IPE and a multi-pronged approach to addressing health disparities in a hard to reach population

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Overview of Marshallese Community History

- Marshallese in Arkansas
  - ~10,000-15,000 Marshallese in Arkansas
  - Largest Marshallese population in the continental US
- Marshallese History
  - From 1946 through 1958, the US military tested nuclear weapons
  - Tests were equivalent to 7,200 Hiroshima-sized bombs
  - The largest test, carried out on March 1, 1954, had a yield of 15 megatons (over 1,000 times the strength of the bomb dropped on Hiroshima) and exposed Marshall Islanders to significant levels of nuclear radiation
  - US missile defense and missile testing program currently leases 12 islands in the Republic of the Marshall Islands and is home to the Ronald Reagan Ballistic Missile Defense Test Site located on Kwajalein Atoll
  - Compact of Free Association in 1986 allows Marshallese to live, work, and study without a visa or permanent resident card

Geographic Location of the Marshall Islands

US Marshallese Health Disparities

- Disproportionately high rates of diabetes
  - 25% to 50% for Marshallese adults compared to 8.3% for the US population and 4% worldwide.
- Disproportionately high rates of infectious disease
  - ~10-16% of the Marshallese population is infected with chronic HBV (positive for hepatitis B surface antigen or HBsAg).
  - 10.4% of pregnant Marshallese women in Arkansas have chronic HBV, in stark contrast to a prevalence of 0.1% in the general population.
  - Hansen's disease has been eradicated in much of the world (<1 per 10,000), yet Marshallese have the highest rates of Hansen's disease in the world (~11 per 10,000).
  - Arkansas has the most cases of Marshallese with Hansen's disease in the US with 46 cases among a population of ~10,000 Marshallese in Arkansas.
- Marshallese mothers in the US also have high rates of low birth weight babies (8.4%) and preterm births (18.8%)
  - Marshallese individuals often postpone health care services until their disease or condition reaches a crisis stage.

Restricted access to health care worsens health disparities

- In 1996, as part of welfare reform, Marshallese and other COFA migrants were excluded from Medicaid and Children's Health Insurance Program (CHIP).
- Benefits incrementally restored for other legal immigrants However, the Marshallese continue to be excluded.
- Many Marshallese individuals lack access to even the most basic health care services.
- Affordable Care Act expanded health care coverage for many, but COFA migrants are not included in Medicaid expansion.

Lack of research in Marshallese and Pacific Islander groups

- Pacific Islanders (including the Marshallese) are among the fastest growing racial groups in the United States, increasing 40 percent between 2000 and 2010.
- Pacific Islanders remain underrepresented in health research within the United States.
- Available research is obscured in aggregated data on Asian Americans and Pacific Islanders.
- Lack of research makes it difficult to obtain health program funding.

Integrating Research, Outreach, and Care with IPE for students and faculty

Desire for UAMS to take action:

"We know we are sick; we know we are dying. We don't need research to tell us we are sick. We want you to work with us to do something about it. We want to see change! We want to be able to go to the doctor, and we want to be healthy. We want our children to be healthy; we want our elders to live a long life."

Desire to be heard:

"We told you we wanted to do diabetes and you helped us do[research on] diabetes. We told you we needed health workers and you wrote a grant to try and get them. You told us you would listen, and you did."

Research

- Broad Community Needs Assessment conducted by an interprofessional team of students and faculty
- Several Qualitative and Quantitative pilots
- Co-developed a family model of diabetes self-management education based on the collectivist, family values of the Marshallese (PCORI funded)

Outreach

- IPE Outreach (with research and health assessments) in churches and worksites
  - Biometric and survey screenings in Marshallese churches and worksites to help document community health care needs. Referral to services after the screenings
  - Work with local nonprofits to improve access to health foods

Care

- Student led clinic provides diabetes care
- Cultural and health literacy training for all local providers, faculty, and students
- Promote the use of Community Health Workers

Students' Perspectives

- Qualitative focus groups were conducted with 50 student participants from various disciplines

Students reported:

- change in knowledge
- change in feelings
- change in behavior

Related to both patients and students from other professions

Change in Knowledge

"Recognizing that you have biases is probably the first step with coming to terms with that. You need to put those aside to do what's best for your patient."

"This whole experience has really opened my eyes to this culture. Some of the people I hear say well why do they live here? I say well we did that [nuclear testing] to them…[and it] is part of my duty as a nurse practitioner to learn how to treat this culture and how to do it as effectively as possible…I think I was more close-minded before this. It has made me see the bigger picture."

Change in Knowledge

"It was really interesting to see the different things that they [other professions] brought to the table. I found most valuable, getting some inside knowledge on what the other medical professionals were actually learning."

"The awareness of the abilities of the other practices... the awareness that we don't have to do it all ourselves...that we can...consult with other [professions]."

Change in Feelings

"You're not going to understand all the other cultures, but when something happens that's really off, you can take a step back and say, 'Am I missing something?,' 'Do I need to learn more about this culture before I get frustrated at this patient for being this way?'"

"You know you did not meet a lot of their social needs" using the example of "a patient who eats once a day…it is so concerning. You [talk] to them about these healthy foods that we all know are much more expensive… [but] that may not even be an option for these people."

Change in Feelings

Students also reported changes in how they related to students in the other professions. Participants reported that the program made them "feel more like a team" when they worked together, and that "you see what pharmacy does, that they're not just pill counters, and to see their knowledge base. . . .it just makes you feel like more of a team."

"I think it just gives you a different attitude towards the rest of the health care team. So, if you spend time working with [other professions], you know how to interact with them, you know more about what they bring to the table. They know more about what you bring to the table, so when you're in a hospital, you just know how to communicate with them better."

Change in Behavior

"Makes you think, you know, makes you approach them [the patient] instead of a piece of paper and say, this [test] would tell me they have high blood sugar, what else would tell me that?"

"Who doesn't understand what I'm saying and I'm speaking in the simplest medical terms that I can. But, we're still not getting through, so figuring how to go around that, how to get past that barrier."

"What we learn, we can teach to others. We practice it, and people will see that."

Thank you

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