



Influenza Vaccination

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Background

- American Indian/Alaska Native (AI/AN) people are at higher risk for influenza-related complications compared to U.S. Whites:
 - Pneumonia and influenza-related mortality 1.5 to 4 times higher ¹
 - Mortality from 2009 H1N1 influenza 4 times higher ²
- 2010-2011 ACIP Influenza Vaccine recommendations
 - AI/AN people as a high risk group

1. IHS. Trends in Indian Health 2002-2003. Available at: <http://www.ihs.gov>

2. CDC. MMWR 2009;58:1341-4.

Lessons Learned from H1N1

The Harvard Opinion Research Program Poll

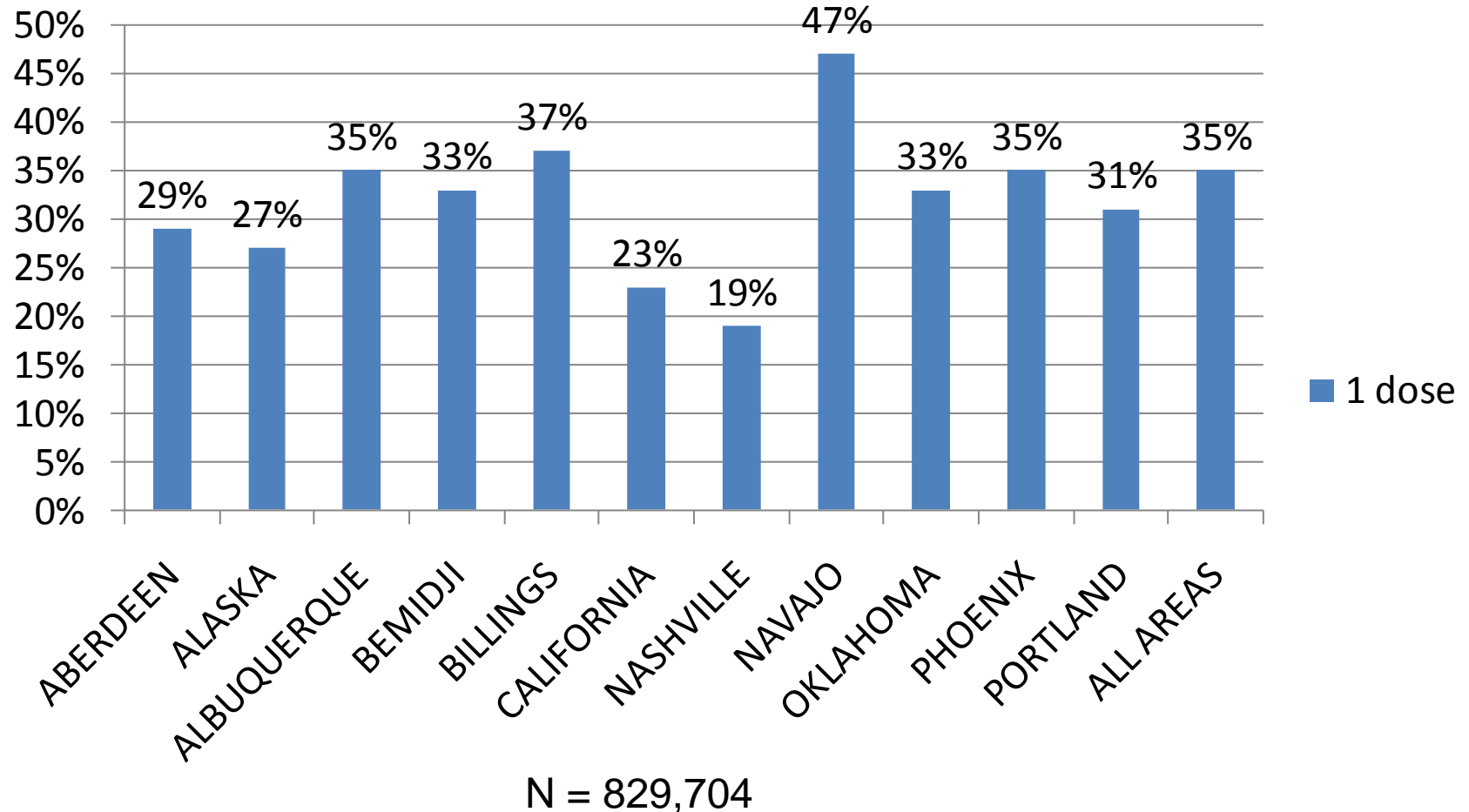
- 24% of AI/AN people concerned that they might get H1N1*
- Majority adopted multiple prevention behaviors*
- 87% said H1N1 vaccine safe or very safe
- 33% didn't get vaccine because of safety concerns
 - Mistrust of pharmaceutical companies (26%)
 - Flu is treatable (18%)
- Traditional media (TV, newspapers, radio) more important than websites
 - <30% reported websites as a source of H1N1 information
 - 43% reported no internet connection

* Significantly higher compared to white Americans

2010 – 2011 Coverage Methods

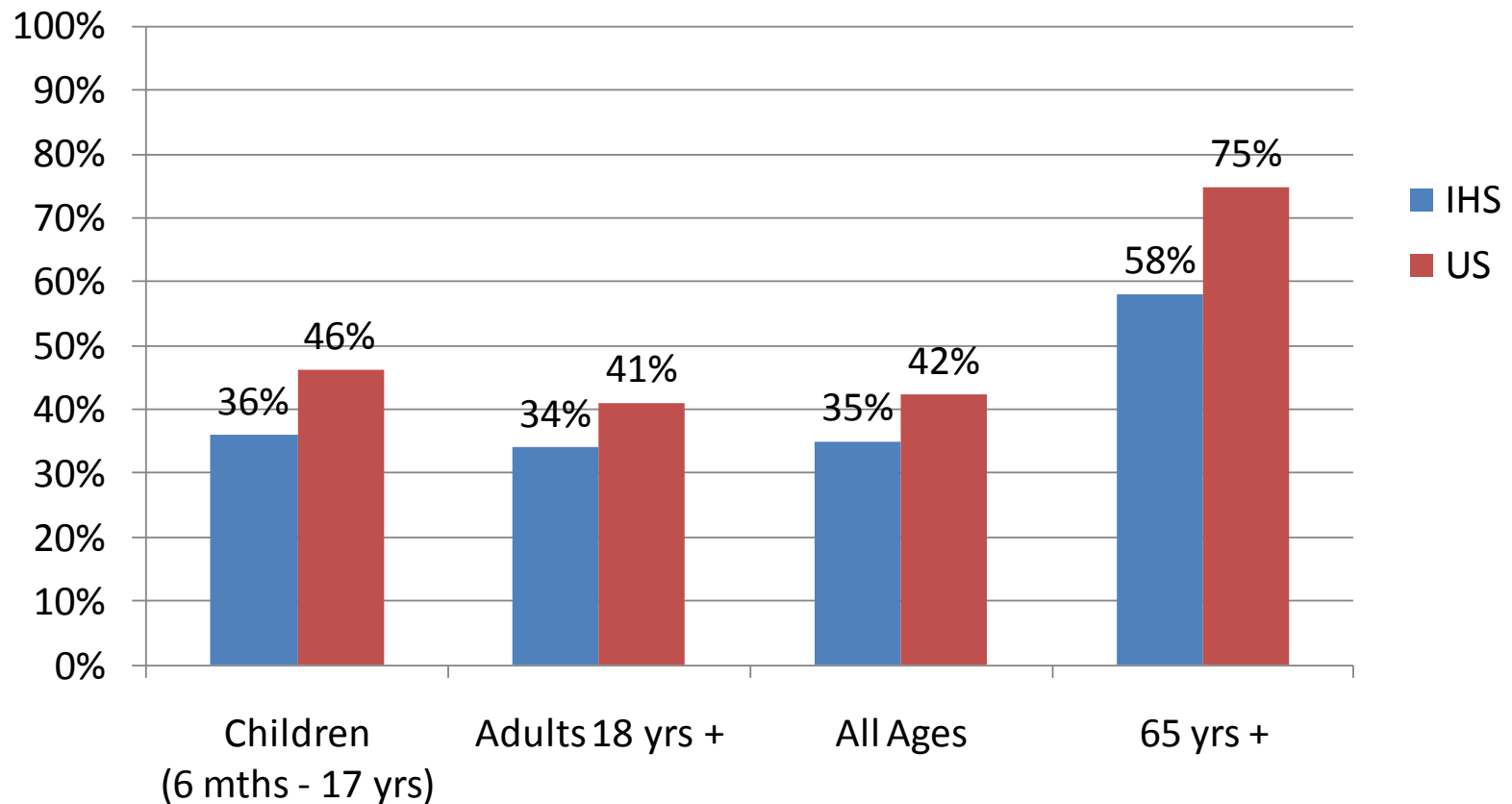
- IHS estimates based on the IHS Electronic Health Record
 - Represent doses actually administered
 - Limited to AI/AN people served by IHS-funded facilities
 - Data through March 31st, 2010
- U.S. population estimates based on March National Flu Survey
 - Telephone survey
 - Vaccine status based on self-report

2010-2011 Influenza Vaccine Coverage All Ages, by IHS Region



2010-2011 Influenza Vaccine Coverage

IHS vs. U.S. as of March 2011



Sources: IHS Data – Indian Health Service, Division of Epidemiology
U.S. Data – CDC March National Flu Survey

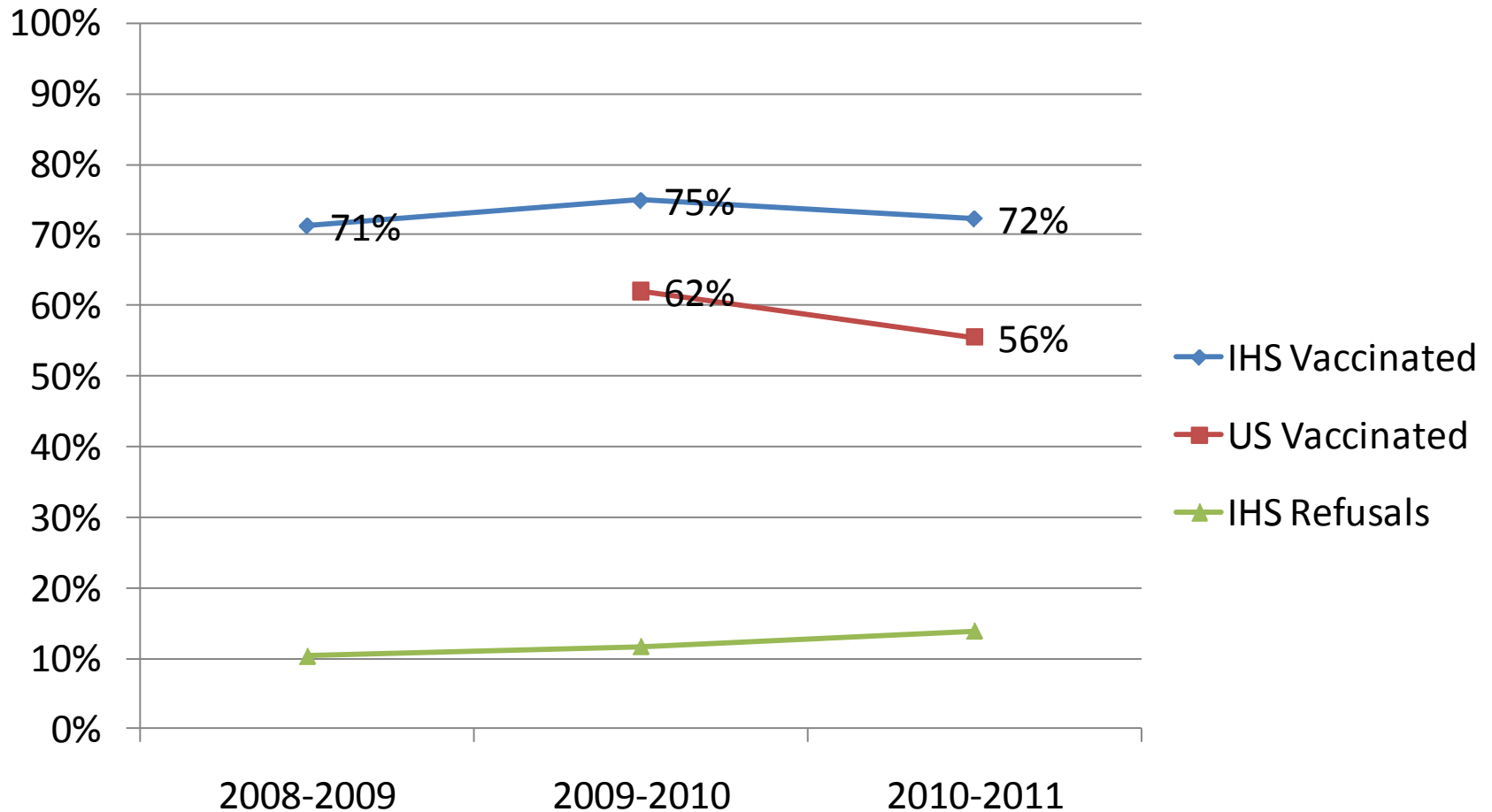
Conclusions

- For 2010-2011, influenza vaccine coverage among AI/AN patients served by I/T/U facilities was lower than U.S. estimates
 - Differences in methodology (administered vs. self-report) may account for some of this
 - Low coverage among 65+ years a concern
- Considerable regional variation in flu coverage
 - Geographic/population differences

Results – Coverage among HCP

- Data were collected from all 12 IHS Regions
 - 188 facilities
 - 29,092 HCP (~ 77% of total HCP)
- Overall HCP coverage for all facilities types: 72.3%
 - Regional Range: 60.9% - 82.5%
- Coverage varied by facility type
 - IHS facilities: 77.3%
 - Tribal facilities: 69.0%
 - Urban Indian facilities: 52.6%

HCP Seasonal Influenza Vaccine coverage 2008 - 2011



IHS H1N1 vaccine coverage – 61.7%

U.S. H1N1 Vaccine Coverage – 37.1%

Reasons for HCP Refusal

- Concern could get flu from vaccine (24%)
- Do not consider themselves at risk/not a serious disease (23%)
- Concerns about vaccine safety (23%)
- Concerns about Efficacy (9%)
- Not Convenient (4%)



Influenza Education/Outreach: Examples from Alaska

Rosalyn Singleton MD MPH

Immunization Program

Alaska Native Tribal Health Consortium

907-729-3418 FAX 907-729-3460

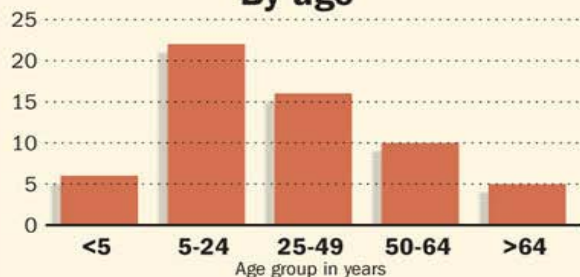
ris2@cdc.gov



Anchorage residents hospitalized for swine flu

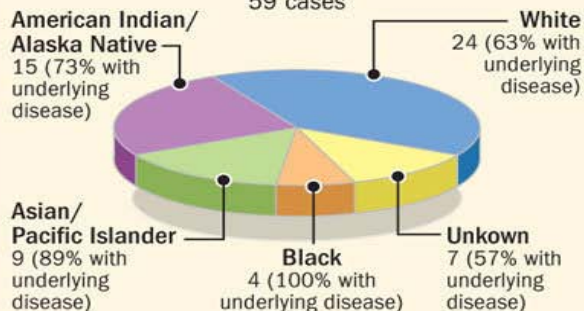
In Anchorage Sept. 1 - Oct. 21, 2009

By age



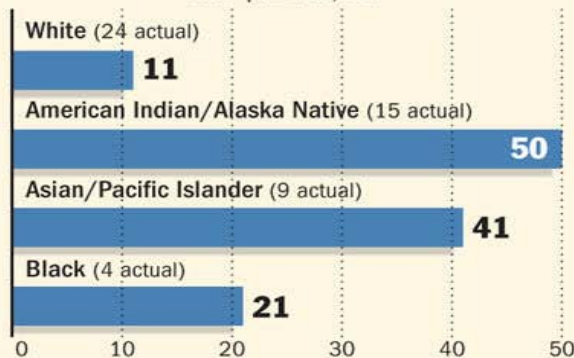
By race

59 cases



By race

Rate per 100,000



Source: State Epidemiology Section, Federal Centers for Disease Control


KEVIN POWELL / Anchorage Daily News

Alaska H1N1 retrospect

- H1N1 complications high in Alaska Native people
 - hospitalization rate was 4 times higher than white Anchorage residents,
 - relatively healthy young adults and children affected

http://www.epi.hss.state.ak.us/bulletins/docs/b2009_30.pdf

State of Alaska
Epidemiology



Bulletin

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William H. Hogan, MSW, Commissioner

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Influenza Hospitalizations — Municipality of Anchorage, September 1 – October 21, 2009

Introduction

Since May 2009, laboratory-confirmed 2009 H1N1 influenza infection has been diagnosed in over 1,000 Alaskans, and 10 Alaskans are known to have died from the virus.¹ Staff from the

years (14/24, 58%) compared with whites (7/24, 29%; $p < 0.05$). Among AI/AN and A/PI patients, 13/14 (93%) aged < 25 years and 8/10 (80%) aged ≥ 25 met the current criteria for empiric antiviral therapy prior to hospitalization.⁶ Most patients were in a 2009 H1N1

Influenza complications in medically compromised people

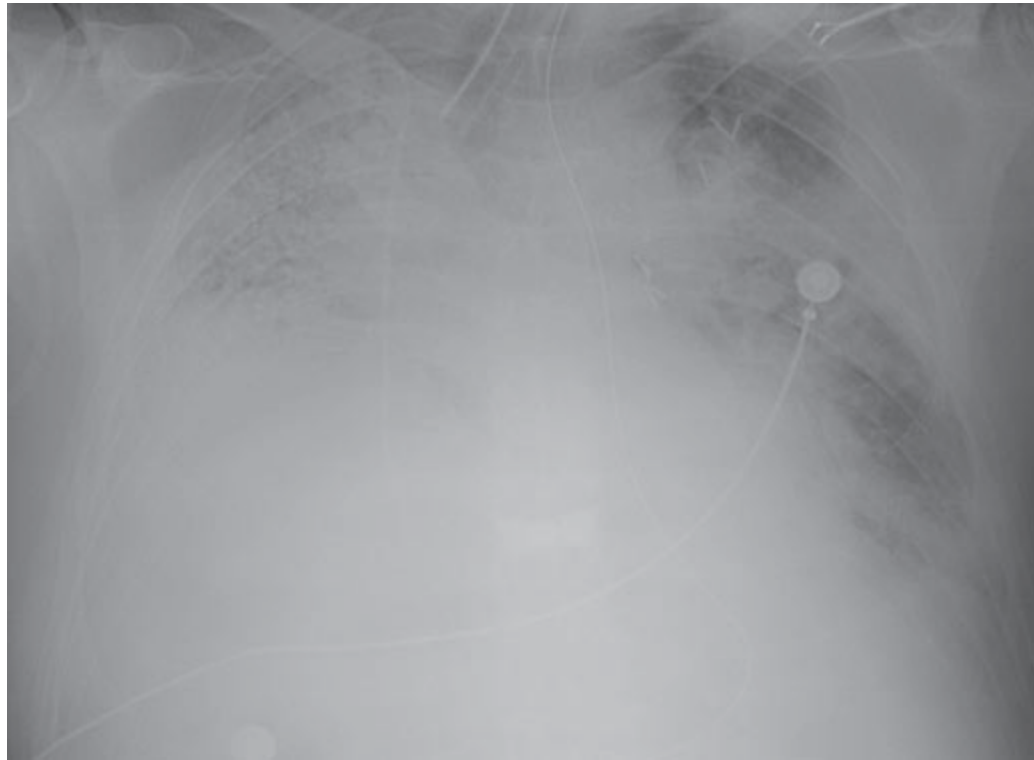


Fig. 1—56-year-old man with history of lung transplant who developed H1N1 infection
Chest radiograph obtained 10 days after normal initial radiograph shows extensive ground-glass opacities and multifocal consolidation in transplanted left lung.

Flu can strike down even previously healthy kids

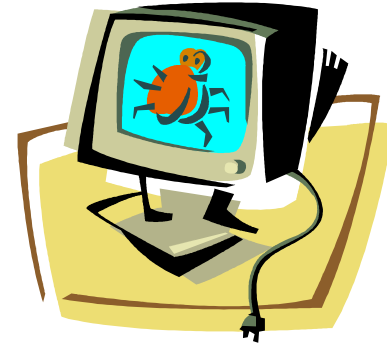
Tate Hart, 6, came down with swine flu, which turned into pneumonia. He then developed Guillain-Barre syndrome. His parents, Anne Gore and Dave Hart, use their experience to urge people to vaccinate their children against the flu



Read more:

<http://www.adn.com/2011/02/05/1686665/boy-stricken-with-serious-illnesses.html#ixzz1MAD4DT6T>

Challenges: Myths about H1N1 vaccine that circulated by e-mail among AI/AN



Here are snippets from e-mails that circulated to Alaska:

- “Last week, many of the aboriginal people in the remote west ... were innoculated with the tamiflu vaccine”
 - *The Truth: TamiFlu is not a vaccine – it’s the anti-viral medication given to people sick with H1N1*
- “these reserves are being targeted first to be injected with untested, unsafe and potentially lethal flu vaccines”
 - *The Truth: H1N1 flu vaccine was made and tested in the same manner as seasonal flu vaccine and the safety was the same. The vaccine was offered to all racial groups”*
- “The swine vaccine contains a computer chip”
 - *The Truth: No computer chip*
- “The H1N1 vaccines contains dangerous additives like squalene”
 - *The Truth: None of the U.S. H1N1 vaccines contained additives like squalene*

H1N1 educational efforts by Alaskan tribal programs



Like others, we were running like crazy!

- PSA on H1N1 distributed to radio and tribal corporations
- ILI reports distributed to regional facilities
- 3 minute video PSA “H1N1 – Just the Facts” developed to address myths; posted on Facebook and Youtube
- Anchorage Daily News article highlighting 1918 epidemic impact on Alaska Native communities

Annual Provider Flu Education

- Flu-Facts distributed through *Vaccinate Alaska Coalition*
- Regular Flu updates to:
 - Clinical Directors,
 - Immunization Coordinators,
 - Community Health Aide programs
 - All-Clinic Staff meetings
 - E-mail updates with surveillance, guidelines
- Tools for providers:
 - Flu vaccine protocols
 - Flu-Mist Screening Forms



Flu Outreach: Alaska Style

- Mass Vaccination Clinics
 - Schools
 - Health Fairs
 - Alaska Federation of Natives (AFN) Convention



Sassa Kitka giving her mom a Flu vaccine at AFN

Flu Outreach Alaska Style: Kusko at the Bethel July 4th Parade



New CDC Guidelines on Influenza Antivirals, November 23, 2010

- **Summary of Influenza Antiviral Treatment Recommendations for the 2010-2011 Season – US**
 - Antiviral treatment is recommended as early as possible for any patient with confirmed or suspected influenza who:
 - has severe, complicated, or progressive illness, or
 - is hospitalized, or
 - is at higher risk for influenza complications as follows:
 - Children younger than 2 years old;* ...
 - Adults 65 years of age and older; ...
 - Persons with the following conditions: chronic pulmonary...
 - Persons with immunosuppression,
 - **American Indians and Alaskan Natives;**

<http://www.cdc.gov/flu/professionals/antivirals/antiviralrec2010.htm>



Best Practices

Best Practices

- Increase access to vaccine
 - Walk in flu clinics/streamlined registration
 - Extended clinic hours, weekends/evenings
 - Clinics in the community
 - Schools, chapter houses, casinos, grocery stores
 - Hire additional staff/overtime authorization
 - Pharmacist immunizers
 - Flu Immunization protocols and standing orders
- Vaccine promotion
 - Local radio, newspapers, tribal newsletters
 - Ethnic media roundtables
 - Community education (PHNs, CHRs)

Best Practices cont.

- Review the data
 - Influenza report in the RPMS Immunization Package
 - IHS Influenza Awareness System (IIAS) weekly reports
 - Influenza-like illness trends
 - Flu vaccine doses administered and coverage
- Utilize Reminder Recall

HCP Vaccination: Best Practice

- Strong HCP recommendations
 - Require vaccination or declination form
 - Administration supportive
 - Recommendations widely published to staff
- Educate HCP about flu and flu vaccine
- Make vaccine accessible
 - Employee vaccine clinics
 - Vaccine carts taken to each service area
- **HCP Influenza Vaccine Requirement**
 - Tuba City

Educational Materials

- Posters and Fact Sheets with AI/AN people
- Flu Presentation for community members
- Tool Kits
 - Tribal Head Start/Early Childhood Education programs



Public Service Announcements

Available at : www.ihs.gov/flu

- Wes Studi
- California Rural Indian Health Board
- IHS Director

Good Resources for Patients

Vaccinate Your Baby: www.vaccinateyourbaby.org/

Parents of Kids with Infectious Diseases: www.pkids.org/

Autism Science Foundation: www.autismsciencefoundation.org

CDC Parents: www.cdc.gov/vaccines/spec-grps/parents.htm

CHOP Vaccine Education Center:

www.chop.edu/service/vaccine-education-center/home.html

YouTube Channels:

- PKIDSOrg
- ChildrensHospPhil
- ShotbyShotStories

Next Steps

- Our population is at high risk from flu - we must do better!
- Explore reasons why people don't get vaccinated
 - Particularly among those 65+ years
- Target education and outreach efforts
- Review vaccine coverage data
THROUGHOUT flu season
 - Use reminder recall, set weekly facility goal