



THE UNIVERSITY OF ARIZONA

**Mel & Enid Zuckerman
College of Public Health**

**Fall 2018
MPH Internship Conference**

**Friday, November 16, 2018
1:00pm – 3:20pm**

**Drachman Hall
Phoenix Biomedical Campus**

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Acknowledgements

All of our wonderful internship sites
throughout the state, nation, and world with
whom we work to improve the state of public health

The students and faculty of MEZCOPH,
who are central to the success of the MPH Program

The Office of Student Services and Alumni Affairs
for their outstanding efforts, support, and encouragement

Internship Conference Volunteers

We would like to thank all of the volunteers for their time
and effort in making this a wonderful event

Conference Planning Committee

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Katey Redmond | Niraly Patel | Alexandrina Wallace | Joey Fong |
Jessica Seline | Tori Davis

Office of Student Services and Alumni Affairs

Kim Barnes
Tanya Nemec
Gisela Ochoa
Chris Tisch, Assistant Dean

Schedule of Events

1:00p-3:00p Student Internship Presentations
(Tucson-Drachman Hall A; Phoenix-Biomedical Campus Building 2)

Session I: Drachman Hall, Room A116
Phoenix Building 2, Room 2306

Session II: Phoenix Building 2, Room 2208

Session III: Drachman Hall, Room A118

Session IV: Drachman Hall, Room A120

3:00p-4:00p: Reception
(Walkway of Wellness, Tucson)

Presenters

Name	Concentration*	Room**	Time	Page
Melody Bertsch	HSA	A116/PHX 2306	1:40 PM	20
Travis Connors	EPI	A118	2:00 PM	33
Jamaica Dillard	EOH	A120	2:00 PM	41
Christina (Lauren) Erdelyi	PHPM	A118	3:00 PM	36
Layla Gabir	EOH	A120	1:40 PM	40
Camille Gonzalez	FCH MCH	A118	1:00 PM	30
Krithiga Gopi	HSA	A116/PHX 2306	3:00 PM	24
Magdiel Habila	EPI	A118	2:20 PM	34
Chelsey Harris	HSA	A116/PHX 2306	1:20 PM	19
Sana Khan	EPI	A120	1:00 PM	38
Kara Kronemeyer	PHP	PHX 2208	1:00 PM	26
Emily Maass	PHPM	A116/PHX 2306	1:00PM	18
Gabriel Mancillas	EOH IH	A120	2:20 PM	42
Rebecca Mojardin	HSA	A116/PHX 2306	2:00 PM	21
Erik Ornelas	EOH	A120	2:40 PM	43
Caitlin (Katey) Redmond	FCH Global	A118	1:20 PM	31
Laura Riley	EPI	A120	1:20 PM	39
Harneel Sandhu	EPI	A118	1:40 PM	32
Alexandra Shilen	EPI	A118	2:40 PM	35
Sahajdeep Singh	HSA	A116/PHX 2306	2:40 PM	23
Juhyung Sun	HSA/MBA	A116/PHX 2306	2:20 PM	22
Jane Toomey	PHP	PHX 2208	1:20 PM	27
Mia Wright	MDMPH	PHX 2208	1:40 PM	28

*Concentrations and Dual Degree Designations:

BIOS – Biostatistics

EOH – Environmental and Occupational Health

EOH IH - Environmental and Occupational Health Industrial Hygiene Track

EPI – Epidemiology

FCH MCH - Family and Child Health Maternal and Child Health Track

FCH GLOBAL - Family and Child Health Global Track

HSA – Health Services Administration

HBHP - Health Behavior Health Promotion

MD/MPH- Medical Doctor/Master of Public Health

PHP - Public Health Practice

PHPM – Public Health Policy & Management

**Rooms:

All “A” rooms listed are found on the first floor of Drachman Hall.

Phoenix presentations are located in Biomedical Campus Building 2, Rooms 2306 and 2208.

Presenters' Email Addresses

Name	Email
Melody Bertsch	mena1@email.arizona.edu
Travis Connors	travconnors@email.arizona.edu
Jamaica Dillard	jamaicad@email.arizona.edu
Christina (Lauren) Erdelyi	cerdelyi@email.arizona.edu
Layla Gabir	lgabir@email.arizona.edu
Camille Gonzalez	cgonz0803@email.arizona.edu
Krithiga Gopi	kgopi@email.arizona.edu
Magdiel Habila	magdielhabila@email.arizona.edu
Chelsey Harris	chelseyharris@email.arizona.edu
Sana Khan	sanakhan@email.arizona.edu
Kara Kronemeyer	kmkroney@email.arizona.edu
Emily Maass	emilymaass@email.arizona.edu
Gabriel Mancillas	gmancillas@email.arizona.edu
Rebecca Mojardin	rmojardin@email.arizona.edu
Erik Ornelas	Erikornelas1@email.arizona.edu
Caitlin (Katey) Redmond	kateycored@email.arizona.edu
Laura Riley	lauramjohnson@email.arizona.edu
Harneel Sandhu	harneelsandhu@email.arizona.edu
Alexandra Shilen	alexandrashilen@email.arizona.edu
Sahajdeep Singh	ssing19@email.arizona.edu
Juhyung Sun	jsun000@email.arizona.edu
Mia Wright	mcw1@email.arizona.edu

Presenters Schedule

Time	Session I <i>A116/PHX 2306</i>	Session II <i>PHX 2208</i>	Session III <i>Room A118</i>	Session IV <i>Room A120</i>
1:00	E. Maass	K. Kronemeyer	C. Gonzalez	S. Khan
1:20	C. Harris	J. Toomey	K. Redmond	L. Riley
1:40	M. Bertsch	M. Wright	H. Sandhu	L. Gabor
2:00	R. Mojardin		T. Connors	J. Dillard
2:20	J. Sun		M. Habila	G. Mancillas
2:40	S. Singh		A. Shilen	E. Ornelas
3:00	K. Gopi		C. L. Erdelyi	

Session I

(Drachman Hall, Room A116 | Phoenix Building 2, 2306)

- 1:00 LEVERAGING VALUE-BASED CARE TO ADDRESS THE SOCIAL DETERMINANTS OF HEALTH IN MEDICAID POPULATIONS. **E. Maass.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Leila Barraza JD, MPH. Site and Preceptor: Community Catalyst (National Academy of Social Insurance) – Danielle Garrett, MPA.
- 1:20 IMPROVING COORDINATION NETWORKS FOR HOUSTON FLOOD PREPARATION, MITIGATION, RESPONSE AND RECOVERY (HURRICANE HARVEY HOUSEHOLDS NSF PROJECT). **C. Harris.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Gail Barker MBA, PhD. Site and Preceptor: Houston, TX – Dr. Sheryl McCurdy PhD, M.Phil., MA, BA.
- 1:40 IMPROVING BREAST AND CERVICAL CANCER SCREENING RATES FOR WOMEN IN A FEDERALLY QUALIFIED HEALTH CENTER (FQHC). **M. Bertsch.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Gail Barker MBA, PhD. Site and Preceptor: Sun Life Family Health Center – Denise Atwood, JD.
- 2:00 TRIGGERS AND PERCEPTIONS OF DEPRESSION AMONG HISPANIC/LATINO EMERGING ADULTS ATTENDING COLLEGE. **R. Mojardin.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Gail Barker MBA, PhD. Site and Preceptor: Juntos por la Salud Mobile Unit- Phoenix – Eduardo Gonzalez, PhD.
- 2:20 FACILITATION AND ACTIVATION OF COMPLIANCE STRATEGY IN A HEALTH CARE DELIVERY SYSTEM. **J. Sun.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Gail Barker MBA, PhD. Site and Preceptor: Kaiser Permanente – Sabrina Gill, MS.

2:40 PHOENIX CHILDREN'S HOSPITAL. **S. Singh.** University of Arizona, Phoenix, AZ, U.S.A. MPH Internship Committee Chair: Gail Barker MBA, PhD. Site and Preceptor: Phoenix Children's Hospital – Melissa Warden, RN, JD.

3:00 EVALUATION OF PATIENT PLACEMENT THROUGHOUT PROCESS USING ELECTRONIC BED BOARD IN PHOENIX CHILDREN'S HOSPITAL. **K. Gopi.** University of Arizona, Phoenix, U.S.A. MPH Internship Committee Chair: Gail Barker MBA, PhD. Site and Preceptor: Phoenix Children's Hospital – Melissa Warden RN, JD.

Session II

(Phoenix Building 2, Room 2208)

- 1:00 CALLER DESCRIPTIONS OF SEIZURE-LIKE SYMPTOMS IN 911 OUT-OF-HOSPITAL CARDIAC ARREST CALLS. **K. Kronemeyer.** University of Arizona, Phoenix, U.S.A. MPH Internship Committee Chair: Gail barker MBA, PhD. Site and Preceptor: Arizona Emergency Medicine Research Center (AEMRC) – Micah Panczyk, PhD
- 1:20 CONGENITAL SYPHILIS AND FETAL DEMISE IN MARICOPA COUNTY, AZ. **J. Toomey.** University of Arizona, Phoenix, U.S.A. MPH Internship Committee Chair: Douglas Campos-Outcalt MD, MPA. Site and Preceptor: Maricopa County Department of Public Health – John Keenan, PhD, MSPH.
- 1:40 THE LONG TERM EFFICACY OF A BEHAVIORAL BASED DIABETES PREVENTION PROGRAM FROM HIGH RISK HISPANIC YOUTH. **M. Wright.** University of Arizona, Phoenix, U.S.A. MPH Internship Committee Chair: M. Moe Bell MD. Site and Preceptor: Virginia G. Piper St. Vincent de Paul Medical Clinic – Maurice Lee, MD, MPH, FAAFP.

Session III

(Drachman Hall, Room A118)

- 1:00 BARRIERS AND FACILITATORS TO CARE FOR PERINATAL MOOD DISORDERS AFTER REFERRAL BY A NURSE-FAMILY PARTNERSHIP NURSE. **C. Gonzales.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Irma Ramos MD. Site and Preceptor: Nurse-Family Partnership – Teresa Wilson, MS, APRNC-OB, CNS BC.
- 1:20 DEVELOPING COMMUNITY LEVEL INTERVENTIONS TO REDUCE MALARIA AND HIV IN RURAL RWANDA. **K. Redmond.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: John Ehiri PhD, MPH. MSc. Site and Preceptor: Inshuti Mu Buzima/Partners in Health – Jean D’Amour Ndahimana, MD, MSc.
- 1:40 ASSESSMENT OF MARIJUANA-RELATED EMERGENCY DEPARTMENT VISITS & HOSPITALIZATIONS POST-LEGALIZATION IN RIVERSIDE COUNTY, CA. **H. Sandhu.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Yann Klimentidis PhD, MS. Site and Preceptor: Riverside County, CA – Wendy Hetherington, MPH.
- 2:00 IDLE LESS FOR A HEALTHY SCHOOL ENVIRONMENT. **T. Connors.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Robin Harris PhD, MPH. Site and Preceptor: Pima County Department of Environmental Quality – Beth Gorman, MPA, BA.
- 2:20 THE EFFECT OF HORMONE RECEPTOR STATUS ON BREAST CANCER TREATMENT IN DAR ES SALAAM, TANZANIA. **M. Habila.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Elizabeth Jacobs PhD. Site and Preceptor: Dar es Salaam, Tanzania – Khadija Msami, MD.

2:40 OPIOID OVERDOSE PREVENTION IN PIMA COUNTY. **A. Shilen.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Elizabeth Jacobs PhD. Site and Preceptor: Pima County Health Department – Raul Munoz, BS.

3:00 ORGANIZATION AND PROGRAMMATIC ASSESSMENT FOR SOUTHERN ARIZONA ROADRUNNERS. **C. L. Erdelyi.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Maia Ingram MPH. Site and Preceptor: Southern Arizona Roadrunners – Dari Duval, MS.

Session IV

(Drachman Hall, Room A120)

- 1:00 REDUCING THE RATE OF HEALTHCARE ACQUIRED INFECTIONS AT KAISER PERMANENTE WASHINGTON REGION. **S. Khan.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Elizabeth Jacobs PhD. Site and Preceptor: Kaiser Permanente Washington Region – Capitol Hill Campus – Elizabeth Rowan, RN, MSN, MBA.
- 1:20 DEVELOPMENT OF WELL WOMAN HEALTHCHECK PROGRAM’S PATIENT QUESTIONNAIRE. **L. Riley.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Elizabeth Jacobs PhD. Site and Preceptor: Pima County Health Department – Laura L. Hopkins BS, MS.
- 1:40 AN INDUSTRIAL HYGIENCE INTERNSHIP AT RISK MANAGEMENT SERVICES: EXPOSURE ASSESSMENT OF 3D PRINTERS. **L. Gabir.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Jeff Burgess MD, MS, MPH. Site and Preceptor: Risk Management Services – John Murphy, MPH, CSP.
- 2:00 MOSQUITO SURVEILLANCE IN PIMA COUNTRY, ARIZONA. **J. Dillard.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Stephanie Griffin PhD, CIH. Site and Preceptor: Pima County Health Department – Amanda Anderson, MPH.
- 2:20 SAFETY PLANS, ENVIRONMENTAL SITE ASSESSMENTS AND INDUSTRIAL HYGIENE EVALUATIONS WITH A NATIONAL CONSULTING FIRM. **G. Mancillas.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Stephanie Griffin PhD, CIH. Site and Preceptor: Terracon Consultants, Inc. – Michael S. Crandall, MS, BS, CIH, LEED AP.

2:40

CHLOROHEXIDINE GLUCONATE BATHING COMPLIANCE IN MRSA POSITIVE PATIENTS AT ST. MARY'S HOSPITAL. **E. Ornelas.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Mary Kay O'Rourke PhD. Site and Preceptor: St. Mary's Hospital Infection Prevention and Control Department – Erica McClain, RN.

**Session I:
1:00 – 3:20**

*Drachman Hall, Room A116 / Phx Building 2,
Room 2306*

Abstracts

LEVERAGING VALUE-BASED CARE TO ADDRESS THE SOCIAL DETERMINANTS OF HEALTH IN MEDICAID POPULATIONS. **E. Maass.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Leila Barraza JD, MPH. Site and Preceptor: Community Catalyst (National Academy of Social Insurance) – Danielle Garrett, MPA.

Access to consistent and quality health care coverage is essential to individual and population health. Medicaid is a cost-effective program that provides access to healthcare services for millions of Americans each year. Medicaid is funded by both federal and state governments, but is managed at the state level. With approval by the federal government, states are sometimes given flexibility to implement Medicaid programs that fit the needs of their populations. Some states look to policy changes to minimize the cost of operating the program and others look to innovative Medicaid policies for new strategies to improve access and quality of care. Through a review of policy briefs, legislation, and academic research, I identified reactive and proactive cost containment measures that public health advocates can put forward to contain state Medicaid costs while improving care coordination and overall quality of care through value-based payment methods. The first brief evaluates reactive cost containment strategies that advocates could use to improve the Medicaid delivery system in states aiming to curb Medicaid spending. The second policy brief outlines proactive policy measures that could be used to achieve long-term cost savings through the use of Medicaid dollars to address the nonmedical factors that disproportionately impact low-income Americans.

IMPROVING COORDINATION NETWORKS FOR HOUSTON FLOOD PREPARATION, MITIGATION, RESPONSE AND RECOVERY (HURRICANE HARVEY HOUSEHOLDS NSF PROJECT). **C. Harris.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Gail Barker MBA, PhD. Site and Preceptor: Houston, TX – Dr. Sheryl McCurdy PhD, M.Phil., MA, BA.

Introduction: Hurricane Harvey of 2017 was not just a catastrophic event, but was also the cap on a cumulative 17-year series of flood and is tied with Hurricane Katrina as one of the costliest tropical cyclones on record, due to its disastrous flooding. The Hurricane Harvey Households NSF Project was designed to determine whether past flood experience would reduce household conflict in decision-making, and whether flood-fatigued households had less conflict in decision-making during recovery. Methods: Mixed methods approaches allowed examination of these decisions during disaster. Data collection included in-depth interviews, field notes, and archival sources (newspaper reports, internet sites dedicated to Hurricane Harvey evacuees, government and NGO reports). Key informants, stakeholders affiliated with Houston government agencies, non-profit groups, and religious organizations, were also interviewed. Interviews were transcribed, then the files, field notes, and relevant documents were coded for themes and emergent ideas that needed further exploration in later interviews. Results: As hypothesized, there were many differences regarding decision-making between households with prior flood experiences and those without. There were also substantial gender differences in decision-making in households. As suspected, gender household negotiations about recovery decisions varied by a household's community connectedness, socioeconomic status, and generational status. Conclusion: The Hurricane Harvey NSF Project provided insight into the types of interventions and policies that will help households remain viable in the face of disaster, examining the processes of risk assessment, coping, and survival strategies in households following major natural disaster.

IMPROVING BREAST AND CERVICAL CANCER SCREENING RATES FOR WOMEN IN A FEDERALLY QUALIFIED HEALTH CENTER (FQHC). **M. Bertsch.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Gail Barker MBA, PhD. Site and Preceptor: Sun Life Family Health Center - Denise Atwood, JD.

Introduction: Federally Qualified Health Centers (FQHCs) serve a variety of underserved populations, including a high percentage of uninsured and underinsured members in at-risk communities. Adherence to screening recommendations for breast and cervical cancer is minimal. This study examined the effectiveness of Sun Life Family Health Center's breast and cervical cancer screening reminder process. Methods: Using the eClinicalWorks system, a population-based auditing system was developed to analyze the impact of breast and cervical cancer reminder letters on a randomly selected sample of 250 patients between the ages of 21-64 years old. Split into two phases, Phase I consisted of 125 patients sent reminder letters, while an additional 125 patients received no letters. Phase II was comprised of modifying the original letter and sending it to the 125 patients that did not receive a letter during the Phase I. Data collected was based on the type of letter sent and patient appointments made during each phase. Results: Phase I yielded three patient appointments from the group receiving a letter and four appointments for patients who received no letter. Phase II produced one patient appointment from the group receiving the modified letter and five appointments from patients who did not get a letter. The total yield from both phases was four patient appointments after receiving a letter and nine appointments made regardless of getting a letter. Conclusions/Recommendations: Results demonstrated a minimal difference in screening volume whether patients received a letter or not. Data showed that a higher volume of patients made appointments regardless of receiving a letter. Recommended alternatives include contacting patients by email, patient portal systems or text messaging, conserving manpower and other resources.

TRIGGERS AND PERCEPTIONS OF DEPRESSION AMONG HISPANIC/LATINO EMERGING ADULTS ATTENDING COLLEGE. **R. Mojardin.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Gail Barker MBA, PhD. Site and Preceptor: Juntos por la Salud Mobile Unit- Phoenix - Eduardo Gonzalez, PhD.

Introduction: This project examined the impact of the country's current political climate and immigration policies on the Hispanic/Latino community by identifying triggers and perceptions of mental health among Hispanic/Latino students attending college. Methods: This study was designed to obtain data through the facilitation of two focus groups and administration of an online survey. All students were recruited from the Ana & Adalberto Guerrero student center at the University of Arizona. The online survey was sent through the student center's weekly announcements email. Students who subscribed to this listserv received the survey link and focus groups dates. Results: 34 students (91% female, 9% male) responded to the online survey; no students attended the focus groups. The respondents self-identified as 88% Hispanic/Latino, 9% White/Caucasian and 3% Native American/American Indian. The results indicated that 88% of all respondents thought the Hispanic/Latino community experienced more stressors or triggers, which could affect mental health when compared to other groups. Results point to triggers in the areas of employment, living environment and financial instability. However, the largest stressor/trigger identified as affecting mental health was immigration. This was reported by 33% of all respondents. Participants also described their perceptions of what constituted mental health. Summary: The main purpose of this project was to share these findings and recommend a solution to bridge the gap between campus mental health and students. The potential for future research, as well as the limitations of this study, including low overall participation and the lack of attendance at the focus groups, will be discussed in the presentation.

FACILITATION AND ACTIVATION OF COMPLIANCE STRATEGY IN A HEALTH CARE DELIVERY SYSTEM. **J. Sun.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Gail Barker MBA, PhD. Site and Preceptor: Kaiser Permanente - Sabrina Gill, MS.

Introduction. The National Office of Ethics, Compliance, and Integrity (NCO) at Kaiser Permanente oversees compliance issues across the Hospital and Health Plan entities. This internship took place within Compliance Strategy, a group that helps the NCO set strategic initiatives; the primary focus was on communicating the NCO Strategic Agenda, constructing metrics to assess Strategic Agenda progress, and identifying NCO knowledge management solutions. Methods. Communicating the Strategic Agenda involved hearing feedback on prior learning modules constructed for this purpose, learning best practices for modules, and working with NCO groups to draft and publish modules internally. Constructing metrics involved learning current process measures, researching best practices, drafting potential metrics, and identifying next steps. Identifying knowledge management solutions involved researching best practices, interviewing NCO colleagues on needs, and identifying next steps. Results. For communicating the Strategic Agenda, deliverables included a learning module, best practices template, and framework for aligning prior modules to best practices. For constructing metrics, deliverables included two metric sets, a best practices document, and recommended next steps. For identifying knowledge management solutions, deliverables included a research summary, interview results across the NCO, and recommended next steps. Conclusion. Key challenges in completing deliverables included competing priorities, the time required for stakeholder consensus, and the discovery (through background research) of new key questions to be answered. All three projects related to needs that are general across all organizations (strategy, metrics, and knowledge); importantly, each requires a robust infrastructure for full implementation.

PHOENIX CHILDREN'S HOSPITAL. **S. Singh.** University of Arizona, Phoenix, AZ, U.S.A. MPH Internship Committee Chair: Gail Barker MBA, PhD. Site and Preceptor: Phoenix Children's Hospital - Melissa Warden, RN, JD.

Introduction: Phoenix Children's Hospital is one of the largest pediatric hospitals in the country. The hospital offers several subspecialties and houses a variety of outpatient clinics to provide families both convenience and the best care. The goal of this project was twofold; a) to create a resource guide and onboarding checklist for new ambulatory practice managers and b) to align reports to measure the associated metrics. Methods: A team of five practice managers was recruited to help create the guide. Each member was assigned a category to ensure that all sections included the objectives each practice manager would need to complete. Next, the team discussed metrics related to each objective and the best report for the metric. Lastly, all of the remaining clinic reports were studied to determine whether or not they should be included in the guide. The onboarding checklist was developed using the resource guide. The checklist was designed to help new managers self-assess their skills, whether acquired during the PCH hiring process or from previous training. Results: Practice managers at PCH are highly qualified, however, many of the practice managers recommended that more effective training take place at orientation. They also recommended a central location for clinic reports be identified. The resource guide and the onboarding checklist were very well received by practice managers and leaders throughout the hospital. Conclusion: Practice managers can benefit from having a well-defined resource guide and onboarding checklist. However, it is highly recommended that both of these documents be updated as the needs of clinic operations change. Furthermore, it is recommended in the future reports should be consolidated into dashboards based on the metric and outdated reports should be archived.

EVALUATION OF PATIENT PLACEMENT THROUGHPUT PROCESS USING ELECTRONIC BED BOARD IN PHOENIX CHILDREN'S HOSPITAL. **K. Gopi.** University of Arizona, Phoenix, U.S.A. MPH Internship Committee Chair: Gail Barker MBA, PhD. Site and Preceptor: Phoenix Children's Hospital - Melissa Warden RN, JD.

BACKGROUND: Phoenix Children's Hospital (PCH), one of the largest children's hospital in the country, has 433 beds and admitted approximately 13,000 patients last year. The hospital planned an initiative to improve their patient throughput and patient care experience by replacing their whiteboards with electronic bed boards. The goal of this initiative was to improve inpatient placement time and ease the admission and discharge process. **METHODS:** The data was collected over a period of 3 consecutive months – June to August 2018. This timeframe covered the pre-intervention period, transition period and the post-intervention period. Metrics were developed, and the data was abstracted from the hospital central database and from the teletracking application. The data was analyzed to determine the success of the electronic bed board implementation using graphs and a scorecard. **RESULTS:** There was a significant improvement in the average patient placement time, the average ED and PACU hold and the number of patients discharged before 11 am and 2 pm. However, the room turnaround time, level of care and phone calls to hospital admission center did not improve. **CONCLUSIONS:** This intervention improved many patient care metrics, yet some metrics remained unchanged especially the hospital admission center phone talk time. This intervention has the potential to improve other patient care metrics such as decreasing patient length of stay. Periodic assessment to determine the patient care metrics should be conducted to improve the patient experience. It was suggested PCH implement a dashboard, which would automatically generate these metrics.

**Session II:
1:00 – 2:00**

Phx Building 2, Room 2208

Abstracts

CALLER DESCRIPTIONS OF SEIZURE-LIKE SYMPTOMS IN 911 OUT-OF-HOSPITAL CARDIAC ARREST CALLS. **K. Kronemeyer**. University of Arizona, Phoenix, U.S.A. MPH Internship Committee Chair: Gail Barker MBA, PhD. Site and Preceptor: Arizona Emergency Medicine Research Center (AEMRC) - Micah Panczyk, PhD.

Background: Out-of-hospital cardiac arrest (OHCA) is a major public health concern. Bystander cardiopulmonary resuscitation (BCPR) significantly improves survival and telecommunicator CPR (TCPR) increases the rates of BCPR further. Identifying opportunities for 911 telecommunicators to initiate CPR sooner may increase survival rates. For callers reporting seizure-like symptoms, TCPR may be delayed. Identifying circumstances where callers describe seizure-like symptoms may lead to important information to be used by medical dispatch centers. Methods: A total of 429 EMS-confirmed OHCA calls from three regional 911 centers in Arizona were reviewed for years 2013 to 2016. All calls were reviewed for the frequency of specific terms used by callers to describe seizure-like symptoms. Descriptive statistics were performed on preliminary findings. Results: There were 389 calls after exclusions. Of these, 17 (4.6%) had seizure-like behavior described by the caller. For 76.5% (n=13) of this subgroup, the caller used the term "seizure." The second most common term used was "shaking" (11.8%, n=2). The median time to describe seizure-like symptoms was 28 seconds (IQR 0:18, 0:42). Telecommunicators started seizure interventions for 35.3% (n=6). In all 6 calls, seizure intervention was started prior to TCPR being initiated. Conclusion: The number of calls identified having seizure-like terminology used by the caller was small. Nearly all callers used the word "seizure" to describe seizure-like symptoms in the patient. In all cases where seizure intervention was initiated, seizure intervention was started prior to TCPR. Recommendations: A limitation was the small number of seizure calls identified for review. It is recommended more EMS-confirmed OHCA telecommunicator calls be reviewed in order to complete a more thorough analysis.

CONGENITAL SYPHILIS AND FETAL DEMISE IN MARICOPA COUNTY, AZ. J.

Toomey. University of Arizona, Phoenix, U.S.A. MPH Internship Committee Chair:
Douglas Campos-Outcalt MD, MPA. Site and Preceptor: Maricopa County
Department of Public Health - John Keenan, PhD, MSPH.

Introduction There were 147 congenital syphilis cases in Maricopa County from 2008 to June 1, 2018; 13 of these resulted in fetal demise (8.8%)¹. In the same time period Maricopa County and Arizona have had higher rates of congenital syphilis (CS) than the national average². The aim of this internship was to find risk factors associated with fetal demise from congenital syphilis. **Methods** Demographic and risk factor data were obtained from case investigations of CS. Those with fetal demise were compared to others. Continuous variables were compared by a t-test; categorical values were compared by a chi-square or Fisher's Exact, when indicated. **Results** Lack of prenatal care ($p = 0.003$) and a younger gestational age ($p = < 0.001$) were significantly related to fetal demise; all other factors showed no statistical significance. **Conclusion** Congenital syphilis is a preventable disease eliminated through proper screening, testing, and treatment. ARS 36-693 mandates syphilis testing during the first prenatal visit. Prenatal care was the only preventive measure significantly associated inversely with adverse birth outcomes. These results demonstrate the need for education and disease prevention efforts among pregnant women to reduce the risk of fetal demise from CS. 1. Maricopa County, AZ. Unpublished Data 2. Center for Disease Control and Prevention. Sexually Transmitted Disease Surveillance 2016. https://www.cdc.gov/std/stats16/CDC_2016_STDS_Report-for508WebSep21_2017_1644.pdf Published September 2017. Accessed August 2018.

THE LONG TERM EFFICACY OF A BEHAVIORAL BASED DIABETES PREVENTION PROGRAM FOR HIGH RISK HISPANIC YOUTH. **M. Wright.** University of Arizona, Phoenix, U.S.A. MPH Internship Committee Chair: M. Moe Bell MD. Site and Preceptor: Virginia G. Piper St. Vincent de Paul Medical Clinic - Maurice Lee, MD, MPH, FAAFP.

Intro: Little is known about the long term efficacy of diabetes prevention programs that target high risk youth. The purpose of this project was to determine the long-term efficacy of a behavioral & medical program targeted at high risk youth. At the St. Vincent de Paul Medical & Dental Clinic (SVdP), the Every Little Step Counts (ELSC) diabetes prevention program has recruited high risk Hispanic youth to participate in 12 bi-weekly classes since 2005. Methods: 21 adolescents who completed ELSC were recruited as the intervention group. 9 youth in the community who did not complete the program were recruited as the control group. The HbA1c, BMI% and BP were measured & they all took a health questionnaire. Results: There was no significant difference in A1c% ($p=0.87$), Systolic BP and BP% ($p=0.21$ and $p=0.29$), BMI% ($p=0.11$) and health behaviors ($p>0.05$) between adolescents who completed the program versus those who did not. Diastolic BP, diastolic BP% ($p=0.02$ and $p=0.04$) & BMI ($p=0.02$) were lower in the intervention group compared with the control. The intervention group demonstrated a decrease in A1c% ($p=0.001$) but an increase in BMI% at the end of the program compared with their baseline. Conclusions: This data suggests that a behavioral intervention might improve some markers of metabolic syndrome in at risk adolescents but the full effect of these results can only be determined with adequate follow-up down the road. We have developed an annual reunion to be led by a graduate of the program with support from ELSC. The goal of this reunion will be to reinforce skills gained from the program & address the determinants of health beyond nutrition & activity as these youths move into adulthood.

**Session III:
1:00 – 3:20**

Drachman Hall, Room A118

Abstracts

BARRIERS AND FACILITATORS TO CARE FOR PERINATAL MOOD DISORDERS AFTER REFERRAL BY A NURSE-FAMILY PARTNERSHIP NURSE. **C. Gonzalez.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Irma Ramos MD. Site and Preceptor: Nurse-Family Partnership - Teresa Wilson, MS, APRNC-OB, CNS BC.

Background Nurse-Family Partnership (NFP) is an evidence-based program providing first-time, low income mothers with a home-visiting nurse. This project studied barriers and facilitators to care for Perinatal Mood Disorders (PMD) after referral. This will help NFP nurses better understand the circumstances shaping their client's decisions for seeking care. Methods A total of 111 anonymous surveys of program participants were conducted by NFP nurses along with three interviews of key stakeholders working with PMD. Data were analyzed and compared to research, and emerging themes identified from the data. Results Of those referred for a PMD, 48% (24) sought treatment and 52% (27) did not. Barriers to obtaining care included the mother's lack of time to receive care, the providers' inability to deliver services in a timely manner, lack of motivation, client attempts to address issues independently, stigma, cultural perceptions of mental health, and providers' lack of knowledge surrounding PMD. Facilitators to care included encouragement by friends, family, and others (nurses) and having health insurance or a means of paying for services. Most (18) who sought care felt it was useful, though dropping out of treatment emerged as an important theme. Reasons for dropping out included lack of time, other life burdens, and simply feeling like the treatment was no longer needed. Conclusion Lack of time on the mother's and provider's end was a consistent theme in surveys and interviews. Stigma, cultural perceptions of mental health, and lack of knowledge on PMD by physicians were repeatedly cited in interviews. Making PMD known within the medical field was stressed. Access to care and support/encouragement from others were facilitators to care. Support was also identified as a mediator to factors causing clients to drop out early.

DEVELOPING COMMUNITY LEVEL INTERVENTIONS TO REDUCE MALARIA AND HIV IN RURAL RWANDA. **K. Redmond**. University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: John Ehiri PhD, MPH, MSc. Site and Preceptor: Inshuti Mu Buzima/Partners in Health - Jean D'Amour Ndahimana, MD, MSc.

Context: Since 2005, Inshuti Mu Buzima/Partners in Health (IMB/PIH) has strived to improve community capacity in rural Rwanda. Working in 3 districts, the Infectious Disease Department fulfills this goal through measuring disease, training community health workers, and developing health programs. Objective: The purpose of this internship was to gain an understanding of program development in limited resource communities, skillsets for infectious disease prevention at the community level, and work experience with a reputable Non-Governmental Organization (NGO). Methods: The internship focused on 2 projects; developing a protocol for case-control study of a school health malaria program (SHMP), and conducting focus groups sessions with Female Sex Workers (FSW) to reduce HIV. Tasks for SMHP consisted of a literature review, selecting control schools, conducting site visits, developing a study protocol and training community health workers and teachers. Facilitation of focus groups for FSW involved interviewing clinic staff, developing questionnaire items, co-facilitating discussion sessions, and preparing formal summaries. Results: The SHMP protocol will be used to expand sites in IMB/PIH's operating districts and eventually with the Ministry of Health to roll out the program at the national level. The summaries will be used to develop a holistic program to supporting FSW. Lessons learned: Focus groups analyzed the needs of FSW living with HIV in 2 districts and assisted with planning for the next fiscal year's program implementation. The case control protocol for the SHMP strengthened the team's efforts to investigate increased pediatric malaria cases, advocate for including schools in community health decisions, and created an evaluation plan to determine the intervention's effectiveness.

ASSESSMENT OF MARIJUANA-RELATED EMERGENCY DEPARTMENT VISITS & HOSPITALIZATIONS POST-LEGALIZATION IN RIVERSIDE COUNTY, CA. **H. Sandhu.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Yann Klimentidis PhD, MS. Site and Preceptor: Riverside County, CA - Wendy Hetherington, MPH.

In the United States, attitudes towards marijuana have been shifting nine states having both approved medical and recreational marijuana laws. In 2012, Colorado and Washington became the first states to legalize the recreational use of marijuana for adults. Recent studies looking at the relationship between marijuana use and emergency department (ED) visits in these two states have reported mixed results. One study indicated an increasing trend in marijuana-related ED visits after legalization but another study reported increasing ED visits only among out-of-state residents. The availability of marijuana and relationship with ED visits may create a burden on healthcare systems and should be investigated as more states begin to legalize recreational marijuana. Recreational marijuana was legalized in California in November 2016 and adults aged 21 and older are able to purchase marijuana with valid identification. This internship focused on trends in marijuana-related ED visits in Riverside County, CA after legalization of recreational marijuana. Methods: Syndromic surveillance data provided by the CDC BioSense platform was used to obtain near real-time hospital data. The final sample included 8,516 ED visits with demographics such as city of admission, sex (male and female), age, and race/ethnicity (Non-Hispanic white, African American, Hispanic or Latino, other races). Results: The rate of ED visits in Riverside County was shown to increase from 2016 to 2017 (67.2 to 158.2 per 100,000). White males in the 18-44 age group reported the most ED visits with a marijuana-related diagnosis within the data collection time period. Conclusions: Preliminary data suggests an increase in marijuana-related ED visits in Riverside County, CA. Data over a longer period of time needs to be collected before firm conclusions can be drawn.

IDLE LESS FOR A HEALTHY SCHOOL ENVIRONMENT. **T. Connors.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Robin Harris PhD, MPH. Site and Preceptor: Pima County Department of Environmental Quality - Beth Gorman, MPA, BA.

Objective: The Environmental Protection Agency (EPA) developed the “Idle Free Schools” campaign to reduce student and school staff exposure to toxic vehicle exhaust. The Pima County Department of Environmental Quality was asked to implement this program. This internship goal was to tailor the program for Pima County to reduce number of idling vehicles and mean idling duration outside school campuses during student pick-up times. Process: The following steps to tailor and implement a pilot study included: acquiring approval with the Pima County Schools Superintendent’s office, modifying the EPA materials, selecting a pilot school, training school staff, conducting pre- and post-campaign field observations of vehicle idling outside of school and questionnaire administration, data analysis, and educational outreach. Results: One elementary school was recruited with baseline measures assessed in September 2018. During a 3-day period, 276 cars were observed idling outside the school compared to 15 non-idling cars [mean idling duration/day = 20.7 minutes]. This would be equivalent to an estimated emission of ~3,414.14g CO/day, ~55.25g NO/day, ~209.67g volatile organic compounds (VOCs)/day, and 360.60lbs CO₂/day. A school leader was identified and trained via two presentations. Students were trained by the leader to encourage change in car-idling behavior during pickup and questionnaire administration. Follow-up field and data collection will be made in November 2018. Discussion: While final results are pending, initial findings suggest that the program is being well received by the school, as well as at the Pima County Schools Superintendent’s office. A descriptive standard operating procedures will be developed to provide step-by-step instructions to assist PDEQ staff on future program implementation at other schools.

THE EFFECT OF HORMONE RECEPTOR STATUS ON BREAST CANCER TREATMENT IN DAR ES SALAAM, TANZANIA. **M. Habila.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Elizabeth Jacobs PhD. Site and Preceptor: Dar es Salaam, Tanzania - Khadija Msami, MD.

Introduction Breast cancer is the leading cancer in women globally. Women in developing nations experience high mortality rates due to late diagnoses and lack of access to care. Research suggests that African women are more likely to have estrogen receptor (ER) negative tumors. The aim of the present study was to determine the effect that knowledge of hormone receptor status would have on breast cancer treatment in Dar es Salaam, Tanzania. **Methods** This study was a retrospective analysis of cases that sought treatment at Ocean Road Cancer Institute from 2007-2009, 2014, 2015, and 2016-2017. Data were abstracted from medical records in 2016 and 2017, and data from previous studies conducted by Taylor Sullivan and Ashley Burson (2009) were used in the analysis. **Results** Among 1450 breast cancer cases, 63.6% of women were diagnosed in stage 4. A total of 93.5% of the patients received chemotherapy and 90.7% of the patients received surgery. ER negative breast cancer was found in 33% of women. There were significant differences in the proportion of patients who received neoadjuvant ($p < 0.0001$) and adjuvant chemotherapy ($p = 0.036$) in the time before and after hormone receptor status. The proportion of people who received hormone therapy differed significantly between the two groups as well; however, 15% people received hormone therapy in the time before hormone receptor status was introduced compared to 12% in the time after. **Conclusion** These findings suggest that there have been significant changes in treatment protocols for breast cancer patients in the time before and after the introduction of receptor status. However, further research is needed in order to determine how hormone receptor status can be used to optimize standardized treatment protocols for patients diagnosed with breast cancer.

OPIOID OVERDOSE PREVENTION IN PIMA COUNTY. **A. Shilen.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Elizabeth Jacobs PhD. Site and Preceptor: Pima County Health Department - Raul Munoz, BS.

This report details an internship at the Pima County Health Department in Prescription Drug Overdose Prevention, a grant-funded program heavily focused on reducing opioid-related mortality. The objective of this internship project was to create a publicly available online directory to streamline opioid-related services within Pima County, including medication-assisted treatment (MAT) facilities, Naloxone dispensing sites, and mental health resources. After securing funding, a website domain and template were purchased in collaboration with the Pima County Internet Technology Team. Opioid-related programs and services within Pima County were identified using the Substance Abuse and Mental Health Services Administration (SAMHSA) Treatment Locator. A survey was developed and sent to Healthy Pima Referral and Treatment Task Force members to identify services not listed within SAMHSA as well as confirm facility details, including services offered, populations served, and hours of operation. Naloxone distribution sites were identified and mapped out on the Google Map interface. Educational content was created for an informational page related to opioid use, signs and symptoms of overdose, common treatment options, and Naloxone administration. AmeriCorps Members assigned to the project are continuing the development of the website with the intention of addressing other drug categories. The launch goal for the website is December 2018. To date, 44 MAT clinics, 106 Naloxone dispensing sites, 46 mental health facilities, and 45 substance abuse facilities have been identified. A large proportion of these facilities are located within Tucson city limits: 91.3%, 92%, 91.3% and 95.6%, respectively. These results show that Pima County is not sufficiently prepared to address health care needs related to opioid use disorder.

ORGANIZATIONAL AND PROGRAMMATIC ASSESSMENT FOR SOUTHERN ARIZONA ROADRUNNERS. **C. L. Erdelyi**. University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Maia Ingram MPH. Site and Preceptor: Southern Arizona Roadrunners - Dari Duval, MS.

Background: Organizational and programmatic assessments and evaluations are powerful tools that can be used by public health organizations to optimize performance, enhance outcomes, guide policy change, and determine areas for growth potential. Objective: The objective of the internship was to assist Southern Arizona Roadrunners (SAR) in better aligning its public health initiatives to serve the community and increase its capacity to promote positive health behaviors. Methods: In order to assess the current efforts of SAR Board and its youth programming, a logical model was first created for both the SAR Board operations and the Children's Fitness Fund (CFF). A self-assessment survey was administered to the SAR Board and a process evaluation was conducted to assess the CFF. Results: The Board survey provided insight into the short and long-term objectives and identified strengths and weaknesses in governance and operations. The results guided the restructuring of policies and bylaws and development of a strategic plan and for SAR. From this SAR has improved the efficiency and effectiveness of their governance and has identified the steps needed to achieve their goal of improving their public health initiatives. The outcome of the CFF process evaluation found that CFF was not being administered consistently therefore evaluation and development of the program were minimal. The evaluation served as the basis for redevelopment of the CFF activities and objectives that resulted in providing SAR with the means to better assess the impact and establish greater accountability and reporting for CFF. Conclusion: Further outcome and impact evaluations are needed in order to continue to assess the effectiveness of the policy and programmatic changes made to the Southern Arizona Roadrunners Board and Children's Fitness Fund.

**Session IV:
1:00 – 3:00**

Drachman Hall, Room A120

Abstracts

REDUCING THE RATE OF HEALTHCARE ACQUIRED INFECTIONS AT KAISER PERMANENTE WASHINGTON REGION. **S. Khan.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Elizabeth Jacobs PhD. Site and Preceptor: Kaiser Permanente Washington Region - Capitol Hill Campus - Elizabeth Rowan, RN, MSN, MBA.

Hand hygiene has been a staple of infection prevention since the 17th century, when it was noted rates of infection in postpartum women plummeted after physicians used a chlorinated lime solution prior to delivering children. Since then, hand hygiene has been proven to be the single most important act performed by healthcare workers to reduce the transmission of disease. In the past century, hand hygiene technology has improved with the introduction of alcohol-based hand gels and wipes. Per the CDC, Hand Hygiene is a general term that applies to either hand washing, antiseptic handwash, antiseptic hand rub, or surgical hand antisepsis. Although the research is clear on the importance of hand hygiene, compliance in a healthcare setting remains at approximately 40-50%. The objective of this internship was to increase hand hygiene compliance rates across 10 departments at Kaiser Permanente Washington Region: Capitol Hill Campus. To first capture accurate hand hygiene compliance rates in these 10 departments, the surveillance form and method had to be evaluated and, if needed, corrected. After creating a valid hand hygiene surveillance form, interactive in-service staff trainings and education were provided to low-performing departments. Hand hygiene compliance rates for Quarter 3 and Quarter 4 will be available at the end of year, and reported to hospital quality and oversight committees. Preliminary data suggest that the reinvented form is capturing more accurate compliance rates than previously captured in Q1 and Q2, resulting in a decrease in hand hygiene compliance rates for Q3. After obtaining a new baseline hand hygiene compliance rate from Q3, we expect compliance rates to increase as a result of training and education provided to staff via online modules and in-service training.

DEVELOPMENT OF WELL WOMAN HEALTHCHECK PROGRAM'S PATIENT QUESTIONNAIRE. **L. Riley.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Elizabeth Jacobs PhD. Site and Preceptor: Pima County Health Department - Laura L. Hopkins BS, MS.

Introduction: The Well Woman Health Check Program (WWHP) provides free breast and cervical cancer screenings, diagnosis, care coordination, and treatment referral to low-income, underinsured, and uninsured women, with the goal of decreasing morbidity and mortality from breast and cervical cancer. As Pima County Health Department's (PCHD) WWHP looks to the future, its goal is to serve future patients in a manner that best suits their individual needs, not through making assumptions, but by obtaining feedback on the experience of current patients and responding appropriately. Methods: A patient satisfaction/program evaluation questionnaire was created, guided by scientific literature and current program objectives and operations. Evidence-based literature on program evaluation, questionnaire creation, and breast and cervical cancer screenings among Hispanic populations was used, along with information gathered on WWHP, shadowing its daily operations at PCHD, and feedback from WWHP staff. Results: The questionnaire tool was created, edited as needed, and approved (by the program's Coordinator). The questionnaire includes two separate sections with distinct administration: "Initial Appointment" and "Follow-Up". Conclusions: Low-income, underinsured, uninsured, and Hispanic women are particularly at-risk for not receiving nor being able to navigate breast and cervical cancer screening and diagnosis. This questionnaire will allow WWHP programming to determine whether access to services is meeting the needs of its population, how clients can be better-served to improve patient care, and ensure that all women in the community who require its services are aware of and able to access them.

AN INDUSTRIAL HYGIENE INTERNSHIP AT RISK MANAGEMENT SERVICES:
EXPOSURE ASSESSMENT OF 3D PRINTERS. **L. Gabir**. University of Arizona, Tucson,
U.S.A. MPH Internship Committee Chair: Jeff Burgess MD, MS, MPH. Site and
Preceptor: Risk Management Services - John Murphy, MPH, CSP.

Introduction: The industrial hygiene internship at UA Risk Management Services entailed respirator fit testing, ergonomic assessments, workplace monitoring/evaluation, and an exposure assessment of 3D printers in an office setting. Methods: University students and staff were fit tested for N95, half face and full face masks using quantitative and qualitative methods. Ergonomic assessments entailed evaluating postures of UA employees while they were working and then providing recommendations. Mold samples were collected with swabbing and air sampling. Buildings were sampled for asbestos before demolition. Real time monitoring for volatile organic chemicals (VOCs) in a room that contained seven 3D printers was done with PersonalDataRams and photoionization detectors. Results: Fit tested students and staff were certified for one year. Employees who received ergonomic assessments were provided recommendations for workplace improvements. Building materials containing asbestos were abated. Mold did not pose an indoor air quality (IAQ) concern in buildings that were monitored. VOC levels were higher while 3D printers were in use. To mitigate further exposures, a standard operating procedure was created and the library employees replaced acetone with a less irritating product. Discussion: Fit testing is required by OSHA for employees who are required to wear respirators. Musculoskeletal disorders (MSDs) are common workers' compensation claims, and an ergonomic assessment with implemented recommendations is one way to reduce the risk. Monitoring for mold is a challenge because it is variable and there is no regulatory standard. It is important to monitor for IAQ that may be impaired by 3D printers since employees and students who work nearby may be adversely affected.

MOSQUITO SURVEILLANCE IN PIMA COUNTY, ARIZONA. **J. Dillard.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Stephanie Griffin PhD, CIH. Site and Preceptor: Pima County Health Department - Amanda Anderson, MPH.

Introduction: Surveillance is an important service provided by public health agencies. Routinely monitoring the distribution of mosquitoes enables health departments to address any issues related to disease vectors (e.g., mosquitoes becoming a public nuisance or causing cases of life threatening vector-borne diseases). Methods: Mosquito traps were set in accordance with the health department recommendations and guidelines. Rapid Analyte Measurement Platform testing was performed to determine if West Nile virus was present in any female *Culex* species mosquitoes collected. Identification of the mosquitoes' sex and species was done in the health department's laboratory. Mosquito trapping data were layered on a base-map of Arizona from the Environmental Systems Research Institute database in ArcGIS 10. Educational materials were created with the online infographic service Piktochart. Results: By the end of June 2018, there were a total of 679 mosquito traps set around Pima County. A total of five different collection methods were utilized including carbon dioxide light traps (501), ovicup/ovitrap (167), larvae and pupae collection (1), BG-Sentinel traps (9), and gravid traps (1). Nine different mosquito species were collected with the most prevalent being *Psorophora columbiae* (64.5%), *Culex tarsalis* (12.3%), *Culex quinquefasciatus* (7.6%), *Aedes aegypti* (7.4%), and *Psorophora ciliata* (7.1%). Conclusion: Most of the mosquitoes collected were not disease vectors and the species that were vectors did not test positive for the infectious agents. More mosquito traps need to be placed throughout Pima County to improve surveillance efforts. Increased trapping in geographically isolated areas and sharing data with other public health agencies would increase the understanding of the mosquito distribution in Pima County.

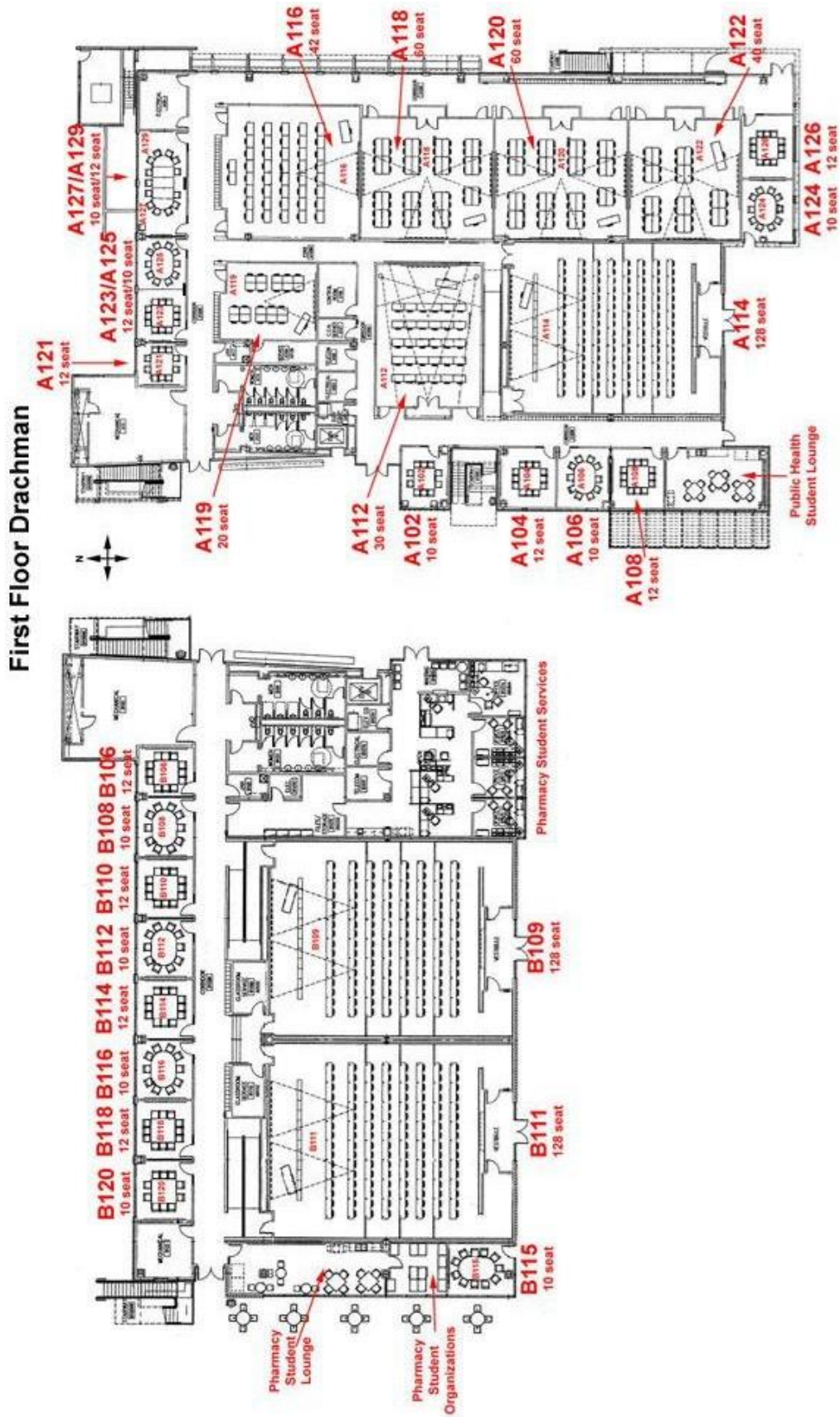
SAFETY PLANS, ENVIRONMENTAL SITE ASSESSMENTS AND INDUSTRIAL HYGIENE EVALUATIONS WITH A NATIONAL CONSULTING FIRM. **G. Mancillas**. University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Stephanie Griffin PhD, CIH. Site and Preceptor: Terracon Consultants, Inc. - Michael S. Crandall, MS, BS, CIH, LEED AP.

Introduction: Terracon is a national consulting firm specializing in environmental, geotechnical, and materials testing. The bulk of this internship focused on Phase II Limited Site Investigations, asbestos inspections, and ventilation assessments. The City of Tucson established a Brownfields environmental program used to redevelop sites that have perceived or known contamination. Terracon offers Phase II and asbestos assessments for potentially impacted sites. In addition to these activities, this internship included the evaluation of ventilation controls at industrial facilities to reduce occupational hazards. Methods: Phase II LSI's involve soil sampling at various depths below ground surface to evaluate impacted conditions of soil with hazardous contaminants. Asbestos inspections were conducted at buildings proposed for demolition to ensure EPA emission compliance. Ventilation assessments involved air flow visualizations with smoke tubes and the use of a velometer for capture velocity at chemical hoods. The ACGIH Industrial Ventilation Manual provided evaluation criteria for particular contaminants and hoods. Results: Using various EPA methods, residential and non-residential SRLs were below limits for soil sampling. Asbestos containing materials (ACM) were identified using polarized light microscopy. ACM were identified in historic structures, friability was classified according to the condition of the material. Ventilation hood flow rates varied between recommended values provided by ACGIH, well maintained hoods showed effective ventilation controls as compared to poorly maintained hoods. Conclusions: The asbestos and soil surveys helped developers proceed with the development of historic sites. The ventilation surveys assisted clients with information on their control mechanisms for hazardous chemicals.

CHLOROHEXIDINE GLUCONATE BATHING COMPLIANCE IN MRSA POSITIVE PATIENTS AT ST. MARY'S HOSPITAL. **E. Ornelas.** University of Arizona, Tucson, U.S.A. MPH Internship Committee Chair: Mary Kay O'Rourke PhD. Site and Preceptor: St. Mary's Hospital Infection Prevention and Control Department - Erica McClain, RN.

Introduction: St. Mary's hospital is an acute care facility with a 400-bed capacity that serves Southern Arizona in the Carondelet health network. Methicillin-Resistant Staphylococcus aureus (MRSA) is a drug resistant bacterium associated with morbidity and mortality across all healthcare facilities in the US. Purpose: Along with the St. Mary's Infection Prevention and Control department, the purpose of this project was to begin a surveillance program that would relay results to the Infection Prevention and Control Committee (IPCC). Methods: Positive patients were identified through swabs of nasal or infected area(s) and culturing. Patient charts were then checked for Chlorhexidine Gluconate (CHG) baths and tracked through an excel sheet. Results: Over the summer, I worked with the department to start a surveillance program to determine the compliance level of the hospital's units. Hospitals are required to have 100% compliance with CHG bathing daily, when a patient is identified to have MRSA. I reviewed about 108 patients including repeat visitors for the program. Overall, the hospital's total compliance came out to 48% in July, 67% in August, and 57% in September. The percentages were calculated from data that was also presented graphically and was separated by hospital units. These percentages were presented at the Infection Prevention and Control Committee meeting where managers and directors are shown the data. Conclusion: Infection Prevention is not just a small group isolating patients, it's an interdisciplinary approach that requires the patient's whole healthcare team to make sure both patients and staff are safe, especially with the threat of multidrug resistant bacteria like MRSA.

Drachman Hall Map



The MPH Internship Experience

From the inception of the Master of Public Health Program in 1993, the culminating experience of the program's curriculum has been the internship. In the fall of 1999, MPH faculty determined that students needed a formal setting for making their oral presentations. A committee comprised of faculty, students, and student services professionals was formed to develop an appropriate presentation venue. In November 1999, the MPH Program debuted its first MPH Internship Conference. The format of the conference, held each fall and spring, is similar to that of a professional or scientific meeting.

Since its establishment, the MPH Internship Conference has grown in stature and significance to the Mel and Enid Zuckerman College of Public Health (MEZCOPH). The College uses this event as a public health networking tool by inviting public health practitioners, partners, and alumni throughout the state. The key to its success lies in the student participation. The MPH Internship Conference is a student-run production. Students coordinate the multitude of details involved in its planning, promotion, and culmination; student presentations are its foundation.

Through contributions they have made and the benefits they have gained, the Internship Conference reflects the indelible handprint of MEZCOPH students on public health projects and agencies throughout the world.



THE UNIVERSITY OF ARIZONA

**Mel & Enid Zuckerman
College of Public Health**