndopv hliqv daaih ziangh hlengx nyei ___%
2) Hliqv ngoi ndopv ziangh hlengx nyei ___% **(1 & 2 must total 100%)**
3) M'ngorngv, mbungv, jaux, ga'nyuox nyei ___% **(0-100%)**
ga'naaiv.

C3. Yie oix naaic gaax yiem Group C naaiv jauv mbiauz meih hnangv haix nor zoux nyanc. Tov meih mbuox yie dongh ga'ndiev 2 nzaangh zoux nyanc nyei jauv naaiv, yietc nzangh meih nyanc mbuogc ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.** ziex gouqv (persenh)

1) Ziqv, wuonh, ziqv ga'ndiev faux, Zigv kangx, maeqv ngoi kuqv wuonh, a'fai zaang ___%
2) Dapv yangh tiec ndongh, cauv, nyiewiz, ziqv Cbngx, pui ngai ___%

C4. Se gorngv meih wuonh a'fai zuang naaiv deix Group C naaiv jauv koiv-lai? ninh nyei torng naaic meih hnangv haix nor zoux.?

1) Dox guongx __% 2) Longc zouv lai __% 3) Longc hqpv __%

C5. Tov mbuox yie dongh ga'ndieV Group C naaiv jauv mbiauz naaiv meih zorqv. ---READ ALL CATEGORIES--- **Answers must total 100%** Yiem ga'ndieV naaiv deix dorngx naaiv. Yiete norm dornmbuoqc ziex gouqv (per...)

1) Poux doih / mdaamh jauv hei. __%
2) Meih, meih nyei hmaongv doic a'fai ha'nziang doic zorqv daaih nyei mbiauz Yiem Puget Sound koiv caux ga'hlen n%aic buoqv hanh...
3) Meih, meih nyei hmuongv doic a'fai ha'nziang doic zorqv daaih nyei mbiauz Yiem ga'nyiec maengx Puget Sound koiv caux% ga'hlen naaic.
4) buoqv haangh ndau. __%
Hnaangh poux.

--- SHOW PORTION MODEL, PICTURE CARD ---

Group D

D1. Ga'ndieV naaiv deix mbiauz meih nyanc. ndongc haix magc.

Haix nyungc mbiauz	Nyanc zugc mbuoqc ziex Yiem YIEC NORM			mbuoqc ziex norm Yiete Hnyangx		PORTION SIZE CODE
	Li-baaix	Hlaax	Nnyangx	Li-baaix	Hlaax	
HALIBUT						
Yiem Cun-Ciou						
Ziangh hnyangx nyei						
SOLE/FLOUNDER						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						
STURGEON						
Yiem Cun-Ciou						
Zangh Hnyangx nyei						

(continuation of D1)

GROUP D

Haix nyungc mbiauz	nganc zugc mbuogc ziex zong yiem yietc norm			Mbuogc ziex norm --- yietc Hnyangx		PORTION SIZE CODE
	Li-baaix	Hlaax	Hnyangx	Li-baaix	Hlaax	

D2. Yie oix naaic gaax meih Group D naaiv jauv mbiauz meih nyanc haix deix dorngx hnangv. Tov meih mbuox yie dongh ga'ndiev ziex nzungh nyei zour yiem Group C naaiv, yietc nzangh meih nyanc. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%.**
Answers 1 & 2 must total 100%. mbuogc ziex gouqv (persenh)

1) Liemh ndopv. ___%
2) Hliqv ngoi ndopv ziangh hlengx nyei. ___% **(1 & 2 must total 100%)**
3) M'ngorngv, mbungv, jaux, ga'nguox nyei ___% **(0-100%)**
ga'naaiv

D3. Yie oix naaic gaax meih yiem Group D naaiv jauv mbiuaz meih hnangv haix nor zoux nyanc. Tov meih mbuox yie dongh ga'ndiev 8 nzangh zoux nyanc nyei jiuv naaiv, yietc ---READ ALL METHODS FOR EACH CATEGORY FIRST---
zangh meih nyanc zugc mbuogc gouqv (persenh)
Answers must total 100%.

1) Zigv, wunnh, zigv ga'ndiev faux, zigv kangx, maegv ngoi kugv wikonh, atfai zaang.
2) Dapv yangh tiec ndongh, cauv, nyiemz, zigv congx, pui ngai. ___%

D4.
Se'gongv meih wunnh atfai zaang naaiv Group D naaiv jauv koiv-lai nor, ninh nyei torng naaic meih hnangv haix nor? zoux?

1) Dox guongc ___% 2) Longc zouv lai ___% 3) Longc hopv. ___%

D5. Dongh ga'ndiev mv deix dorngx naaiv, Tov meih mbuox yie meih zorqv nyei: ---READ ALL CATEGORIES---
Answers must total 100%. mbiauz yiem Grang D naaiv jauv naaiv, Yietc norm dorngx zorqv mbuogc ziex persenh ?

1) Ponx Doih/ndaamh jauv hei ___%
2) Meih, meih nyei hmuongv doic, a'fai ha'nziauc doic zorqv nyei mbiauz yiem Puget Sound koiv eaux % ga'hlen naaiv buaqv hangh ndau.
3) Meih, meih nyei hmuongv doic, a'fai ha'nziauc doic zorqv nyei mbiauz yiem ga'nyiec maengx Puget Sound %
4) Caux ga'hlen naaic buqv hangh ndau. ___%
Hnaangh Ponx.

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP E

E1. Ga'ndiev naaiv deix mbiauz naaiv meih nyanc ndongc haix maqc.

Haix Nyungc mbiauz	Nyanc zugc ndongc haix camv yiem yietc norm			Mbuogc ziex norm --- Yietc Hnyangx		PORTION SIZE CODE
	Li-baaix	Hlaax	Nnyangx	Li-baaix	Hlaax	
Mbangh mbaih						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						
mbangh mbaih maaz						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						
Mbangh mbaih nzaqc						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						
BUTTER CLAMS						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						

(continuation of E1)

Group E

Haix Nyungc mbianz	Nyanc zugc mbuangc ziex yiem yiete norm			Mbuogc ziex norm.. Yiete Hnyangx		PORTION SIZE CODE
	Li-baaix	Hlaax	Hnyangx	Li-baaix	Hlaax	
Mbungh mbai Jaex						
Yiem Cun-Ciòn						
Ziangh Hnyangx nyei						
MACRONA Mbungh mbaih						
Yiem Cun-Ciòn						
Ziangh Hnyangx nyei						
COCKLES						
Yiem Cun-Ciòn						
Ziangh Hnyangx nyei						
OYSTERS						
Yiem Cun-Ciòn						
Ziangh Hnyangx nyei						
Mussels						
Yiem Cun-Ciòn						
Ziangh Hnyangx nyei						
ABALONE						
Yiem Cun-Ciòn						
Ziangh Hnyangx nyei						
SCOLLOPS						
Yiem Cun-Ciòn						
Ziangh Hnyangx nyei						

--- SHOW PORTION MODEL, PICTURE CARD ---

E2. Ga'ndiev naaiv Koiv-lai meih nyanc ndongehaix magc

Haix Nnyungc Kuqv-mbiauz	Nyanc zuqc mbuoqc ziex yiem yiete norm			Mbuoqc ziex norm ... Yiete Hnyangx		PORTION SIZE CODE
	Li-baaix	Hlaax	Hnyangx	Li-baaix	Hlaax	
Qaa						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						
Njinh Ngaaiz						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						
SQUID						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						
SEA URCHIN						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						
Koiv Guaa-ziex						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						
Wuomh Guei						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						
Domh Qaa Koingc						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						

--- SHOW PORTION MODEL and PICTURE CARD ---

E3. Yé oix naaic naax meih gándiev naaiv deix naaiv meih nyanc haix deix dorngx.? Percentages for each species must total 100%.

Haix Nhungx Ga'naaiv	Ziangh dauh	Ziangh dauh nyei mv baac zorqv cuotv gaisie mbubaje	Ziangh dauh nyei Zorqv ngoi dueiv	Ziangh dauh nyei zorqv cuotv gaisie mbubaje caux dueih meeiz	TOTAL 100%
MBUNGH MBAIH					TOTAL 100%
Mbungh mbaih maaz					TOTAL 100%
Mbungh mbaih laic					TOTAL 100%
GEODUCK MBUNGH MBAIH					TOTAL 100%
? MACOM CLAMS					TOTAL 100%
? COCKLES					TOTAL 100%
? ABALONE					TOTAL 100%
? SCALLOPS.					TOTAL 100%
					TOTAL 100%
					TOTAL 100%
					TOTAL 100%

(continuation of E3)

Group E

QAA KORNGC	ziangh dauh (Sin caux Jienv m'ngorngv) ___%	Sin Hnangv ___%	M'ngorngv Hnangv ___%	TOTAL 100%
NJIMH NQAAIZ	ziangh dauh Njimh nquaaiz (Orv caux hmei) ___%	Orv Hnangv ___%	Hmei Hnangv ___%	TOTAL 100%
SQID	ziangh dauh nyei ___%	ORV HNANGV (Sin caux batc) ___%	----------	TOTAL 100%
SEA ARCHIN	ziangh dauh ___%	Jaux Hnangv ___%	----------	TOTAL 100%
Koiv Guaa ziex	ziangh dauh ___%	ORV Jaan Hnangv ___%	----------	TOTAL 100%
Moonsnail Wuomh Guei	ziangh dauh ___%	Orv Jaan Hnangv ___%	----------	TOTAL 100%
Domb Qaa Korngc	Ziangh Dauh (Sin caux m'ngorngv) ___%	Sin Hnangv ___%	___%	TOTAL 100%

E4. Yie oix maic gaax meih nyanc dongh naaiv deix maaih kuqv nyei mbiauz yiem. Grompé naaiv jauv naaiv meih hnangv Kaix nor zoux nyanc. Jov meih mbuox yie dongh gandiev a nzangh---READ ALL METHODS FOR EACH CATEGORY FIRST-- **Answers must total 100%:** zoux nyanc nyei jauv naaiv, Yietc nziangh meih nyanc mbuoqc ziex gouqv (persent)

1) Ziqv, Wuomh, Ziqv Kangx, Wuomh nv longc mbunv afai zaang- ___%
2) Dapv yangh tiec ndongh, Cauv, nyiemz, Ziqv Cangx, Phi Ngaai. ___%

E5. Se gorngv meih wuonh a'fai zaang naaiv deix maaih kugv nyei mbiauz yiem Group E naaiv nor, ninh nyei torng meih hnangv haix nor zoux?

1) Dox guongc ___% 2) Longc zoux ga'naav ___% 3) Longc hopv ___%

E6. Dongh ga'ndiev ziex nyungc dorngx naaiv, Tov meih mbuox yie yiem Group C naaiv jauv mbiauz --READ ALL CATEGORIES--- **Answers must total 100%.** Meih zorgv yiem yietc nyungc dorngx draih maaih mbuoqc ziex gouqv (

1) Poux Doih / Ndaamh Jauv hei. ___%
2) Meih mbih hmuongv doic afai pongh youz zorgv yiem Puget Sound koiv-ga'hlen naaiv buogv haangh ndau nyei ___%
3) Meih mbih hmuongv doic afai pongh youz zorgv yiem ga'neyiec Puget Sound koiv hlen naaiv buogv haangh ndau nyei ___%
4) Hnaangh poux ___%

--- SHOW PORTION MODEL and PICTURE CARD ---

GROUP F

F1.

Haix nyungc Koiv-lai	Nyanc zugc ndongc haaix camv yiem yietc norm			mbuogc ziex norm .... Yietc HNYANGX		PORTION SIZE CODE
	Li-baaix	Hlaax	Hnyangx	Li-baaix	Hlaax	
Koiv-miev						
Yiem Cun-Ciou						
Ziangh Hnyangx nyei						
KELP						
Yiem Cun-Ciou						
Ziangh Hnyangx Nyei						

F2. Dongh ga'diev ziex nyungc dorngx naaiv, Tov meih mbuox yie-yiem Group F naaiv jauv mbiauz. Meih zorqv yiem yiete nyungc dorngx daaih naaic mpaih mpuoqc zeix gouqv (persenh) ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Poux / ndaam jauv hei ___%
2) Meih, meih nyei hmuonqv doic, a'fai pongh youz zorqv yiem Puget Sound Koiv-Caax, huing nzuonx ga'hien naaiv mbuoqv ___% hoangh ndam
3) Meih, meih nyei hmuonqv doic a'fai pongh youz zorqv yiem Puget Sound Koiv-Caax, ga'nyiec maengx huing nzuonx ___% naaiv buoqv haangh ndam
4) HNAANGH POUX. ___%

Aengx maaih haix nyungc meih nyanc nyei Koiv-lai maiv? ☐ 1 Zeiz ☐ 2 maiv (If no, go to H1)
gaengh duqv gorngv taux wuov nyungc maaih nyei fai? zeiz

G1. ...

Haix nyungc Koiv-lai	Nyanc zuqc ndongc haix cqmv yiem yiete norm			Mbuoqc ziex norm .... yiem yiete hnyangx		PORTION MODEL CODE
	Li-baaix	Hleax	Hnyangx	Li-baaix	Hnyangx	

---SOCIAL EVENTS ---

H1. Ga'diev mv deix waac naaiv maaic taux meih nyanc yiem domh zuongx nyei dorngx. Ziepc nyeic hlaax jiex daaih naaiv, meih mingh nziaanc yinh wuic nyei dorngx ndongc haix magc (domh gingc hnoi, Janx Kaeqv caax yi benv nyei Siangh hnyangx hnoi, Laangz zaangc nyei yinh wuic (If 0, go to no. I 1) cing-jaa yinh, aengx maaih cmiv nyungc) 12 hlaax jiex daaih naaiv ___ nzunc.

H2. Dongh yiem mv deix yinh wuic nyei dorngx naaiv? Please answer from 0-100% ___% (If answer is 0, go to I 1)
meih nyanc nyei Koiv-lai nyanc zuqc mbiaqc ziex gouqv (persenh)

---SHOW PORTION MODEL and PICTURE CARD ---

H3. Dongh yiem mv deux yinh wuic nyei dongx naaiv, yiet nzunc meih ? ___ oz.(PORTION MODEL CODE: __)
nyanc koiv-lai ndongc haix camv.

H4. Meih nyanc koiv-lai ndongc haix magc dongh ga'ndiov mv deix yinh wuic? You may answer from 0-100%.

Maaih kugv nyei mbiauz ___% Koiv-miov lai ___% _____ ___%
(njimh ngaiz, mbung-mbaih, gaq).

I1. Tov meih mbuox taux meih nyei ____. Sogongv mv oix mbuox nor, Tov meih ginv mangc gax meih nyei hnyangh jeiv ndortv
hnyangh jeiv. zugc haix wuong

18-29 ☐1 30-54 ☐2 55 + ☐3

I2. Mbuox meih nyei hniev-soux ___ lbs. OR ___ kg.

I3. Mbuox meih nyei hkang-soux ___ feet ___ inches OR ___ cm.

I4. Meih nyei biauv zong nyei zinh nyaanh yiem yiete hnyangx

☐1 0-10,000 ☐2 10,001-15,000 ☐3 15,001-20,000 ☐4 20,001-25,000
☐5 25,001-35,000 ☐6 35,001-45,000 ☐7 45,001 +

I5. Maiv deix nyaanh uix zugc ~~buagc~~ ?mbuogc ziex dauh miauh?

I6. Mmbuox meih nyei Sou-duang. ☐1 Ziangx gau horgc Miagx ☐2 mv gaengh ziangx gau horgc.

☐3 ziangx domh horgc ☐4 mv ziangx domh horgc ☐5 Da'nyeih nyungc.

CONCLUSION

Laengz zingh meih laengz tengx zoux naaiv nzunc zauh hiuv nyei sic dauh jauv. Meih tengx jienv tengx taan bun njiec daaih nyei waac gengh jienv hoie doih minh tengx beu faux meih nyei. zeiz-tin-deic zeiz daaih nyei ganaaiv faux koi jauv bun zoh [illegible] hungh jaa haih tengx dugv meih naaic fengx mienh nuez doic

NOTE TIME INTERVIEW ENDS: __:__ ☐1 am ☐2 pm

INTERVIEWER REMARKS

J1. Respondent's cooperation was: ☐1 Very good ☐2 Good ☐3 Fair ☐4 Poor

J2. The quality of respondent's answers were: ☐1 High quality ☐2 Generally reliable ☐3 Questionable ☐4 Unreliable

J3. What was the main reason for the questionable or unreliable quality of the interview?

_____

J4. Respondent's Gender Female ☐1 Male ☐2

J5. Further comments:

_____

_____

Appendix Q.

Samoan Language Questionnaire

Fesili Numera: ☐☐☐

SU'ESU'EINA O MEA'AI SAMI (FIGOTA MA I'A) E 'AI (TAUMAFA) E TAGATANU'U O ASIA MA LE PASEFIKA

ASO SA VALA'AU AI 1) |__|__|__|__| ma aso tau	2) |__|__|__|__| ma aso tau	3) |__|__|__|__| ma aso tau
TAIMI O LE TALANOAGA 1) __ __:__ __ ☐ taeao ☐ afiafi	2) __ __:__ __ ☐ taeao ☐ afiafi	3) __ __:__ __ ☐ taeao ☐ afiafi
FA'AI'UGA 1) uma le talanoaga ☐	2) e le i sau; toe fa'atonu ☐	3) isi ☐

MEA NA FAI AI LE TALANOAGA ☐ Fale o le o lo o fesiligia ☐ RFSC ☐ Fale'aiga ☐ Le isi _____

MATA'ITUSI AMATA O LE IGOA O LE TALI FESILI _____ **FA'AILOGA A LE O FAIA FESILI** |__|__|__|

O LE FA'ALAUILOAINA

Talofa lava. O lo'u igoa o _____ ma o a'u o le Samoa. Ua faia lenei su'esu'ega ina ia maua se malamalamaga lelei i le tulaga o le fa'aaogaina o mea'ai sami e Samoa o lo o alaala i le itumalo o Kigi. O mea uma o le a e fa'ailoa mai pe a e tali i nei fesili o le a fesoasoani lea ina ia malamalama ai faiganu'u a Asia ma le Pasefika i le tulaga o le fa'aaogaina o mea'ai sami, le faiga o mea'ai i le saunia ma le fa'avelaina, ma ituaiga mea'ai sami e masani ona fa'aaoga. O mea uma o le a e fa'ailoa ma ofoina mai i lenei talanoaga e le so'ona fa'alauteleina. O au tali o le a tu'u fa'atasi ma tali a isi ina ia leai se tali a se to'atasi e fa'ailoaina.

ASO O LE TALANOAGA: |___|___|___| ma aso tau **TAIMI AMATA O LE TALANOAGA**: __ __:__ __ ☐ taeao ☐ afiafi

1. O le a ou fesiligia oe ina ia iloa ai pe tatau ona e i ai i le vaega lea matou te fia su'esu'eina.

a. E te nofo ea i le itumalo o Kigi (King)? Ioe ☐ Leai ☐

e. E te 'ai ea i ni mea'ai sami? Ioe ☐ Leai ☐

i. O le fea o itu'aiga tagatanu'u o ta'ua i lalo e te i ai? (Siaki na o le tasi)

Filipaina ☐ Sapani ☐ Kolea ☐ Saina ☐ Vianamisi ☐
Lao ☐ Mieni ☐ Mauga ☐ Samoa ☐ Kamepoli ☐

o. Sa e fanau i le Iunaite Setete? Ioe ☐ Leai ☐

(Afai e leai, e fia tausaga talu ona e i ai i le Iunaite Setete?) 0-5 ☐ 6-10 ☐ 11-20 ☐ 21 + ☐

u. E i ai se isi o ou matua sa fanau i le Iunaite Setete? Ioe ☐ Leai ☐

f. Sa fananau uma ou matua i le Iunaite Setete? Ioe ☐ Leai ☐

g. Ua atoa lou sefulu ma le valu (18) tausaga? Ioe ☐ Leai ☐

I. O a ituaiga mea'ai sami (figota ma i'a) e te 'ai ai, le tele o lau 'ai i ai, ma o le a fo'i lou 'ai so'o i ai?

O le tele o lau 'ai ma lou 'ai so'o i mea'ai sami (figota ma i'a) e fua i le taimi o le tausaga. Fai ma fa'ata'ita'iga, o lou 'ai so'o i mea'ai sami e fua lea i le fesuia'iga o le tau. Tali mai i ni auala se lua: pe a fou, ma o lo o iai, tu'u 'aisa, fa'ala, tu'uapa, po o le teu fo'i. Tali mai fesili nei i se auala e te masani lelei ai. Manatua ia aofia ai 'aiga o le taeao, aoauli, afiafi, fa'apea fo'i vai'aiga. Aua ne'i aofia ai mea'ai sami (figota ma i'a) e te 'ai ai i fa'atasiga lautele e i ai aso fa'amanatu, tausaga fou a Saina, tausaga fou a Sapani, fa'aipoipoga, mea fa'alenu'u, po o tu ma aganu'u. O mea ia o le a fesili mulimuli atu ai.

VAEGA A

A1. Pe fa'afia ona e 'ai i mea'ai sami o lo o ta'ua i lalo?

ITUAIGA I'A	AOFA'I O VAEGA E 'AI I LE			AOFA'I O...I LE TAUSAGA		FA'AILOGA O LE FUA O VAEGA FA'AAOGA
	VAIASO	MASINA	TAUSAGA	VAIASO	MASINA	
SAMANI						
i le tau						
tausaga atoa						
FUA O LE SAMANI						
i le tau						
tausaga atoa						
TULAU (Trout)						
i le tau						
tausaga atoa						
SIMELI (Smelt)						
i le tau						
tausaga atoa						

A2. O a vaega o i'a o le Vaega A e te 'ai ai? Ta'u mai ia te a'u pe fia pasene o le taimi e te 'ai ai mea ia o lo o fa'avasegaina i lalo. ***FAITAU MAE'A MUAMUA FA'ASOLOGA UMA*** Ia tali mai i le 0-100 pasene (%). Ia atoa le 100% le faitau aofa'i o le tali 1 ma le 2.

1) A'ano e pipi'i ai le pa'u ___ ___ ___ %
2) A'ano e leai se pa'u. ___ ___ ___ % (1 ma le 2 ia atoa le 100%)
3) Ulu, ivi, fua, ma totoga. ___ ___ ___ % (0-100%)

A3. Pe fa'apefea ona saunia i'a o i le Vaega A e te 'ai ai? I fa'asologa e lua o i lalo, ta'u mai po o a pasene o le taimi e te 'ai ai i'a o i le Vaega A e fa'apei ona saunia i le auala lava lea. ***FAITAU MUAMUA TULAGA UMA MO FA'ASOLOGA TA'ITASI*** Ia atoa le 100% o le faitau aofa'i o tali.

1) Tao, saka i le vai, tunu pa'u, tunu vilivili, po o le fa'avela i le ausa. ___ ___ ___ %
2) Tu'u'apa, falai, oka ('ai mata), fa'aasu, po o le fa'ala. ___ ___ ___ % (1 ma le 2 ia atoa le 100%)

A4. Afai e saka i le vai, fa'aasu pe fa'avela i le ausa se i'a o le Vaega A, o le a lau mea e fai i le suavai sa fa'aaogaina?

1) Sasa'a 'ese ___ ___ ___ % 2) Fa'aaoga e fai ai kuka ___ ___ ___ % i. Inu ___ ___ ___ %

A5. I le fa'asologa i lalo, ta'u mai po o a pasene o i'a o i le Vaega A e maua mai: ***FAITAU UMA FA'ASOLOGA*** la atoa le 100% o le faitau aofa'i o tali.

1) i faleoloa mea'ai/faleoloa laiti ___ ___ ___ %
2) e oe, tagata o lou aiga, po o lau uo mai i le fagaloa ma ona vaipanoa . ___ ___ ___ %
3) e oe, tagata o lou aiga, po o lau uo mai i fafo atu o le fagaloa ma ona vaipanoa. ___ ___ ___ %
4) i fale'aiga ___ ___ ___ %

VAEGA E

E1. Pe fa'afia ona e 'ai i mea'ai sami ia o lo o ta'ua i lalo?

ITUAIGA I'A	AOFA'I O VAEGA E 'AI I LE			AOFA'I O..I LE TAUSAGA		FA'AILOGA O LE FUA O VAEGA FA'AAOGA
	VAIASO	MASINA	TAUSAGA	VAIASO	MASINA	
KOTI (Cod)						
i le tau						
tausaga atoa						
I'AOU (Dogfish)						
i le tau						
tausaga atoa						
SINEPA (Snapper)						
i le tau						
tausaga atoa						
I'ASINA (Snowfish)						
i le tau						
tausaga atoa						

VAEGA E

E1 (fa'aauau)

ITUAIGA I'A	AOFA'I O VAEGA E 'AI I LE			AOFA'I O...I LE TAUSAGA		FA'AILOGA O LE FUA O VAEGA FA'AAOGA
	VAIASO	MASINA	TAUSAGA	VAIASO	MASINA	
ATULE						
i le tau						
` tausaga atoa						
TUNA						
i le tau						
tausaga atoa						
GATALA						
i le tau						
tausaga atoa						
ELENI						
i le tau						
tausaga atoa						

E2. O a vaega o i'a o i le Vaega E e te 'ai ai? Ta'u mai po o a pasene o le taimi e te 'ai ai i'a o i le Vaega E e fa'apei ona fa'avasegaina i lalo. ***MUAMUA ONA FAITAU VAEGA UMA*** Ia tali mai i le 0-100 pasene (%). Ia atoa le 100% o le faitau aofa'i o tali 1 & 2.

1) A'ano e pipi'i ai le pa'u ___ ___ ___%
2) A'ano e leai se pa'u ___ ___ ___%
3) Ulu, ivi, fua, totoga, pa'u ___ ___ ___%

E3. Pe fa'apefea ona saunia i'a o le Vaega E e te 'ai ai? I fa'asologa e lua i lalo, ta'u mai po o a pasene o le taimi e te 'ai ai i'a o le Vaega E o lo o saunia i le auala lava lea. ***FAITAU MUAMUA UIGA UMA O FA'ASOLOGA TA'ITASI*** Ia atoa le selau pasene 100% o le faitau aofa'i o tali uma.

1) Tao, saka i le vai, tunu pa'u, tunu vilivili, fa'avela i le ausa ___ ___ ___ %
2) Tu'u'apa, falai, oka, fa'aasu, pe fa'ala. ___ ___ ___ %

E4. Afai e saka i le vai, fa'aasu pe fa'avela i le ausa se i'a mai le Vaega E, o le a lau mea e fai i le suavai sa fa'aaogaina?

1) Sasa'a 'ese ___ ___ ___ % 2) Fa'aaoga i kuka ___ ___ ___ % 3) Inu ___ ___ ___ %

E5. I le fa'asologa i lalo, ta'u mai pe fia pasene o i'a o i le Vaega E e te maua mai: ***FAITAU UMA FA'ASOLOGA*** Ia atoa le selau pasene 100% le faitau aofa'i o tali uma.

1) i faleoloa mea'ai/faleoloa laiti ___ ___ ___ %
2) e oe, tagata o lou aiga, po o lau uo mai le fagaloa ma ona vaipanoa ___ ___ ___ %
3) e oe, tagata o lou aiga, po o lau uo mai fafo atu o le fagaloa ma ona vaipanoa ___ ___ ___ %
4) i fale'aiga ___ ___ ___ %

VAEGA I

I1. Pe fa'afia ona e 'ai i mea'ai sami o lo o ta'ua i lalo?

ITUAIGA I'A	AOFA'I O VAEGA E TE 'AI AI			AOFA'I O...I LE TAUSAGA		FA'AILOGA O LE FUA O VAEGA FA'AAOGA
	VAIASO	MASINA	TAUSAGA	VAIASO	MASINA	
I'AFAI'AVA (Catfish)						
i le tau						
tausaga atoa						
KALAPI (Crappie)						
i le tau						
tausaga atoa						
KEPI (Carp)						
i le tau						
tausaga atoa						
TALAPIA						
i le tau						
tausaga atoa						
PESI (Bass)						
i le tau						
tausaga atoa						

I2. O a vaega o i'a o le Vaega I e te 'ai ai? Ta'u mai po o a pasene o le taimi e te 'ai ai i'a o i le Vaega I e fa'apei ona fa'avasegaina i lalo. ***FAITAU MUAMUA FA'ASOLOGA UMA*** Ia tali mai i le 0-100 pasene (%). Ia atoa le 100% le faitau aofa'i o le 1 ma le 2.

1) A'ano e pipi'i ai le pa'u ___ %
2) A'ano e leai se pa'u ___ %
3) Ulu, ivi, fua, totoga, pa'u ___ %

I3. Pe fa'apefea ona saunia i'a o le Vaega I e te 'ai ai? I fa'asologa e lua o i lalo, ta'u mai po o a pasene o le taimi e te 'ai ai i'a o le Vaega I e fa'apei ona saunia i le auala lava lea. ***FAITAU MUAMUA UIGA UMA O FA'ASOLOGA*** Ia atoa le 100% le aofa'i o tali uma.

1) Tao, saka i le vai, tunu pa'u, tunu vilivili, fa'avela i le ausa ___ %
2) Tu'u'apa, falai, oka, fa'aasu, pe fa'ala. ___ %

I4. Afai e saka i le vai, fa'aasu pe fa'avela i le ausa se i'a o le Vaega E, o le a lau mea e fai i le suavai sa fa'aaogaina?

1) Sasa'a 'ese ___ % 2) Fa'aaoga i kuka ___ % 3) Inu ___ %

I5. I le fa'asologa i lalo, ta'u mai pe fia pasene o i'a o le Vaega A e te maua mai: ***FAITAU UMA FA'ASOLOGA*** Ia atoa le 100% le faitau aofa'i o tali uma.

1) i faleoloa mea'ai/faleoloa laiti ___ %
2) e oe, tagata o lou aiga, po o lau uo mai le fagaloa ma ona vaipanoa ___ %
3) e oe, tagata o lou aiga, po o lau uo mai fafo atu o le fagaloa ma ona vaipanoa ___ %
4) i fale'aiga ___ %

VAEGA O

O1. Pe fa'afia ona e 'ai i mea'ai sami o lo o ta'ua i lalo?

ITUAIGA I'A	AOFA'I O VAEGA E 'AI I LE			AOFA'I O...I LE TAUSAGA		FA'AILOGA O LE FUA O VAEGA FA'AAOGA
	VAIASO	MASINA	TAUSAGA	VAIASO	MASINA	
ALIPATI (Halibut)						
i le tau						
tausaga atoa						
SOU/ALI (Sole/Flounder)						
i le tau						
tausaga atoa						
SITOTIONE (Sturgeon)						
i le tau						
tausaga atoa						
SAKA (Sucker)						
i le tau						
tausaga atoa						

O2. O a vaega o i'a o le Vaega O e te 'ai ai? Ta'u mai po o a pasene o le taimi e te 'ai ai i'a o le Vaega O e fa'apei ona fa'avasegaina i lalo. ***MUAMUA ONA FAITAU FA'ASOLOGA UMA*** Ia e tali mai i le 0-100 pasene (%). Ia atoa le 100% le faitau aofa'i o le 1 & 2.

1) A'ano e pipi'i ai le pa'u ___ ___ ___ %
2) A'ano e leai se pa'u ___ ___ ___ %
3) Ulu, ivi, fua, totoga, pa'u ___ ___ ___ %

O3. E fa'apefea ona saunia i'a o le Vaega O e te 'ai ai? I fa'asologa e lua i lalo, ta'u mai po o a pasene o le taimi e te 'ai ai i'a o le Vaega O e fa'apei ona saunia i le auala lava lea. ***FAITAU MUAMUA UIGA UMA MO FA'ASOLOGA TA'ITASI*** Ia atoa le 100% o le faitau aofa'i o tali uma.

1) Tao, saka i le vai, tunu pa'u, tunu vilivili, fa'avela i le ausa ___ ___ ___ %
2) Tu'u'apa, falai, oka, fa'aasu, pe fa'ala. ___ ___ ___ %

O4. Afai e saka i le vai, fa'aasu pe fa'avela i le ausa se i'a o le Vaega O, o le a lau mea e fai i le suavai sa fa'aaogaina?

1) Sasa'a 'ese ___ ___ ___ % 2) Fa'aaoga i kuka ___ ___ ___ % 3) Inu ___ ___ ___ %

O5. I le fa'asologa i lalo, ta'u mai pe fia pasene o i'a o le Vaega O e te maua mai: ***FAITAU UMA FA'ASOLOGA*** Ia atoa le 100% le faitau aofa'i o tali uma.

1) i faleoloa mea'ai/faleoloa laiti ___ ___ ___ %
2) e oe, tagata o lou aiga, po o lau uo mai le fagaloa ma ona vaipanoa ___ ___ ___ %
3) e oe, tagata o lou aiga, po o lau uo mai fafo atu o le fagaloa ma ona vaipanoa ___ ___ ___ %
4) i fale'aiga ___ ___ ___ %

VAEGA U

U1. Pe fa'afia ona e 'ai i mea'ai sami (figota) o lo o ta'ua i lalo?

ITUAIGA FIGOTA	AOFA'I O VAEGA E 'AI I LE			AOFA'I O...I LE TAUSAGA		FA'AILOGA O LE FUA O VAEGA FA'AAOGA
	VAIASO	MASINA	TAUSAGA	VAIASO	MASINA	
TUGAGE ('ena'ena/uamltl)						
i le tau						
tausaga atoa						
TUGAGE UMI (Horse Clams)						
i le tau						
tausaga atoa						
TUGAGE MA'AI (Razor Clams)						
i le tau						
tausaga atoa						
TUGAGE MOMOGA (Butter)						
i le tau						
tausaga atoa						
TUGAGE FAIUTE (Geoduck)						
i le tau						
tausaga atoa						
TUGAGE MAKO (Macoma)						
i le tau						
tausaga atoa						
PIPI						
i le tau						
tausaga atoa						

U1 (fa'aauau)

ITUAIGA FIGOTA	AOFA'I O VAEGA E 'AI I LE			AOFA'I O...I LE TAUSAGA		FA'AILOGA O LE FUA O VAEGA FA'AAOGA
	VAIASO	MASINA	TAUSAGA	VAIASO	MASINA	
FAISUA						
i le tau						
tausaga atoa						
MASO						
i le tau						
tausaga atoa						
APALONE						
i le tau						
tausaga atoa						
SIKALO (Scallops)						
i le tau						
tausaga atoa						

U2. Pe fa'afia ona e 'ai i mea'ai (figota) o lo o ta'ua i lalo?

ITUAIGA FIGOTA	AOFA'I O VAEGA E 'AI I LE			AOFA'I O...I LE TAUSAGA		FA'AILOGA O LE FUA O VAEGA FA'AAOGA
	VAIASO	MASINA	TAUSAGA	VAIASO	MASINA	
ULAVAI						
i le tau						
tausaga atoa						
PA'A						
i le tau						
tausaga atoa						
NUFE'E						
i le tau						
tausaga atoa						
TUITUI (VAGA)						
i le tau						
tausaga atoa						
GETI (LOLI)						
i le tau						
tausaga atoa						
ALILI						
i le tau						
tausaga atoa						
ULA SAMI						
i le tau						
tausaga atoa						

U3. O a vaega o mea'ai sami (figota) o lo o ta'ua i lalo e te 'ai ai. Ia atoa le 100% le faitau aofa'i o ituaiga ta'itasi.

ITUAIGA FIGOTA	ATOA	ATOA MA LE MANAVA E VAVAE 'ESE	ATOA MA LE UTE E VAVAE 'ESE	ATOA, UTEMA LE MANAVA E VAVAE 'ESE	AOFA'I 100%
TUGAGE ('ena'ena/uamiti)					**AOFA'I 100%**
TUGAGE UMI (Horse Clams)					**AOFA'I 100%**
TUGAGE MOMOGA (Butter Clams)					**AOFA'I 100%**
TUGAGE MA'AI (Razor Clams)					**AOFA'I 100%**
TUGAGE FAIUTE (Geoduck Clams)					**AOFA'I 100%**
TUGAGE MAKO (Macoma Clams)					**AOFA'I 100%**
PIPI					**AOFA'I 100%**
FAISUA					**AOFA'I 100%**
MASO					**AOFA'I 100%**
APALONE					**AOFA'I 100%**
SIKALO (Scallops)					**AOFA'I 100%**

VAEGA U
E3 (fa'aauau)

ULA VAI	**TINO ATOA (tino ma le ulu)** ___ ___ ___ %	**NA O LE TINO** ___ ___ ___ %	**NA O LE ULU** ___ ___ ___ %	**AOFA'I 100%**
PA'A	**PA'A ATOA (a'ano ma le momoga)** ___ ___ ___%	**NA O LE A'ANO** ___ ___ ___%	**NA O LE MOMOGA** ___ ___ ___ %	**AOFA'I 100%**
NUFE'E	**NUFE'E ATOA** ___ ___ ___ %	**NA O LE A'ANO (tino ma 'ave)** ___ ___ ___ %	----------	**AOFA'I 100%**
TUITUI/VAGA	**TINO ATOA** ___ ___ ___ %	**NA O LE MOMOGA** ___ ___ ___ %	----------	**AOFA'I 100%**
GETI/LOLI	**TINO ATOA** ___ ___ ___ %	**NA O LE A'ANO** ___ ___ ___ %	----------	**AOFA'I 100%**
ALILI	**TINO ATOA** ___ ___ ___ %	**NA O LE A'ANO** ___ ___ ___ %	----------	**AOFA'I 100%**
ULA SAMI	**TINO ATOA (tino ma le ulu)** ___ ___ ___ %	**NA O LE TINO** ___ ___ ___ %	**NA O LE ULU** ___ ___ ___ %	**AOFA'I 100%**

U4. E fa'apefea ona saunia figota o le Vaega U e te 'ai ai? I fa'asologa e lua i lalo, ta'u mai po o a pasene o le taimi e te 'ai ai figota o lo saunia i le auala lava lea. ***FAITAU MUAMUA UIGA UMA O FA'ASOLOGA TA'ITASI *** Ia atoa le 100% le aofa'i o tali uma.

1) Tao, saka i le vai, tunu pa'u, tunu vilivili, fa'avela i le ausa ___ ___ ___ %
2) Tu'u'apa, falai, oka, fa'aasu, pe fa'ala. ___ ___ ___ %

U5. Afai e saka i le vai, fa'aasu pe fa'avela i le ausa se figota o le Vaega U, o le a lau mea e fai i le suavai sa fa'aaogaina?

1) Sasa'a 'ese ___ ___ ___ % 2) Fa'aaoga i kuka ___ ___ ___ % 3) Inu ___ ___ ___ %

U6. I le fa'asologa i lalo, ta'u mai pe fia pasene o figota o le Vaega U e te maua mai: ***FAITAU UMA FA'ASOLOGA*** Ia atoa le 100% le faitau aofa'i o tali uma.

1) i faleoloa mea'ai/faleoloa laiti ___ ___ ___ %
2) e oe, tagata o lou aiga, po o lau uo mai le fagaloa ma ona vaipanoa ___ ___ ___ %
3) e oe, tagata o lou aiga, po o lau uo mai fafo atu o le fagaloa ma ona vaipanoa ___ ___ ___ %
4) i fale'aiga ___ ___ ___ %

VAEGA F

F1. Pe fa'afia ona e 'ai i mea'ai sami (limu) o lo o ta'ua i lalo.

ITUAIGA MEA'AI SAMI	AOFA'I O VAEGA E 'AI I LE			AOFA'I O...I LE TAUSAGA		FA'AILOGA O LE FUA O VAEGA FA'AAOGA
	VAIASO	MASINA	TAUSAGA	VAIASO	MASINA	
LIMU MEAMATA						
i le tau						
i le tausaga						
LIMU POLO ('ena'ena)						
i le tau						
i le tausaga						

F2. I le fa'asologa i lalo, ta'u mai pe fia pasene o mea'ai sami o le Vaega F e te maua mai: ***FAITAU UMA FA'ASOLOGA*** Ia atoa le 100% le faitau aofa'i o tali uma.

1) i faleoloa mea'ai/faleoloa laiti ___ ___ ___ %
2) e oe, tagata o lou aiga, po o lau uo mai le fagaloa ma ona vaipanoa ___ ___ ___ %
3) e oe, tagata o lou aiga, po o lau uo mai fafo atu o le fagaloa ma ona vaipanoa ___ ___ ___ %
4) i fale'aiga ___ ___ ___ %

Pe i ai nisi mea'ai sami (figota ma i'a) e te 'ai ai e le i ta'ua muamua? Ioe ☐ Leai ☐

G1. Pe fa'afia ona e 'ai i.....

ITUAIGA MEA'AI SAMI	AOFA'I O VAEGA E 'AI I LE			AOFA'I O...I LE TAUSAGA		FA'AILOGA O LE FUA O VAEGA FA'AAOGA
	VAIASO	MASINA	TAUSAGA	VAIASO	MASINA	

....FA'ATASIGA LAUTELE....

L1. O fesili nei i lalo o le a fesiligia ai oe i le tulaga o mea'ai sami (figota ma i'a) e te 'ai ai i fa'atasiga lautele. Pe fa'afia ona e auai i aso fa'apitoa (aso malolo, Tausaga Fou a Saina, Tausaga Fou a Sapani, aganu'u po o mea fa'a-le-nu'u, fa'aipoipoga, ma isi..) i le sefulu ma le lua masina taluai? ___ ___ ___ taimi i le sefulu ma le lua masina taluai

L2. Po o a pasene o aso fa'apitoa nei e te 'ai ai mea'ai sami? Ia tali mai i le 0-100%. ___ ___ ___ %

L3. I nei lava fa'atasiga, o le a le tele o mea'ai sami e masani ona e 'aia i taimi ta'itasi? ___ ___ ___ aunese (**FA'AILOGA O LE VAEGA FA'AAOGA:** ___ ___ ___)

L4. Pe fa'afia ona e 'ai i mea'ai sami ia o i lalo i fa'atasiga nei? Ia e tali mai i le 0-100 pasene (%).

FIGOTA (pa'a, tugage, ulavai...) ___ ___ ___ % LIMU/LIMU POLO ___ ___ ___ % I'A ___ ___ ___ %

M1. E fia ou tausaga ___ ___ ___. Afai e te le mana'o e fa'ailoa ou tausaga, ia siaki le vaega o tausaga o lou matua.
18-29 ☐ 30-54 ☐ 55 + ☐

M2. O lou mamafa ___ ___ ___ pauna

M3. O lou maualuga (umi) _____ futu _____ inisi po'o ___ ___ ___ senitimita

M4. O le a le tulaga o lo o i ai lau tupe maua?

☐ 0-10,000 ☐ 10,001-15,000 ☐ 15,001-20,000 ☐ 20,001-25,000
☐ 25,001-35,000 ☐ 35,001-45,000 ☐ 45,000 +

M5. E fia tagata o lo o fa'alagolago i lenei tupe maua?

M6. O le a le maualuga o lau a'oga? ☐ fa'au'u mai le a'oga maualuga ☐ e le i uma le a'oga maualuga
☐ fa'au'u mai le kolisi ☐ e le i uma le kolisi
☐ isi _____

Fa'afetai lava i lou auai mai e tali sapaia lenei fa'amoemoe. O lou auai mai o le a fetufaa'i ai fa'amatalaga taua e mana'omia e fesoasoani i le puipuiga o mea aoga ma saunia e ta'ita'ia ai polokalame o le soifua maloloina lautele mo lou nu'u.

LE TAIMI NA UMA AI LE TALANOAGA: ___ ___:___ ___ ☐ taeao ☐ afiafi

MANATU (FAUTUAGA) O LE NA FAIA LE TALANOAGA:

N1. O le galue fa'atasi a le tali fesili e: ☐ Lelei tele ☐ Lelei ☐ Feoloolo ☐ Leaga

N2. O le aoga o tali a le tali fesili e: ☐ Aoga tele ☐ Fa'alagolago i ai ☐ Fesiligia
☐ Le fa'alagolago i ai

N3. O le a le mafua'aga tonu o le le fa'alagolago i ai pe fesiligia fo'i aoga o tali o le talanoaga?

_____

_____.

N4. O le ituaiga o le tali fesili: Fafine (Tama'ita'i) ☐ Tane (Ali'i) ☐

N5. O isi Manatu:

_____

_____

_____

_____

Appendix R.

Vietnamese Language Questionnaire

Câu hỏi số : | | | |

NGHIÊN CỨU SỰ TIÊU THỤ HẢI SẢN CỦA Á CHÂU VÀ THÁI BÌNH DƯƠNG

Ngày gọi		
1) | | | | thg ngày năm	2) | | | | thg ngày năm	3) | | | | thg ngày năm
Giờ hẹn phỏng vấn		
1) __:__ ☐1am ☐2pm	2) __:__ ☐1am ☐2pm	3) __:__ ☐1am ☐2pm
Kết quả		
1) Phỏng vấn xong ☐1	2) Không đến, hẹn lại ☐2	3) Khác ☐3

Địa điểm phỏng vấn ☐1 Nhà của người được phỏng vấn ☐2 Trung tâm phục vụ người tỵ nạn ☐3 Khu ăn nống ☐4 Khác

Tên chữ viết tắt của người được phỏng vấn

Người phỏng vấn số | | | |

Hướng dẫn

Chào bạn. Tôi tên là ..... và tôi là (dân tộc). Chúng tôi muốn tìm hiểu về những cách dùng hải sản của (dân tộc) trong khu vực Quận King. Tin tức trả lời cho bản phỏng vấn này sẽ giúp cho cộng-Đồng Á Châu và Thái Bình Dương tìm hiểu tỷ lệ tiêu thụ hải sản, các phương cách nấu nướng và biến chế của các hải sản thường dùng. Mọi tin tức cung cấp cho cuộc phỏng vấn này là có tính cách tự nguyện và giữ kín. Những câu trả lời của bạn sẽ được hợp dụng với những câu trả lời của những người khác vì vậy không có câu trả lời riêng của một người nào được nhận diện.

Ngày phỏng vấn | | | | Giờ bắt đầu phỏng vấn : __ ☐1am ☐2pm
thg ngày năm

Tôi sẽ hỏi bạn vài câu hỏi để xác định bạn thuộc về nhóm nào mà chúng tôi nghiên cứu.

a) Có phải bạn sống trong quận King không? Có ☐1 không ☐2 (IF NO, TERMINATE INTERVIEW)

b) Bạn có ăn các loại hải sản không? Có ☐1 không ☐2 (IF NO, TERMINATE INTERVIEW)

c) Bạn thuộc dân tộc nào dưới đây. Chỉ chọn một.

Phi Luật Tân ☐1 Nhật ☐2 Đại hàn ☐3 Trung quoc ☐4 Việt nam ☐5

Lào ☐6 Miêu ☐7 Dân Hmong ☐8 Dân Samoan ☐9 Cao miên ☐10

d) Bạn có phải sanh ở Mỹ không? Có ☐1 không ☐2

(Nếu không, bạn đã ở Mỹ bao nhiêu năm?) 0-5 ☐1 6-10 ☐2 11-20 ☐3 21+ ☐4

e) Cha mẹ của bạn có người nào sanh ở Mỹ không? Có ☐1 không ☐2

f) Có phải cha mẹ của bạn sanh ở Mỹ không? Có ☐1 không ☐2

(TERMINATE INTERVIEW IF BOTH "D", "F" ARE YES)

g) Bạn ít nhất là 18 tuổi không? Có ☐1 Không ☐2 (IF NO, TERMINATE INTERVIEW)

1. Tôi sẽ hỏi bạn về những loại hải sản bạn ăn, bạn ăn bao nhiêu, bao lâu thì bạn lại ăn những hải sản đó

Số lượng hải sản bạn ăn và bao lâu bạn ăn, tùy thuộc vào thời gian trong năm. Thí dụ, nếu có sự thay đổi mùa thì bao lâu bạn ăn hải sản lại. Vui lòng trả lời 2 cách khác nhau: khi còn tươi và sẵn sàng để xử dụng, khi hải sản bị đông lạnh, phơi khô, đóng hộp, tồn trữ v.v. Vui lòng trả lời những câu hỏi theo cách thông dụng nhất đối với bạn. Chỉ nhớ bao gồm: điểm ___, ăn trưa, ăn tối và ăn đêm. Đừng bao gồm những hải sản bạn ăn trong những buổi lễ đặc biệt (ngày lễ, tết, tết Nhật, cưới hỏi, hội họp của cộng đồng v.v) Những điều này sẽ được hỏi sau.

--- FILL OUT CONSUMPTION FORM --- SHOW PORTION MODEL, PICTURE CARD ---

GROUP A

A1. Bạn có thường ăn những hải sản dưới đây ...

LOẠI CÁ	SỐ LƯỢNG PHẦN ĂN CHO			SỐ LƯỢNG CHO...MỘT NĂM		PORTION SIZE CODE
	TUẦN	THÁNG	NĂM	NHIỀU TUẦN	NHIỀU THÁNG	
CÁ HỒI						
Trong mùa						
NGOÀI mùa						
TRỨNG CÁ HỒI						
trong mùa						
NGOÀI mùa						
CÁ HƯỚNG						
trong mùa						
NGOÀI mùa						
CÁ ĐỐI						
trong mùa						
NGOÀI MÙA						

--- **SHOW PORTION MODEL and PICTURE CARD** ---

A2. Tôi sẽ hỏi bạn, về bạn ăn phần nào của con cá trong nhóm A. Bạn vui lòng cho biết tỷ lệ thời lượng lớn bao nhiêu khi bạn dùng các loại cá trong nhóm A sau đây. ĐỌC TẤT CẢ các SỰ XẾP LOẠI TRƯỚC - VUI LÒNG TRẢ LỜI 0 - 100%. TỔNG CỘNG CÂU TRẢ LỜI 1 & 2 BẰNG 100%.

A2.
1) Nạc với da cá: ___%
2) Nạc cá không da ___% (1 & 2 total 100%)
3) Đầu, xương, trứng, lòng ___% (0-100%)

A3. Tôi sẽ hỏi bạn loại cá nhóm A bạn ~~dùng~~ chế biến ra sao? Bạn vui lòng cho biết tỷ lệ thời lượng ăn loại cá nhóm A biến chế theo cách sau

---READ ALL CATEGORIES FIRST---Please answer 0-100%. **Answers 1 & 2 must total 100%.**

1) Bỏ lò, luộc, nướng, quay, hầm, chưng ___%
2) Đóng hộp, rán, sống, hun khói, phơi khô: ___% (1 & 2 must total 100%)

A4. Nếu bạn luộc, chưng, hầm các loại cá trong nhóm A, thì nước nấu cá bạn dùng làm gì?

1) Bỏ đi ___% 2) Dùng để nấu ăn ___% 3) nông ___%

A5.
Theo các cách dưới đây, bạn vui lòng phỏng đoán tỉ lệ bạn dùng cá trong nhóm A mà bạn có tới.

---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Tiệm thực phẩm / bán ngoài đường ___%
2) Cá ở vùng Puget Sound và vùng phụ cận do chính bạn, gia đình, bạn bè đánh bắt. ___%
3) Cá ở ngoài vùng Puget Sound và vùng phụ cận do chính bạn, gia đình, bạn bè đánh bắt. ___%
4) Các nhà hàng ăn ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP B

B1. Bạn có thường ăn những loại cá dưới đây:

LOẠI CÁ	SỐ LƯỢNG CỦA PHẦN ĂN CHO			SỐ LƯỢNG CHO...MỖI NĂM		PORTION SIZE CODE
	TUẦN	THÁNG	NĂM	NHIỀU TUẦN	NHIỀU THÁNG	
CÁ BỐNG MÚ						
trong mùa						
NGOÀI MÙA						
CÁ NHÁM						
trong mùa						
NGOÀI MÙA						
CÁ SNAPPER						
trong mùa						
NGOÀI MÙA						
CÁ TUYẾT						
trong mùa						
NGOÀI MÙA						
CÁ NỤC						
trong mùa						
NGOÀI MÙA						
CÁ THU						
trong mùa						
NGOÀI MÙA						

(continuation of B1)

GROUP B

LOẠI CÁ	SỐ LƯỢNG CỦA PHẦN ĂN CHO			SỐ LƯỢNG CHO..NĂM		PORTION SIZE CODE
	TUẦN	THÁNG	NĂM	NHIỀU TUẦN	NHIỀU THÁNG	
CÁ ROCKFISH						
trong mùa						
NGOÀI MÙA						
CÁ TRÍCH						
trong mùa						
NGOÀI MÙA						

B2.
Tôi sẽ hỏi bạn về phần nào của con cá trong nhóm B mà bạn ăn. Bạn vui lòng cho biết tỷ lệ thời lượng là bao nhiêu khi bạn ăn các loại cá trong nhóm B. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) Nạc với da cá: ___%
2) Nạc cá không có da ___% **(1 & 2 must total 100%)**
3) Đầu, xương, trứng, tạng ___% **(0-100%)**

B3.
Tôi sẽ hỏi bạn loại cá nhóm B bạn dùng chế biến ra sao. Theo 2 nhóm cách dưới đây, bạn vui lòng cho biết tỷ lệ thời lượng bạn ăn cá nhóm B biến chế theo cách ~~này~~ sau. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.**

1) Bỏ lò, luộc, nướng, quay, hầm, chưng: ___%
2) Đóng hộp, rán, sống, hun khói hoặc phơi khô ___%

B4. Nếu bạn luộc hoặc chưng những loại cá trong nhóm B, thì nước nấu cá bạn dùng làm gì?

1) Bỏ đi ___% 2) Dùng để nấu ___% 3) Uống ___%

B5. Theo những loại dưới đây, bạn vui lòng phỏng đoán tỷ lệ bạn dùng cá trong nhóm B mà bạn có: ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Tiệm Thực phẩm, bán ngoài đường ___%
2) Cá ở Puget Sound và vùng phụ cận, do chính bạn, gia đình, bạn bè đánh bắt ___%
3) Cá ở ngoài vùng Puget Sound và vùng phụ cận, do chính bạn, gia đình, bạn bè đánh bắt ___%
4) Các nhà hàng ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP C

C1. Bạn có thường ăn những hải sản dưới đây...

LOẠI CÁ	SỐ LƯỢNG CỦA PHẦN ĂN CHO			SỐ LƯỢNG CHO...NĂM		PORTION SIZE CODE
	TUẦN	THÁNG	NĂM	NHIỀU TUẦN	NHIỀU THÁNG	
CÁ BÔNG LAO						
trong mùa						
NGOÀI MÙA						
CÁ BỐNG						
trong mùa						
NGOÀI MÙA						
CÁ CHẾP						
trong mùa						
NGOÀI MÙA						

(continuation of C1)

GROUP C

LOAI CÁ	SỐ ~~LẦN~~ lượng CỦA PHẦN ĂN CHO			SỐ ~~LẦN~~ lượng CHO...NĂM		PORTION SIZE CODE
	TUẦN	THÁNG	NĂM	NHIỀU TUẦN	NHIỀU THÁNG	
CÁ PERCH						
Trong mùa						
NGOÀI MÙA						
CÁ PHI						
trong mùa						
NGOÀI MÙA						
CÁ NƯỚC						
trong mùa						
NGOÀI MÙA						

C2. Tôi sẽ hỏi bạn về bạn ăn phần nào của cá trong nhóm C. Bạn vui lòng cho biết tỷ lệ thời lượng là bao nhiêu khi bạn ăn các loại. ---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.** các trong nhóm C.

1) Nạc với da cá: ___%
2) Nạc cá không da ___% **(1 & 2 must total 100%)**
3) Đầu, xương, trứng, tạng: ___% **(0-100%)**

C3. Tôi sẽ hỏi bạn loại cá nhóm C, bạn dùng chế biến ra sao. Bạn vui lòng cho biết tỷ lệ thời lượng ăn các loại cá trong nhóm C biến chế theo cách này. ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.**

1) Bỏ lò, luộc, nướng, quay, hầm, chưng ___%
2) Đóng hộp, rán, sống, hun khói, phơi khô. ___%

C4. Nếu bạn luộc hoặc hấp những loại hải sản trong nhóm C, thì nước nấu đó bạn dùng làm gì?

1) Bỏ đi ___% 2) Dùng để nấu ___% 3) Uống ___%

C5. Theo các phân loại dưới đây, bạn vui lòng phỏng đoán tỷ lệ bạn dùng cá trong nhóm C--READ ALL CATEGORIES--- **Answers must total 100%.**

1) Tiệm Thực phẩm / bán ngoài đường ___%
2) Cá ở vùng Puget Sound và vùng lân cận, mà bạn, gia đình hoặc bạn bè đánh bắt được ___%
3) Cá ở ngoài vùng Puget Sound và vùng lân cận, mà bạn, gia đình hoặc bạn bè đánh bắt ___%
4) Cá nhà hàng ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

Group D

D1. _____ ...

LOẠI CÁ	SỐ LƯỢNG CỦA PHẦN ĂN CHO			SỐ LƯỢNG CHO...NĂM		PORTION SIZE CODE
	TUẦN	THÁNG	NĂM	NHIỀU TUẦN	NHIỀU THÁNG	
CÁ HALIBUT						
trong mùa						
NGOÀI MÙA						
CÁ NGỪ						
trong mùa						
NGOÀI MÙA						
CÁ VƯỢC						
trong mùa						
NGOÀI MÙA						

(continuation of D1)

GROUP D

LOẠI CÁ	SỐ LƯỢNG PHẦN ĂN CHO			SỐ LƯỢNG CHO ..1 NĂM		PORTION SIZE CODE
	TUẦN	THÁNG	NĂM	NHIỀU TUẦN	NHIỀU THÁNG	
CÁ ONG (Nhỏ)						
trong mùa						
NGOÀI MÙA						

D2. Tôi sẽ hỏi bạn về bao ăn phần nào của con cá trong nhóm D. Bạn vui lòng cho biết tỷ lệ thời lượng là bao nhiêu khi bạn dùng các loại trong nhóm D:---READ ALL CATEGORIES FIRST--- **Please answer from 0-100%. Answers 1 & 2 must total 100%.**

1) Nạc cá & da cá : ___%
2) Nạc cá không da ___% **(1 & 2 must total 100%)**
3) Đầu, xương, trứng, tạng : ___% **(0-100%)**

D3. Tôi sẽ hỏi bạn loại cá nhóm D bạn dùng chế biến ra sao. Bạn vui lòng cho biết tỷ lệ thời lượng ăn loại cá trong nhóm D biến chế theo cách sau ---READ ALL METHODS FOR EACH CATEGORY FIRST--- **Answers must total 100%.**

1) Bỏ lò, luộc, Nướng, Quay, Hầm, Chưng ___%
2) Đóng hộp, Rán, Sống, Hun khói, Phơi khô ___%

D4. Nếu bạn luộc, hấp những hải sản trong nhóm D, thì nước nấu đó bạn dùng làm gì? ?

1) Bỏ đi ___% 2) Dùng để nấu ___% 3) Uống ___%

D5. Theo các phân loại dưới đây, bạn vui lòng phỏng đoán tỷ lệ bạn dùng cá trong nhóm D mà bạn có thể. ---READ ALL CATEGORIES---
Answers must total 100%.

1) Tiện thực phẩm / bán ngoài đường ___%
2) Cá ở vùng Puget Sound và vùng phụ cận mà chính bạn, gia đình, bạn bè đánh bắt ___%
3) Cá ở ngoài vùng Puget Sound và vùng phụ cận mà chính bạn, gia đình, bạn bè đánh bắt ___%
4) Các Nhà Hàng ___%

--- SHOW PORTION MODEL, PICTURE CARD ---

GROUP E

E1. Bạn có thường ăn những loại dưới đây...

LOÀI ĐỘNG VẬT CÓ VỎ CỨNG	SỐ LƯỢNG CỦA PHẦN ĂN CHO			SỐ LƯỢNG CHO... NĂM		PORTION SIZE CODE
	TUẦN	THÁNG	NĂM	NHIỀU TUẦN	NHIỀU THÁNG	
SÒ (manila/littleneck)						
trong mùa						
ngoài mùa						
CÁ NGỪA						
trong mùa						
ngoài mùa						
SÒ RAZOR						
trong mùa						
ngoài mùa						
SÒ BUTTER						
trong mùa						
ngoài mùa						

(continuation of E1)

Group E

LOẠI CÁ	SỐ LẦN CỦA PHẦN ĂN CHO			SỐ LẦN CHO... NĂM		PORTION SIZE CODE
	TUẦN	THÁNG	NĂM	NHIỀU TUẦN	NHIỀU THÁNG	
SÒ (có vỏ dai)						
trong mùa						
NGOÀI MÙA						
SÒ MAOMA						
trong mùa						
NGOÀI MÙA						
SÒ HUYẾT						
TRONG mùa						
NGOÀI MÙA						
HÀO						
trong mùa						
NGOÀI MÙA						
HẾN						
trong mùa						
NGOÀI MÙA						
BÀO NGƯ						
trong mùa						
NGOÀI MÙA						
GẦN ỐC						
trong mùa						
NGOÀI MÙA						

--- SHOW PORTION MODEL, PICTURE CARD ---

E2. Bạn có thường ăn những loại dưới đây...

LOÀI ĐỘNG VẬT CÓ VỎ CỨNG	SỐ LƯỢNG CỦA PHẦN ĂN CHO			SỐ LƯỢNG CHO ...MỘT NĂM		PORTION SIZE CODE
	TUẦN	THÁNG	NĂM	NHIỀU TUẦN	NHIỀU THÁNG	
TÔM						
trong mùa						
ngòai mùa						
CUA						
trong mùa						
ngòai mùa						
CON MỰC						
trong mùa						
ngòai mùa						
HẢI BIỂN						
trong mùa						
ngòai mùa						
HẢI SÂM						
trong mùa						
ngòai mùa						
ỐC BƯƠU						
trong mùa						
ngòai mùa						
TÔM HÙM						
TRONG MÙA						
ngòai mùa						

--- SHOW PORTION MODEL and PICTURE CARD ---

E3.Bạn ăn phần nào của những loại dưới đây. Percentages for each species must total 100%.

LOÀI	TOÀN BỘ (nguyên con)	Nguyên con bỏ bao tử	Nguyên con bỏ vòi (tua)	Nguyên con bỏ tua và bao tử	TOTAL 100%
SÒ (manila/littleneck)					TOTAL 100%
CÁ NGỰA					TOTAL 100%
Sò Butter					TOTAL 100%
Sò RAZOR					TOTAL 100%
ỐC(có vòi dài)					TOTAL 100%
Sò MACOMA					TOTAL 100%
SÒ HUYẾT					TOTAL 100%
HÀO					TOTAL 100%
HẾN					TOTAL 100%
BẠO NGƯ					TOTAL 100%
CẦN ỐC					TOTAL 100%

(continuation of E3)

Group E

TÔM	Nguyên con tôm (đầu & thân) %	chỉ có thân %	Chỉ có đầu %	TOTAL 100%
CUA	Nguyên con cua (thịt cua & gạch cua) %	chỉ có thịt %	chỉ gạch cua %	TOTAL 100%
MỰC	Nguyên con mực ___%	chỉ thịt (thân & tua) ___%	----------	TOTAL 100%
HẢI BIÊN	Nguyên con %	chỉ có trứng %	----------	TOTAL 100%
HẢI SÂM	Nguyên con %	chỉ có gân %	----------	TOTAL 100%
ỐC BƯƠU	THÂN Nguyên con %	GÂN %	----------	TOTAL 100%
TÔM HÙM	Nguyên con THÂN TÔM (MÌNH & đầu) %	thân %	đầu %	TOTAL 100%

E4. Tôi sẽ hỏi bạn những loại hải sản bạn ăn trong nhóm E được chế biến ra sao. Theo 2 sự phân loại dưới đây bạn vui lòng cho biết tỷ lệ số lượng các hải sản trong nhóm E chế biến theo cách này sau. ---READ ALL METHODS FOR EACH CATEGORY FIRST-- **Answers must total 100%.**

1) Bỏ lò, luộc, nướng, quay, hấm và chưng ___%
2) Đóng hộp, rán, sống, hun khói hoặc phơi khô ___%

E5. Nếu bạn luộc hoặc chưng các loại (tôm, cua, sò, hến) hải sản trong nhóm E, thì nước đó bạn dùng làm gì?

1) Bỏ đi ___ ___ ___% 2) Dùng để nấu ___ ___ ___% 3) Uống ___ ___ ___%

E6 Theo phần loại sau đây bạn hãy ước lượng tỷ lệ phần trăm loại (tôm, cua, sò, hến) thuộc nhóm E mà bạn có được ăn ---READ ALL CATEGORIES--- **Answers must total 100%.**

1) Tiệm thực phẩm, bán ngoài đường ___ ___ ___%
2) Tôm, cua, sò, hến do chính bạn, gia đình hoặc bạn bè đánh bắt ở vùng Puget Sound, vùng lân cận ___ ___ ___%
3) Tôm, cua, sò, hến do bạn, gia đình hoặc bạn bè đánh bắt ở ngoài vùng Puget Sound, vùng lân cận ___ ___ ___%
4) Các nhà hàng ___ ___ ___%

--- SHOW PORTION MODEL and PICTURE CARD ---

GROUP F

F1. Bạn có thường dùng những loại hải sản dưới đây.

LOẠI HẢI SẢN	SỐ LẦN CỦA PHẦN ĂN CHO			SỐ LẦN CHO ... NĂM		PORTION SIZE CODE
	TUẦN	THÁNG	NĂM	NHIỀU TUẦN	NHIỀU THÁNG	
TÁO BIỂN						
TRONG MÙA						
NGOÀI MÙA						
TÁO NÂU (bẹ)						
TRONG MÙA						
NGOÀI MÙA						

F2. Theo sự phân loại dưới đây, bạn vui lòng phỏng đoán tỷ lệ hải sản trong nhóm F mà bạn có được ăn. ---READ ALL CATEGORIES-- **Answers must total 100%.**

1) Tiệm thực phẩm / bán ngoài đường ___%
2) Hải sản ở vùng Puget sound và vùng lân cận mà bạn, gia đình, bạn bè đánh bắt ___%
3) Hải sản ở ngoài vùng Puget Sound và vùng lân cận mà bạn, gia đình, bạn bè đánh bắt ___%
4) Các nhà hàng ăn ___%

Có các loại hải sản nào bạn dùng mà không ghi ở đây? ☐ 1 có ☐ 2 không (If no, go to H1)

G1. Bạn có thường ăn ..

LOẠI HẢI SẢN	SỐ LƯỢNG CỦA PHẦN ĂN CHO			SỐ LƯỢNG CHO...NĂM		PORTION MODEL CODE
	TUẦN	THÁNG	NĂM	Nhiều tuần	nhiều tháng	

---SOCIAL EVENTS ---

H1. Những câu hỏi sau đây sẽ hỏi về mức ăn của bạn trong những dịp lễ lớn. Trong 12 tháng vừa qua, bạn tham dự những buổi lễ đặc biệt bao nhiêu lần (buổi lễ, tết, tết nhất, các buổi họp mặt của cộng đồng, cưới hỏi...) ___ lần trong 12 tháng qua (If 0, go to no. I 1)

H2. Bao nhiêu phần trăm các buổi lễ bạn dùng hải sản? Please answer from 0-100% ___% (If answer is 0, go to I 1)

---SHOW PORTION MODEL and PICTURE CARD ---

H3. Trong các buổi liệc (lễ) bạn thường dùng bao nhiêu hải sản mỗi lần? ___oz.(PORTION MODEL CODE: __)

H4. Bao lâu thì bạn dùng các loại hải sản dưới đây cho các buổi liệc lễ? You may answer from 0-100%.

TÔM, CUA, SÒ, HẾN ___% RONG BIỂN / TẢO BẸ ___% CÁ ___%

I1. Vui lòng cho biết tuổi bạn ___. Nếu bạn không thể nói rõ, xin cho biết bạn ở lứa tuổi nào?

18-29 ☐1 30-54 ☐2 55 + ☐3

I2. Cho biết trọng lượng của bạn ___ lbs. OR ___ kg.

I3. Cho biết chiều cao của bạn ___ feet ___ inches OR ___cm.

I4. Thâu nhập mỗi năm của gia đình bạn là bao nhiêu?

☐1 0-10,000 ☐2 10,001-15,000 ☐3 15,001-20,000 ☐4 20,001-25,000

☐5 25,001-35,000 ☐6 35,001-45,000 ☐7 45,001 +

I5. Bao nhiêu người được nuôi sống bằng tổng thu nhập này? ___

I6. Xin cho biết trình độ học vấn. ☐1 Học xong trung học ☐2 Chưa xong trung học

☐3 Học xong cao đẳng ☐4 Chưa học xong cao đẳng ☐5 khác ___

CONCLUSION

Cảm ơn sự hợp tác của bạn trong buổi tham khảo này. Sự tham gia của bạn sẽ đóng góp những tin tức quan trọng cần thiết để bảo vệ tài nguyên thiên nhiên của bạn và hướng dẫn các chương trình công cộng của Cộng đồng bạn.

NOTE TIME INTERVIEW ENDS: __:__ ☐ 1 am ☐ 2 pm

INTERVIEWER REMARKS

J1. Respondent's cooperation was: ☐ 1 Very good ☐ 2 Good ☐ 3 Fair ☐ 4 Poor

J2. The quality of respondent's answers were: ☐ 1 High quality ☐ 2 Generally reliable ☐ 3 Questionable ☐ 4 Unreliable

J3. What was the main reason for the questionable or unreliable quality of the interview?

_____

J4. Respondent's Gender Female ☐ 1 Male ☐ 2

J5. Further comments:

_____

_____