

Southwest Center for Agricultural Health, Injury Prevention, and Education

Annual Report Fiscal Year 2004

(September 30, 2003 – September 29, 2004)

Submitted By:
Jeffrey L. Levin, M.D., M.S.P.H.
Center Director
University of Texas Health Center at Tyler, TX

Southwest Center for Agricultural Health, Injury Prevention, and Education

I. INTRODUCTION & EXECUTIVE SUMMARY OF THE PROGRAM

This year was notable for the concentration of activities related to collaborations and education. Center-based education activities and product development demonstrate progress toward R2P that will be realized through the duration of the current funding cycle as strategic dissemination and effectiveness evaluations are documented.

The Southwest Center for Agricultural Health, Injury Prevention, and Education (SW Center) participated in the overall conference planning group for the Fifth International Symposium – The Future of Rural Peoples and collaborated specifically with the Western Center to organize and chair the session on Health of Hired Farm Workers. The session, moderated by Center Director Jeffrey Levin, included presentations reporting work from two SW Center sponsored projects. Further, the session culminated in the development of a list of priorities in this topic for research, policy, and practice.

Working in partnership with the Great Plains Center, the Center for Bio-security and Public Health Preparedness at the University of Texas – Houston School of Public Health, The Cooperative Extension Experiment Stations, and the Texas Department of Health, with partial conference grant funding from CDC, the SW Center delivered a case-based program to help leaders at the community level understand the potential for an agro-terrorism event, as well as the surveillance, appropriate notifications, investigation process, and debriefing that should be considered in local planning for preparedness. The workshop was broadcast via Interactive Tele-video linking audiences at nine sites. The workshop content was synthesized and reproduced on CD to assist facilitation of discussion among local preparedness planning groups. Dissemination and follow-up are part of FY05 outreach, education and networking plans.

The SW Center supported five successful feasibility studies this year. Two were completed by physicians in the Occupational Medicine Residency Program at UTHCT; both investigators presented their findings at a regional Continuing Education program for health professionals throughout East Texas and neighboring states. The keynote speaker for that conference was NIOSH Director, Dr. John Howard. One resident project developed a prototype occupational history survey that proved effective in both English and Spanish and will be incorporated into the methodology of other Center research projects. The other analyzed data from the U.S. Coast Guard District 8 and included a site assessment of work organization, occupational hazards, work conditions, and the worker population. Inclusion of agricultural research in the residency program has demonstrated effective capacity-building for enhanced clinical skills related to occupational history taking and practical research experience to critically interpret results from other research. Three of the five projects have been successful in securing funds to expand their projects. One determined that the potential hazard being explored has been eliminated due to genetic engineering of plants and one produced a tested product that can be replicated.

With support from the NIOSH office of Extramural Programs, all of the Agricultural Research Centers have worked together to first produce the National Tractor Safety Initiative and subsequently to generate a matrix of projects to respond to the recommendations in a manner that engages partners and uses participatory research methods to understand and support local issues relative to tractor safety risks and behaviors.

The SW Center responded to a Request for Proposal for supplemental funding for projects with a research to practice emphasis. Two projects were approved for funding in the competitive review process. “Development of Culturally Sensitive Safety Training for Vietnamese Shrimpers in U.S. Coast Guard District 8” is under the direction of Dr. Levin. This project builds on the results of a feasibility study and a strong collaborative relationship developed with the area office of the U.S. Coast Guard. The second project is under the direction of Dr. Martha Vela-Acosta based at the University of Texas - Houston School of Public Health satellite campus in Brownsville, TX. “The First Texas Bi-Lingual Occupational Health and Safety Curriculum” was developed, translated, and pilot-tested as a feasibility study. This phase of the project will expand implementation of the curriculum and test methods for effectiveness of follow-up, report-back, and information application by students of the program.

A highlight of the year was the SW Center participation in the 2004 National Symposium on Agricultural Safety and Health in Keystone, Colorado. The Center was well-represented with eight project presentations and a plenary session on agroterrorism. The SW Center board meeting, comprised of External Advisory Board members and Principal Investigators for all funded projects was held in conjunction with the symposium to facilitate exposure to the work and priorities of the other NIOSH agricultural centers.

The External Advisory Board continues its very active participation in SW Center work. All have participated in review of project-developed materials, served as Beta testers of products, and been ambassadors to expand awareness of the Center’s mission and projects. In addition to volunteering their time to attend a Board meeting they have engaged individuals within their spheres of influence to become active participants in SW Center projects.

The SW Center continues to serve as the publisher of AgConnections and works closely with all of the other NIOSH Agricultural Centers to share project notes, Center news, and resource information. A central contract database has improved efficiency of dissemination by eliminating duplication and informing centers of address corrections.

In addition to its ongoing and active role in education and outreach, the SW Center continues to focus on the scope of work originally proposed in this grant cycle. The Center project updates enumerated in this report demonstrate the manner in which SW Center efforts remain aligned with this scope of work. Specific examples include:

- The geographic distribution of efforts and collaborative interaction among centers
- Emphasis on under-represented populations such as women, children, and the Navajo in agriculture

- Development of an injury prevention project focusing on Gulf Coast fishing operations with attention to under-represented populations and development of interagency collaborations
- Enhanced R2P efforts as results from the study of the genetic implications of exposure to estrogenic pesticides evolves to epidemiologic assessment
- Application of technology to enhance outreach to rural agricultural populations (e.g.: interactive televideo)

Although the preparation of the original scope of work predates September 11, 2001, it has been considered reasonable and appropriate to incorporate efforts toward public health preparedness and agroterrorism and to leverage Center resources in securing other funding (as with the CDC conference grant).

As evidenced in the project updates that follow, a number of manuscripts and products have been generated from Center sponsored work. These numbers will continue to grow as projects progress with data collection and analysis.

A. CENTER ACCOMPLISHMENTS FOR FY 2004

1. Organized and moderated the session, “Health of Hired Farm Workers in Rural Communities” for the Fifth International Symposium – Future of Rural Peoples, Saskatoon, Saskatchewan, Canada.
2. Produced the Interactive Televideo Conference, “Agroterrorism Workshop: Engaging Community Preparedness”, that linked nine locations, two states, and a sister Agricultural Research Center.
3. Co-sponsored the CME program, “Occupational Health: The Changing Work Environment”, Keynote Address by NIOSH Director, John Howard, MD, MPH, JD, LLM.
4. Continued production and national distribution of AgConnections, the newsletter for the NIOSH Agricultural Centers Initiative.
5. Secured funding for two new projects in a competitive supplemental funding application.
6. Successfully completed five funded feasibility studies.
7. Actively participated in activities related to developing the National Tractor Initiative.

B. REGIONAL ACTIVITIES

1. States Served by Center:
Arkansas, Louisiana, Oklahoma, New Mexico, Texas
2. States with Center Activity for FY 2004:
Arizona, Arkansas, Colorado, Louisiana, Oklahoma, New Mexico, Utah, Texas

II. REPORT ON THE OUTREACH PROGRAM

The outreach program for the SW Center consists of three components:

1. Dissemination and evaluation of Center products in other communities in the region
 - a. Livestock Safety for Kids, a supply of videos and the beta tape for additional copies has been secured. Plans are underway to target communities for implementation of both the 1-3 grade levels, as well as the classroom materials targeting 5th grade students.
 - b. Cattle Handling Safety video, the beta video has been secured and will be used to make copies for distribution in “train-the-trainer” sessions.
 - c. First Aid Farm Quest this interactive CD aimed at 9-11 year olds is being finalized. Funds will be allocated to assist with regional dissemination under the direction of P.I. Dr. Ann Carruth, Southeastern Louisiana University.
 - d. Agroterrorism Workshop: Engaging Community Preparedness this CD serves as a facilitator’s guide for local planning groups. Plans for dissemination targets public health and regional preparedness groups.
 - e. Bites, Stings, and Venomous Things is a CD with critical information to prevent and administer field first aid for bite/sting victims. Currently in beta development, funds will be used to finalize the product and develop a dissemination plan targeting health care providers, loggers/forestry workers, farmers, cooperative extension, and science teachers.
2. Collaborate with other stakeholders to sponsor train-the –trainer programs. Target audiences include cooperative extension (farm safety, emphasis on tractors and animal handling), Area Health Education Centers (emphasis on farm first aid, community health workers’ preparation for farm safety and emergency preparedness), Farm Bureau (emphasis on farm safety, tractors, and cattle handling).
3. Provide support for continuing or other educational programs to enhance knowledge and appreciation of agricultural work exposures.

III. CENTER PROJECT REPORT BY CORE

RESEARCH CORE

A. Project Title:

A Study of Work Injuries in Farmworker Children/STARRS: South Texas Adolescent Rural Research Study

B. Project Officer

Sharon P. Cooper, Ph.D.
3000 Briarcrest Dr. Suite 300
Bryan, TX 77802
Phone: (979) 458-8059
Email: spcooper@srph.tamhsc.edu

C. Project Description

(Due to sample size issues, this project was redesigned during FY02 and FY03. Descriptions below reflect the change.)

Revised and current description:

A dynamic cohort of high school students in Starr County, TX was formed and initially surveyed in 2003 and will be followed prospectively for 2 years with subsequent surveys in 2004 (FY04) and 2005 (FY05) in Roma High School. This study seeks to describe work patterns and to identify risk factors for injuries in farmworker children, and to compare farmworker adolescents with adolescents working non-farm jobs with respect to their work patterns, demographics, health status, health behaviors, and occupational injury.

Specific Aims

1. To use participatory rural appraisal techniques to develop the definition of injury and to ascertain injuries in a population of farmworker children. **Not revised/Completed.**
2. To develop a household questionnaire to collect information (from mothers) on household composition, demographics, work history, work exposures (hazards) and injury experience of children (with focus on back injuries). *Not revised for first half of Year 2, omitted for second half of Year 2 and beyond.* **Omitted per revised protocol.**
3. To develop a web-based survey to collect information from high school students on demographics, health status, health behaviors, work patterns, work exposures (hazards) and injury experience of adolescents (with focus on back injuries). **Revised FY03/Completed.**
4. To conduct a web-based annual (10/03-10/05) survey of all students attending high school in Starr County, TX. All students are eligible to participate. The survey will be administered during English class because all students must be enrolled in at least one English class. In addition, there will be make-up days for students not able to take the survey during their assigned time. **Revised FY03.**

Revised Aim 4 for FY04: To conduct a web-based survey of all students attending high school in Starr County, TX. All students are eligible to participate. The survey will be

administered during English class because all students must be enrolled in at least one English class. In addition, there will be make-up days for students not able to take the survey during their assigned time (**FY03/Completed**). For FY04 and FY05, to conduct a web-based annual survey of students attending Roma High School. All students are eligible to participate. The survey will be administered during social studies classes based on a suggestion from the Associate Principal. There will be make-up days for students not able to take the survey during their assigned time or who are not enrolled in a social studies class. **Revised FY04.**

5. To survey all adolescents (regardless of injury status) in each of the three Starr County, TX high schools (Rio Grande City, Roma, and San Isidro) to form a cohort that will be followed for 2 additional years in order to ascertain risk factors for work-related injuries with a focus on agriculturally-related injuries. **Revised FY03.**
Revised Aim 4 for FY04: To survey all adolescents (regardless of injury status) in each of the three Starr County, TX high schools (Rio Grande City, Roma, and San Isidro) and to ascertain risk factors for work-related injuries with a focus on agriculturally-related injuries (FY03/Completed). For FY04 and FY05, to survey all students (regardless of injury status) attending Roma High School in order to following the cohort consisting of Roma students that will be followed for 2 additional years in order to ascertain risk factors for work-related injuries with a focus on agriculturally-related injuries. **Revised FY04.**
6. To evaluate concordance between mother and child reports with respect to frequency and type of injuries and work hazards. **Omitted per revised protocol.**
7. To conduct a pilot study of neuropsychological/neurobehavioral assessments of farmworker children suspected of increased exposure to pesticides. Not revised.
8. To build a coalition of community and research members to address study findings and make recommendations for feasible interventions and future research. Not revised.

FY04 objectives

1. Complete data analysis of FY03 data.
2. Collect the FY04 data in Roma High School.
3. To complete preliminary data analysis of FY04 data.
4. To complete the FY03 and FY04 data analysis of the back pain data.
5. To produce two manuscripts for publication focusing on the FY03 and FY04 back pain/problems data.
6. To conduct the pilot study of neuropsychological/neurobehavioral assessments of farmworker children.

D. Project Start and End Dates

9/30/01 to 9/29/06

E. Project Activities/Accomplishments

- 10/20/03-Received IRB approval for obtaining participant/child assent electronically.

- 10/03 to 9/04-Successfully implemented new study protocols for field activities per the new study design (school-based cohort study) developed in FY02.
- 9/03 to 12/03-Completed the first year of data collection for the cohort study. Surveyed approximately 2,505 high school students attending high school in Starr County, TX. Rally towels were provided upon return of the parental consent form while a t-shirt/spirit shirt was provided upon participation in the survey.
- 2/04 to 9/04-Completed preliminary cleaning and preliminary analysis of data collected in 2003.
- 2/04-Made decision to limit study population to Roma High School for FY04 and FY05 after consideration of budget limitations.
- 7/19/04-Revised parent consent form was reviewed and approved by TAMU-IRB.
- 7/04 to 9/04-Modified the computer survey for data collection in 2004 (FY04). Items deemed problematic or confusing during data collection in 2003 (FY03) were modified or removed and additional items were added.
- 7/04 to 9/04-Developed a pilot to assess the feasibility of collecting data on neuropsychological symptoms potentially associated with pesticide exposure in adolescent farmworkers after conducting a thorough literature review and contacting experienced researchers outside of TAMU-SRPH. The pilot includes adding to the survey a modified version of the Q-16, a self-administered scale used in variety of populations including adolescent workers.
- 9/04-Planned a pilot of the revised survey. The pilot will take place in FY04 on October 12, 2004 with approximately 10 students who do not attend Roma High School.
- 8/04 to 9/04-Planned the first advisory board meeting scheduled to take place in FY04 on October 14, 2004 in Rio Grande City, TX.
- 9/04-Submitted continuing review application to IRB for approval from 11/11/2004 through 11/10/2005.
- 9/04-Hired a student to work part-time in Roma. Duties include collecting and organizing consent forms.
- 8/04 to 9/04-Prepared for FY04 data collection scheduled for 11/04.

F. Project Products

Presentations:

Work Injuries among Adolescent Farmworkers. Cooper, SP, Shipp, EM, 2004 National Symposium on Agricultural Health and Safety, June 20-24, 2004 Keystone, CO.

Injuries in Farmworker Families: An Elusive Concept. Cooper, SP, Oral presentation at the Future of Rural Peoples 5th International Symposium. October 21, 2003 Saskatoon, Saskatchewan, Canada.

Pesticide Safety Training in Migrant Farmworker Mothers and Children from Starr County, TX Shipp, EM, Oral presentation at the Future of Rural Peoples 5th International Symposium. October 22, 2003 Saskatoon, Saskatchewan, Canada.

Publications

Peer Reviewed

Shipp, EM, Cooper, SP, Burau, KD, Bolin, JN. Pesticide Safety Training and Field Sanitation in Migrant Farmworker Mothers from Starr County, TX. *J Agric Saf Health*. (in press).

Cooper, SP, Weller, NF, Fox, EE, Cooper, SR, Shipp, EM. Comparative description of Migrant Farmworkers vs. Other Students Attending South Texas Schools: Demographic, Academic, and Health Characteristics. (submitted, 2004)

Cooper, CJ, Cooper, SP, del Junco, DJ, Shipp, EM, Whitworth, RE, Cooper, SR. Web Data Collection and Management for Epidemiologic Studies: A Dynamic Approach. (submitted, 2004)

Cooper, SP, Burau, KD, Frankowski, R, Shipp, EM, del Junco, Deborah, Whitworth, RE, Sweeney AM, MacNaughton, N, Weller, NF, Hanis, C. A Cohort Study of Injuries in Migrant Farmworker Families in South Texas. (submitted, 2004).

Cooper, SR, Cooper, SP, Felknor S, Santana V, Fischer F, Shipp EM, Vela-Acosta SM. Commentary: Non-traditional Work Factors in Farmworker Adolescent Populations: Implications for Health Research and Interventions. (submitted, 2004).

Fact Sheets/Brochures/Technical Publications:

National Farmworker Health Lines Brochure (Revised 2004 version): A list of health-related organizations who serve Hispanic, migrant, and/or farmworker populations. Toll-free numbers are included. The target audience includes farmworkers as well as individuals who serve farmworker populations.

G. States the Project Was Active In

Texas

Research Core

A. PROJECT TITLE

Reporter Gene Systems for Evaluating Endocrine Disruptive chemicals

B. Project Officer

David L. Busbee, PhD
Department of Integrative Biosciences
College of Veterinary Medicine and Biomedical Sciences
Texas A&M University
College Station, TX 77843
dbusbee@cvm.tamu.edu
979-845-2828 or 6463

C. PROJECT DESCRIPTION

1. Develop investigative tools that will detect and quantify chemicals that disrupt endocrine function in human cells and thereby alter human health.
2. Use the investigative tools to evaluate a series of agricultural chemicals to identify and quantify their potential disruption of human health by altering gene expression essential for normal fetal growth and development and for normal human health.

D. PROJECT START AND END DATES

09/29/2004 – 10/01/2005

E. PROJECT ACTIVITIES / ACCOMPLISHMENTS

- The TAMU College of Veterinary Medicine purchased a GenePix 400B for this Laboratory that has allowed us to initiate DNA microarray analysis of expression of specific genes in the presence of agricultural chemicals.
- To date we have initiated analysis and have array data on the chemicals listed
 - atrazine
 - fenbuconazole [Enable]
 - diazinon
 - 2,4-D and TCDD [a contaminant of 2,4-D]
 - Roundup
- For each chemical, a list of genes up- or down-regulated has been established and specific genes have been selected for corroborative analysis.
- For TCDD the single gene selected was insulin receptor substrate-1. Reverse transcriptase, quantitative PCR was completed on selected genes and their expression was quantified by determining the amount of mRNA present in each cell sample.

- The initial findings from this study have been published : Down-regulation of a gene associated with the onset of non-insulin-dependent-diabetes mellitus, type 2 diabetes. Hum Exp Toxicol 23(11):1-10, 2004.]
- The Department of Integrative Biosciences has initiated the purchase of an ABI 7500 real time quantitative PCR for this laboratory at a cost of \$42,000, to make possible the rapid corroborative analysis of chemical activity.
- Private Foundation funding is actively being sought to augment current and ongoing project work.

F. PROJECT PRODUCTS

Presentations

Busbee, D., Hokanson, R., and Chaudhary, R. Agricultural chemicals may act as Endocrine disruptors. NIOSH symposium on Agriculture Safety and Health. Oct, 2003

Busbee, D., Mankamy, T., Hokanson, R., and Chaudhary, R. Endocrine disruption by the agricultural chemicals Enable and diazinon. 2004 National Symposium on Agricultural Safety and Health Keystone, Co., June 2004.

Publications

Peer Reviewed Journal

- Pine, M., Schroeder, M., Greer, K., Hokanson, R. and Busbee, D. Generation and Partial characterization of a transformed cetacean cell line. J Aquat Toxicol 67(2):195-202, 2004.
- Hokanson, R., Miller, S., Hennessey, M., Hanneman, W., and Busbee, D. Disruption of estrogen-regulated gene expression by dioxin: Down-regulation of a gene associated with the onset of non-insulin-dependent diabetes mellitus, type 2 diabetes. Hum Exp Toxicol 23(11):1-10, 2004.
- Pine, M., Greer, K., and Busbee, D. Comparison of glutathione, glutathione peroxidase, glutathione reductase, and catalase in a transformed renal epithelial cell line (DKN1): comparison with levels in a continuous artiodactyl renal epithelial cell line. (LLC-PK₁). Accepted for publication, J Aquat. Toxicol.
- Mankame, T.P., Hokanson, R., Chowdhary, R., and Busbee, D.L. Alteration in gene expression in MCF-7 cells after treatment with the fungicide Enable. In press, Journal of Industrial Toxicology.
- Mankame, T.P., Hokanson, R., Chowdhary, R., and Busbee, D.L. Alteration in gene expression in MCF-7 cells after treatment with the pesticide diazinon. Submitted to Human and Experimental Toxicology.
- Hokanson, R., Miller, S., Hennessey, M., Flesher, M., Hanneman, W., and Busbee, D. Inhibition of gene expression and potential adverse health outcomes due to DEHP (diethylhexylphthalate) exposure. Submitted for publication.

G. STATES THE PROJECT WAS ACTIVE IN

Texas and Colorado

Education Core

A. Project Title

Farmworker Occupational Health Education and Outreach Project

B. Project Officer(s)

Roberta E. Ryder
1770 FM 967
Buda, TX 78610,
512-312-2700
ryder@ncfh.org

C. Project Description

This encompasses three primary areas of focus: 1) support of occupational health and safety related research on migrant and seasonal farmworker issues, 2) outreach and education on occupational health and safety directly to migrant and seasonal farmworkers; and 3) outreach and technical assistance on occupational health and safety topics to migrant health providers and others serving the migrant and seasonal farmworker population. The provision of education, networking, and development of collaborative efforts between providers and researchers is accomplished through the research methods intensive workshop and research track presentations at the Midwest Farmworker Stream Forum and at research workshops at both the Eastern and Western Migrant Stream Forums. The provision of occupational safety and health messages directly to farmworkers is accomplished by including an article on a priority occupational topic in each of the 6 issues of the Farmworker News, a bi-lingual, low literacy newsprint publication with a national circulation of 40,000. Outreach and technical assistance to health centers and organizations serving the farmworker population is provided through the NCFH Resource Center, Library, Call for Health Program, and the Migrant Health Research e-group.

D. Project Start and End Dates

September 30, 2001 – September 29, 2006

E. Project Activities/Accomplishments

- 2003 Midwest Farmworker Stream Forum Research Track (227 participants)
- 6 issues of FW News to 44,000 individuals/issue
- 6 issues of the Migrant Health Newslines to 7,500 individual/issue
- Occupational Health & Safety Fact Sheet
- Research packets available through Resource Center
- Technical Assistance provided: Resource Center-519, Library-78, CFH-53, e-group- 41
- Migrant Health Research E-group has 426 members and averages 50 to 60 messages a quarter
- Research Journal article in Migrant Health Proceedings: A Conversation on Ethnography

F. Project Products

Presentations:

The Health of Hired Farm Workers in Rural Communities, Partida, Institute of Agricultural Rural and Environmental Health, Saskatoon, Canada, October, 2003

Farmworker Health Issues and Long term Ethnography, Bletzer, K, Cartwright, E, Chase, C, Flores, I, Millard, A, Midwest Farmworker Stream Forum, Houston, TX, Nov. 2003

Situational Diagnosis: A tool to determine the health care needs of Mexican Farmworkers, Barragan, JPV, Midwest Farmworker Stream Forum, Houston, TX, Nov. 2003

Research on Farmworker Women's Issues, Clingerman, E, Lewy, R, Hernandez, A, Castillo, F, Fernandez, M, Tortolero-Luna, G, Midwest Farmworker Stream Forum, Houston, TX, Nov. 2003

Noise Induced Hearing Loss, Mulloy, K, Midwest Farmworker Stream Forum, Houston, TX, Nov. 2003

Preventing Hearing Loss Among Migrant Farmworkers, Themann, C, Midwest Farmworker Stream Forum, Houston, TX, Nov. 2003

Epidemiological Assessment of the Effects of Pesticide use on Ohio Farmworkers' and Farmers' Hearing, Harris, D, Midwest Farmworker Stream Forum, Houston, TX, Nov. 2003

A Summary of 15 Years in Agricultural Safety and Health and Action Steps for Future Discussions, Petrea, R, Midwest Farmworker Stream Forum, Houston, TX, Nov. 2003

Socio-Cultural Factors Affecting the Mental Health Status of Mexican Migrant Women, Snyder, N, Midwest Farmworker Stream Forum, Houston, TX, Nov. 2003

Health Access, Quality, Outcomes and Outreach from the Farmworker Perspective: Findings from the NAWS, Gabbard, S, Carroll, D, Weathers, A, Minkovitz, C, West, M, O'Campo, P, Midwest Farmworker Stream Forum, Houston, TX, Nov. 2003

An Assessment of Health Risks and Health Related Characteristics of Medically Uninsured and Underinsured in East Texas, Doyle, E, Rager, R, Midwest Farmworker Stream Forum, Houston, TX, Nov. 2003

Technology and Diagnosis: Online Pesticide Database, Reeves, M. Midwest Farmworker Stream Forum, Houston, TX, November 2003

Publications

Fact Sheets/Brochures/Technical Publications:

Occupational Health & Safety Fact Sheet, June 2004

Migrant Health Research Fact Sheets, December 2003

Education/Training/Outreach

Newsletters:

Farmworker News, Volume 9 Issues 4 and 5

Farmworker News, Volume 10, Issues 1- 4.

Migrant Health News, Volume 20, Issues 5 and 6

Migrant Health News, Volume 21, Issues 1 - 4

Other Products:

Bletzer, K., Cartwright, E., Chase, C., Flores, I., and Millard, A, A Conversation on Ethnography, Proceedings of the 2003-2004 Migrant Farmworker Stream Forums, July 2004

Focus group

National Agricultural Workers Survey Occupational Health Supplement Surveillance Document, Steege, Midwest Farmworker Stream Forum, Houston, TX, Nov. 2003

Conferences/Meetings Sponsored:

Midwest Farmworker Stream Forum, healthcare providers, health educators researchers, public health, Houston, TX, Nov. 2003.

G. States the Project Was Active In: 46 states

Education Core

A. Project Title:

Stakeholder Services

B. Project Officer

Karen Gilmore, M.P.H.
UTHCT
11937 U.S. Hwy 271
Tyler, TX 75708-3154
Email: Karen.Gilmore@uthct.edu
(903) 877-5896

C. Project Description

The purpose of this project is to provide education, resources, networking and outreach services to stakeholders to increase awareness and appreciation of agricultural work hazards and injury risks in order to improve safety practices.

FY04 Objectives:

1. Continue collaboration with North Louisiana Area Health Education Center to produce a continuing education program for rural practice health professionals,
2. Promote intervention/program evaluation skills development,
3. Produce two issues of Cultivation, the newsletter of the SW Center,
4. Complete design and launch new, interactive webpage for the SW Center,
5. Implement outreach strategy to deliver agricultural safety information to migrant/seasonal workers in East Texas.

D. Project Start and End Dates

9/30/01 through 9/29/06

E. Project Activities/Accomplishments

- Produced 4 hour CNE program for rural Louisiana nurses and allied health providers
- Worked with multidisciplinary team to refine and deliver workshop on using program evaluation methods to support needs assessment, service expansion, and outreach strategies.
- Developed and pilot tested classroom materials for 5th grade students to accompany implementation of video “Livestock Safety for Kids”.
- Initiated development of agricultural safety and agroterrorism preparedness modules for Community Health Worker Certification training.
- Launched new, interactive web-site,
- Published and disseminated two issues of newsletter, Cultivation,

- Established working relationship with National Safety Council to explore issues surrounding excessive deaths among agricultural aviators in AR and TX.
- Participated in regional collaborative workshop with Cooperative Extension Service.
- Fostered relationship with U.S. Coast Guard District 8 resulting in funded R2P project.

F. Project Products

Presentations:

Effectiveness of Interactive Tele-Video CME Programs to Reach Rural LA Practitioners, Karen Gilmore, MPH, 2004 National Symposium on Agricultural Health and Safety, June 21, 2004, Keystone, CO.

Fractured Fairy Tales: Louisiana Health Farm Families Initiative, Ann Carruth and Karen Gilmore, CE program for Rural Health Professionals, August 6, 2004.

Publications:

Peer Reviewed

Huhnke, RL, Surveying Elementary Students to Determine Knowledge Gained from Viewing the Video “Livestock Safety for Kids”, ASAE/CSAE Meeting paper 048006, August 2, 2004, Ottawa, Ontario, Canada.

Education/Training/Outreach

Training Seminars:

Evaluating the Effectiveness of Health Centers: A Participatory Workshop, Karen Gilmore, MPH, Facilitator; David Collins, M.D., Sherri Lukes, CDH, Ted Scharf, Ph.D.; November 8, 2003, Midwest Migrant Stream Forum, Houston, TX.

Evaluating the Effectiveness of Agricultural Safety and Health Interventions: A Participatory Workshop, Karen Gilmore, MPH workshop facilitator, Ted Scharf, PhD, NIOSH presenter, June 23, 2004, NIFS Professional Development Course, Keystone, CO.

News Letters:

Cultivation two issues, distribution list of 1200

Other:

Livestock Safety for Kids, 5th grade level classroom activities, pre-test and post-test to accompany video.

Conferences/Meetings Sponsored:

Old MacDonald Had a Farm, CE Program for nurses and allied health professionals in rural, northeast Louisiana. LSU Medical Center, Shreveport, LA August 6, 2004

G. States the Project Was Active In

Arkansas, Louisiana, New Mexico, Oklahoma, Texas, and national for newsletter distribution.

Education Core

A. Project Title

Prevention of Agricultural Injuries and Fatalities in the Arkansas Delta

B. Project Officer

Becky G. Hall
119 Hickory Hill Drive
P.O. Box 729
Helena, AR 72342
870-338-9100
HallBeckyG@uams.edu

C. Project Description

The purpose of this project is to reduce agricultural related injuries in the delta region of Arkansas through educational interventions in three counties which include Phillips, Lee, and Monroe.

D. Project Start and End Dates

September 30, 2001- September 29, 2006

E. Project Activities/Accomplishments

- Implemented Progressive Farmer Farm Safety Day Camp for 96 children, July 2004
- Conducted certified FARMEDIC Training for 10 area fire, public safety, and emergency service personnel
- Farm Safety at the Pumpkin Patch - conducted for forty-one children enrolled in the English as a Second Language (ESL) classes in grades 2 – 6
- Trained undergraduate allied health students to implement farm safety education for children enrolled in the Migrant Head Start Program using the curriculum [Safety Farm: Where preschool children learn farm safety](#), developed by the Farm Journal.
- Farm Safety Day conducted for 62 children enrolled in Dumas Migrant and Seasonal Head Start program.
- Sponsored a 40 hour “First Responder” training course for 19 firemen.

- Conducted First Responder training for migrant farm families the farm safety day camp for migrant farmworker children.
- Hosted the local downlink for an Interactive Televideo conference on Bioterrorism (including agricultural risks) attended 22 local community leaders.
- ABC on the Farm, 10 presentations were conducted in 5 schools for 2nd through 5th grade students. A total of 723 youth have participated in the training. Pre/Post Test results have been tallied and show that 88% of students demonstrated improved knowledge following the educational session.
- Delivered primary health screenings to farmers attending a local agricultural fairs.
- Collaborated with Entergy to deliver a farm safety program for 40 children in Lee County

F. Project Products

Presentations:

Farm Safety in the Arkansas Delta Jessica Hindsley, the National Area Health Education Center Organization National Conference in Baltimore, Maryland August 2, 2004.

“ABC on the Farm” Jessica Hindsley in Elaine & Holly Grove elementary schools in January and March 2004, ten presentations in total

Publications

Peer Reviewed

Richter, J, Hall, BG, Surveillance of Agricultural Injuries and Fatalities in the Arkansas Delta, Journal of Rural Health, accepted with revisions.

Education/Training/Outreach

Training Seminars:

Farm Safety at the Pumpkin Patch Presented by Kathy Norris in October 2004 in Dumas, AR

Farm Safety presented by Jessica Hindsley in Marianna, AR in March 2004

Short Courses:

“Farmedic” Bert Davidson in September 2004 Marvell, AR

Conferences/Meetings Sponsored

Bioterrorism Conference , Helena, AR September 28, 2004

G. States the Project Was Active In Arkansas

INTERVENTION CORE

A. Project Title

Navajo Nation Project to Reduce Agricultural Injuries

B. Project Officer

Deborah Helitzer, Sc.D.
Associate Professor, Department of Family and Community Medicine,
MSC 09-5040, School of Medicine,
University of New Mexico,
Albuquerque, NM 87131
Helitzer@unm.edu

C. Project Description

Specific Aims

The overall goal of this intervention effectiveness evaluation is to engage community stakeholders in the planning, implementation, and assessment of a culturally appropriate model program to reduce and prevent agricultural-related injuries on the Navajo Nation.

This intervention effectiveness evaluation addresses three specific aims: (1) Convene a stakeholder group and use a logic model process (a) to understand the contributing factors to agricultural related injuries on the Navajo Nation, and (b) to describe the theoretical foundations of a science-based intervention to influence those factors. (2) Support the development and implementation of a science-based, culturally appropriate model program to reduce and prevent injury among Navajo agricultural workers and their families. (3) Evaluate the implementation and the outcomes of this model program to reduce and prevent injury among Navajo agricultural workers and their families.

FY 04 Objectives were to complete the baseline survey, develop consensus about the primary agricultural-related causes of injuries on the Navajo Nation; develop science-based interventions and intervention plans; and develop the capacity of the stakeholder group to choose and implement strategies to reduce injuries.

D. Project Start and End Dates

October 1, 2001 – September 30, 2006

E. Project Activities/Accomplishments

The major activities in Year III of this five-year project have been:

- continued collaborative linkages between community stakeholders of the Navajo Nation and evaluators from the University of New Mexico
- completion of the baseline survey

- data entry of the baseline survey data
- analysis of the survey data
- presentation of the survey results to the community stakeholder group
- the articulation of intervention strategies, based on the results of the survey
- development of logic models for each of the three interventions
- development of implementation plans for the interventions.

F. Project Products

- Work Injury Exposure and Experience Survey - English
- Work Injury Exposure and Experience Survey – Navajo

G. States the Project Was Active In

New Mexico, Utah, Arizona (Navajo Nation)

Intervention Core

A. PROJECT TITLE:

Panhandle Coalitions for Agricultural Safety and Health

B. PROJECT OFFICER

Lana Skarke, MSN, RN
WTAMU Box 60969/OM 217
Canyon, Texas 79016
(806) 651-4820
lskarke@mail.wtamu.edu

C. PROJECT DESCRIPTION

The Panhandle Coalitions for Safety and Health (PCASH) is an intervention research project for the Texas Panhandle. The project focuses on women and children living and working in agricultural environments in the Panhandle of Texas.

Project aims: 1) to empower women to mobilize themselves, their families and their community to minimize risks and reduce hazards on family farms; 2) To establish two self-sustaining, community-based coalitions of women, involved in agriculture, which act with a sense of community to reduce health and safety hazards in family farms; 3) To demonstrate the effectiveness of community-based health and safety coalitions as change agents for increasing awareness and reducing agricultural health and safety hazards and risks on an individual, family and community level.

D. PROJECT START AND STOP DATES:

September 30, 2001 – September 29, 2006

E. PROJECT ACTIVITIES/ACCOMPLISHMENTS:

- Texas Partnership for Farm Family Health and Safety (coalition) sponsored the 6th Annual Progressive Farmer Safety Day Camp with total financial support from their community for the camp.
- The Partnership coalition is expanding activities into Castro, a neighboring county.
- The Swisher County Agricultural Health and Safety Coalition maintained their level of operations. New community partners added to the steering committee of the camp to expand activities and outreach.
- Swisher County Women's Coalition 2nd Annual Health and Safety Camp for 4th, 5th, & 6th graders-180 Children
- Intervention effectiveness research methods have been employed to gather quantitative data about the coalitions.
- The P.I. and Core Leader have maintained ongoing consultation regarding the design for this phase of the project.

- The revised survey tool has been drafted.
- An agency has been enlisted to conduct the Computer-Assisted Telephone Interviews (CATI).

F. PROJECT PRODUCTS

Education/Training/Outreach

Conferences/Meetings Sponsored:

Other:

Amarillo Tri-State Farm & Ranch Show: Topics: Tractor Safety, Tetanus Booster Awareness, West Nile Virus, Look-a-Like Poisons and Medications, Diabetes, Cholesterol & High Blood Press, Influenza, developed by Texas Partnership coalition members

Junior Stock Show Education Day: Livestock Handling Safety-Swisher County

Texas Partnership-County Cotton Conference-Topics: Agro Terrorism, Refueling Safety, & Tetanus Immunization/Booster Awareness

Texas Partnership 6th Annual Farm Safety Day Camp – 385 students

G. STATES THE PROJECT WAS ACTIVE IN:

Texas

Intervention Core

A. Project Title

Healthy Farm Families Initiative (LHFFI)

B. Project Officer

Ann K. Carruth
SLU 10835
Hammond LA 70402
985-549-3379
acarruth@selu.edu

C. Project Description

The HFFI is a collaborative intervention project designed to bring together farm families, community leaders, community organizations and the university (through the department of nursing), to develop, implement, and evaluate programs designed to increase awareness of agricultural production hazards, recognize the need to reduce risks, and promote occupational health behaviors. Specific aims include determining the impact of community capacity-building on unsafe/hazardous farm practices among farm women and children, and to evaluate motivational interviewing as an intervention strategy to promote occupational health. In addition, the project serves to enhance awareness of the farm culture, agricultural production risks, and community health implementation for nursing students while increasing research and publication skills for university faculty.

1. Completion of one year follow up on occupational heart disease screening in June 2004 for St. Helena Dairy Day group. Dairy day scheduled June 18th, 2004. Follow up evaluations are being scheduled first quarter of project year 4.
2. Contract with audiologist at SLU to conduct and supervise follow up occupational hearing testing for medical surveillance.
3. Due to problems using mobile van for audiology testing, a follow up questionnaire is being developed that addresses to what extent screening motivates changes behavior.
4. Completed follow up with all oral cancer screening by June 2004. Very few individuals participated in this screening. One-year follow up calls are being made to determine the extent of chewing tobacco use.
5. Pulmonary function testing protocol was developed and pilot tested in November 2003.
6. Baseline data collection for pulmonary screenings January 2004. Identified many more than anticipated with shortness of breath and mild pulmonary obstruction. Data collection sites were established for two health fairs summer 04 – Washington Parish dairy day and St. Helena Dairy Day.
7. Data entry and analysis for occupational heart disease is in progress.
8. Refinement of Self-efficacy tool to evaluate youth at Farm Safety Day Camp complete. administered with Youth from Fifth Ward Middle School. Data entry completed. Data analysis in progress.

9. With assistance from a graduate nursing student Fall 04, a home/farm safety walkabout, age appropriate for 5th graders/farm safety day camp participants, has been developed and distributed for November 17, 2004 camp.
10. Two undergraduate nursing courses have been developed, new to the 2004-2005 SLU catalogue: Nursing 213 First Aid for Rural Medical Emergencies (F.A.R.M.E.) – CD based course with clinical component and CE offering for Nursing:
11. RN student intern is preparing CE application and completion of interviews to be incorporated in to the Occupational Stress among Farm owners and Farm workers power point presentation.

D. Project Start and End Dates

September 30, 2001 – September 29, 2006

E. Project Activities/Accomplishments

- One manuscript accepted for publication – anticipated publication Jan 2005
- First Aid Farm Quest CD in the very last phases of development – with anticipated date of launch Jan 2005;
- First Aid Farm Quest CD featured in Nurture, the quarterly publication of National Children’s Center for Rural and Agricultural Health and Safety.
- One man at Point Coupee Rodeo in New Roads November 13, 2004 who returned for a re-screen for cholesterol/BP/BMI said that “we had saved his life”; after screening two years ago, he went to the doctor who told him he was “a walking time bomb” – got on B/P medication, went on diet and lost 60 pounds –his BP and total cholesterol are now within normal limits.
- New Elective to the 2004-2005 SLU catalogue: Nursing 213 First Aid for Rural Medical Emergencies (F.A.R.M.E.)
- Continue to network across the state to locate farm families and potential sites for screening activities.

F. Project Products

Presentations:

Fractured Fairy Tales Carruth, A.,K., & Gilmore, K. Old MacDonald Had a Farm, August 6, 2004 LSUHSC, Shreveport.

From Seed to Sampling: The Development of an Instructor’s Manual to Teach First Aid for Rural Emergencies (F.A.R.M.E.) Carruth, A.K. at the Fifteenth Annual Nurse Educator Conference in the Rockies. July 29th, 2004 Breckenridge CO.

First Aid Farm Quest: An Interactive CD focusing on Injury Prevention and First Aid for Farm Youth, Carruth, A.K. & Clough-Thomas, K. 2004 National Symposium on Agricultural Health and Safety. June 21, 2004 Keystone CO.

Publications

Peer Reviewed

Pryor, S., Carruth, A.K., & LaCour, G. Occupational Risky Business: Injury Prevention Behaviors of Farm, Women and Children. Issues in Comprehensive Pediatric Nursing. Accepted for publication.

Other Publications:

The study in [Holland, C., & Carruth, A.K. (2001). Exposure risks and tetanus immunization in women of family owned farms: Implications for occupational and environmental health nursing. American Association of Occupational Health Nurses Journal, 49 (3), 130-136.] was quoted used as an example of telephone survey design in Polit, D. & Beck, C. Nursing Research: principles and methods 7th Ed., 2004. Lippincott Williams & Wilkins.

Education/Training/Outreach

CD-ROMs

First Aid Farm Quest – CD; Beta Test complete, final revisions in process

G. States the Project Was Active In Louisiana

III. Feasibility Studies

Feasibility Study A

A. Project Title:

The use of syndromic surveillance to detect naturally occurring or intentionally introduced zoonotic disease in agricultural workers: A feasibility study.

B. Project Officer(s)

Principal Investigator: Cameron Crandall, MD (CCrandall@salud.unm.edu)

Co-Investigator: Laura Banks, DVM, MPH (LBanks@salud.unm.edu)

UNM Department of Emergency Medicine

MSC 10 5560

Albuquerque, NM 87131-0001

505-272-5062

C. Project Description

Syndromic surveillance is the tracking of trends in disease symptoms in a population, prior to definitive laboratory or clinical diagnosis of individual cases. Syndromic surveillance in the agricultural setting could be used to detect zoonotic diseases in agricultural workers. This surveillance could be conducted independently of, or in concert with, surveillance for diseases in animals. The feasibility study is intended to answer several questions: What are the possible sources of disease syndrome or symptom data? What is the utility of the currently available syndromic surveillance equipment and procedures in agricultural situations? What is the willingness of the agriculture community to support surveillance for diseases other than those mandated by health officials? What are the current methods of data analysis and the utility of the user feedback to the health of agricultural workers? What the implication for joint human/animal disease surveillance?

D. Project Start and End Dates

April 1, 2003 to July 15, 2004

E. Project Activities / Accomplishments

- Conducted key informant interviews in New Mexico with personnel from the following agencies:
 - University of New Mexico Health Sciences Center
 - Sandia National Laboratories
 - New Mexico Department of Health
 - Border Epidemiology and Environmental Health Center, New Mexico State University

- New Mexico Department of Agriculture
- USDA
- Conducted a comprehensive literature search for incidence/prevalence of zoonotic disease in agricultural workers and current syndromic surveillance systems
- Attended the AVMA conference in Denver to join seminars related to food safety and security and agroterrorism, and to interview speakers and subject experts including personnel from the following agencies:
 - CDC Vector-borne Surveillance Laboratory
 - Colorado State University College of Veterinary Medicine and Biomedical Sciences
 - National Veterinary Services Laboratories, Ames, Iowa
 - Iowa State University, Center for Food Security and Public Health.
- Consulted the researchers associated with the RSVP Syndromic Surveillance System including personnel from the following agencies:
 - Kansas State University, College of Veterinary Medicine
 - Lubbock Department of Health
 - Sandia National Laboratories

NOTE: The staff of the RSVP system have indicated that they would like to move from discussing the feasibility of using their system for this purpose to actual implementation in the upcoming beta-test project in feedlots in Texas. They will add human health indicators to the data collection process for animal health and combine the data into one set of syndromes to be used to detect zoonotic diseases. They are willing to share the outcome of the beta test project for reporting to the Southwest Center.

F. Project Products

Presentations

“The use of syndromic surveillance to detect naturally occurring or intentionally introduced zoonotic disease in agricultural workers: A feasibility study.”

Epidemiology Seminar Series

Presented by Laura Banks, DVM, MPH

April 29, 2003

UNM Health Sciences Center, Albuquerque, New Mexico

2004 National Symposium on Agricultural Health and Safety

Presented by Laura Banks, DVM, MPH

June 22, 2004

Keystone, Colorado

G. States the Project Was Active In:

New Mexico and Colorado

Feasibility Study B

A. Project Title:

Establishing Exposure Risk for Noise and Organic Solvents Among Farmers

B. Project Officer

Annette Hurley, M.S., CCC-A
Instructor of Clinical Audiology
LSU HSC
1900 Gravier Street, 9th Floor
New Orleans, LA 70112
(504) 568-4340
ahurle@lsuhsc.edu

C. Project Description

Recent studies have suggested that hearing loss among agriculture workers may be related to the synergistic effect of noise and chemicals. This project will explore hearing loss among agricultural workers as it relates to the type and extent of various pesticides and noise exposures. We will develop a risk assessment exposure in order to pursue future funding to evaluate the two exposures and their effects on thresholds shifts as a result from these exposures.

D. Project Start and Stop Dates

January 1, 2003 and was extended through 5/31/04.

E. Project Activities / Accomplishments

- An extensive risk assessment for noise and chemical exposures has been completed.
- Xylene was found in Trifluralin, an herbicide commonly used for soybeans
- Case study of Hearing Loss and an Auditory Processing Disorder Found in a 42 -year old male with history of toluene & styrene exposures.
- The target audience and sampling timeframe was adjusted to collect data on soybean farmers in the spring when they use the identified ototoxic herbicide. However, during efforts to secure contact information on soybean farmers, a key informant revealed that Trifluralin is no longer used by soy bean farmers. Beans planted locally have been genetically altered to repel the pests previously targeted by the pesticide.

F. Project Products

Presentation

The Synergistic Effects of Organic Solvents and Noise in Hearing Loss Among Farmers – Lessons Learned. SW Center Board Meeting, June 21, 2004, Keystone, CO.

Other Products:

Comprehensive Noise and Chemical Risk Assessment Questionnaire

G. States the Project Was Active In:

Louisiana

Feasibility Study C

A. Project Title:

Occupational Health Curriculum for Farmworkers in Texas

B. Principal Investigator

Martha Soledad Vela Acosta, MD, MS, Ph.D.
Assistant Professor Occupational & Environmental Health
School of Public Health University of Texas
Regional Academic Health Center Campus at Brownsville
80 Fort Brown SPH Building 1.220 D
Brownsville, TX 78520
956-554-5163
msvela@utb.edu

C. Project Description

The primary aim of this pilot study is to evaluate the feasibility of a bilingual occupational health and safety curriculum (OHSC) into the current high school equivalency program (HEP) curricula for migrant and seasonal farmworker students based on existing curricula through : (1) conducting needs and assets assessment with teachers and HEP students; (2) developing a refined bilingual OHSC curriculum: a team effort; and (3) evaluating the refined curriculum assessing high school and HEP teachers and HEP students' perceptions of usefulness and future dissemination

D. Project Start and Stop Dates

April 1, 2003 through February 28, 2004

E. Project Activities / Accomplishments

- Convened six focus groups with a total of 52 participants representing high school administrators, teachers, parents, students and farmworker to determine the need for and willingness to participate in developing and implementing this model curriculum.
- Permissions were obtained from the organizations that produced the following curricula in English: "Teens, Work and Safety" and "Work Safe, a Curriculum for Youth Employment Programs"; "Safe Work/Safe Workers"; "Safe Jobs for Youth"; and "Lost Youth" after an exhaustive search failed to identify occupational health and safety curriculum for Hispanic high school students in Spanish.
- Curriculum Refinement - A team of eleven educators attended a workshop for the specific purpose of selecting materials from the model programs and reviewing literacy level, cultural, and language appropriateness of students who would be enrolled in the General Equivalency Degree program and/or the high school equivalency program

(HEP). Participating teachers were awarded Continuing Education Units (CEU) by the Brownsville Independent School District.

- Cultural and Language Competence - The selected course materials were translated to Spanish and adapted for use with young Hispanic workers. The final product was a bilingual curriculum entitled Work Safely-Trabaje con Cuidado designed for use in high school level education in southern Texas.

The educational video: Lost Youth obtained from the Workers Compensation Board of British Columbia, Canada was chosen to be included in the curriculum, but has yet to be adapted into Spanish.

- Curriculum Pilot Testing
Work Safely-Trabaje con Cuidado was pilot tested from December, 2003 to April, 2004. Four teachers implemented the curriculum with students enrolled in two different high school equivalency programs. The Work Safely- Trabaje con Cuidado curriculum was taught to all farm workers and layoff workers attending the high school equivalency programs at two locations in South Texas. A total of 30 students completed the Work Safely-Trabaje con Cuidado curriculum at the two sites.
- Evaluation of Work Safely-Trabaje Con Cuidado
All students was asked to complete a pre-test, a post-test administered on the last day of class, and a six week post-test. The educator group was evaluated with a pretest given at the beginning of the workshop and a posttest given after completion of Work Safely-Trabaje con Cuidado workshop.

F. Project Products

Presentations:

Brownsville Independent School District (2 presentations)
High School Equivalency Program in Brownsville (3 presentations)
High School Equivalency Program in Harlingen, TX (2 presentations)

Tackling Young Latino Worker's Needs: The First Bilingual Occupational Health and Safety Curriculum. Vela Acosta MS, Bush D, and Cooper SP. 2004 National Symposium on Agricultural Health & Safety and the The National Institute for Farm Safety 2004 Summer Conference June, 2004 at Keystone Resort, CO.

Safety and Health Training Initiatives for the Next Generation: The First Bilingual Occupational Health and Safety Curriculum, An Approach for Young Workers. Vela Acosta MS, American Industrial Hygiene Conference and Exposition, Atlanta, GA 2004.

Conferences / Meetings Sponsored:

- The Occupational Health and Safety Curriculum for Texas Training and Curriculum Development Workshop.

Other Products:

- Work Safely-Trabaje Seguro, The first bilingual occupational health and safety curriculum for GED/HEP students.

G. States the Project Was Active In:
Texas

Feasibility Study D

A. Project Title:

Survey of Occupational Injury Reporting Among Low-Income New Immigrant/Migrant Workers

B. Project Officer:

Cynthia Ball, M.D. (Occupational Medicine Resident)
UTHCT
11937 U.S. Hwy 271
Tyler, TX, 75708-3154
(903) 877-5919

C. Project Description:

The intent of this study is to determine whether it is possible to gather reliable data on occupational injury experience among low-income workers to test the hypothesis that new immigrants are less likely to report work injuries and seek medical attention than long term residents or U.S. citizens.

D. Project Start and End Dates

August 1, 2003 through June 30, 2004

E. Project Activities/Accomplishments

- Developed sample surveys addressing occupational injury and health issues
- Engaged translators to review and translate survey into Spanish
- Identified a Migrant Head Start School to pilot test
- Administered survey in Head Start region of West Texas with significant farm production and migrant worker population
- Analyzed data and refined survey tool

F. Project Products

Presentations:

Work Injury Reporting Among Low Income Workers – A Comparison of Migrant Farmworkers With Other New Immigrants.
Occupational Health: The Changing Work Environment, Tyler, TX June 25, 2004.

Other:

Occupational exposure and injury survey (English and Spanish)

G. States Project was active in:

Louisiana and Texas

Feasibility Study E

A. Project Title:

Analysis of Commercial Fishing Vessel Incidents in Coast Guard District 8

B. Project Officer:

Sacha St. Hill, M.D. (Occupational Medicine Resident)
UTHCT
11937 U.S. Highway 271
Tyler, TX 75708-3154
(903) 877-5919
sasha.sthill@uthct.edu

C. Project Description

The purpose of this project is identify available data sources for injuries to shrimp fishermen in the Gulf of Mexico and analyze the data for potential prevention interventions.

D. Project Start and End Dates:

August 1, 2003 through May 1, 2004

E. Project Activities/Accomplishments

- Secured Commercial Fishing vessel data for the past three years from Coast Guard Regional office
- Completed literature search for related studies
- Participated in a site visit of shrimping vessels docked in Galveston Bay
- Interviewed Mr. Gilbert Gallardo, Coast Guard Safety Trainer
- Conducted informal interviews with several Vietnamese shrimpers to understand the work conditions, cultural issues, and language barriers that may hamper safe work behaviors.

F. Project Products:

Presentations:

“An Analysis of Commercial Fishing Vessel Incidents in U.S. Coast Guard District 8”

- Texas College of Occupational and Environmental Medicine Annual Meeting, Austin, TX, May 2004
- Occupational Health: The Changing Work Environment, Tyler, TX June 25, 2004.

G. States the Project was Active In:

Texas and Louisiana

V. Improvements in Agricultural Safety and Health Resulting From Center Activities – Research to Practice

Educational Materials and programs

- Livestock Safety for Kids – National Award-Winning Video (ASAE)
- Cattle Handling Video – National Award-Winning Video (ASAE)
- OK AgrAbility program
- SELU Nursing -Community Health Course
- Navajo Cattle Handling Equipment Loan Program
- WTAMU Nursing – Senior Practicum
- Environmental Health Master class – SFA
- Occupational Safety & Health Curriculum –Bi-lingual for High School students
- Manual “First Aid for Rural Medical Emergencies” for first aid instructors
- First on the Scene program for children
- Interactive CD for Children to learn farm first aid
- CD “Bites, Stings, and Venomous Things”
- Bi-lingual, low-literacy poster and flier with back pain prevention information

Capacity-Building

- Research
 - Projects awarded to regional academic centers
 - Feasibility studies (new investigators), Occupational Resident projects
 - Research Track at Midwest Migrant Stream Forum
- Evaluation Training
 - Evaluation Training - PI’s to implement on-going project evaluation
 - Evaluation of Intervention Effectiveness workshop presented as part of Migrant Stream Forum Research track
 - Evaluation of Intervention Effectiveness workshop for National Institute for Farm Safety
- Public Health Readiness
 - Agroterrorism Workshop: Engaging Community Preparedness (and enduring materials)

VI. Collaborations

Academic Institution - Center

Southwest Center for Occupational and Environmental Health
Texas Southernmost College
University of Texas Health Science Center at Houston – School of Public Health
University of Texas Health Science Center – San Antonio
University of Texas at Brownsville
University of Colorado
University of Kentucky School of Nursing

University of California – Berkeley, Labor Occupational Health Program
West Texas A&M University, Equestrian Association
West Texas A&M University, Division of Agriculture
Worker’s Compensation Board of British Columbia

Agricultural Organization

Cooperative Extension Service
Starr County, Texas – Ms. Yolanda Morado
Phillips County, AR
Shiprock Extension Service, University of Arizona
San Juan Extension Service, New Mexico State University
Texas District 1 and 2
LSU Cooperative Extension
Agricultural Experiment Stations - Texas

Community-Based Organization

North Carolina Farmworkers Project
Partners for Inclusive Communities
Navajo Nation Injury Prevention and Control Program
Safe Kids Coalition, Potter/Randall Counties, Texas
Potter/Randall County Emergency Response – 911

Government Agency

EPA
Commission for Labor Cooperation, Secretariat
U.S. Food and Drug Administration
U.S. Department of Labor
Navajo Nation Department of Agriculture
Centers for Disease Control and Prevention
DHHS – Office of Minority Health

Health Resources Services Administration
Bureau of Primary Health Care

NIOSH

Steve Olenchock
Ted Scharf – Research Psychologist
John Valosen
Teri Palermo
Greg Kullman
Kim Clough-Thomas
Paul Enright, Pulmonary Consultant
Michael McKenna, Statistician
Great Lakes Center for Agricultural Safety and Health
Great Plains Center for Agricultural Safety and Health
High Plains Intermountain Center for Agricultural Health & Safety
Northeast Center for Agricultural Safety and Health
Pacific Northwest Agricultural Safety & Health Center

Southeast Center for Agricultural Health & Injury Prevention
Southern Coastal Agromedicine Center
Western Center for Agricultural Health and Injury Prevention
U.S. Coast Guard District 8

Hospital/Health Organization

Michigan Primary Care Association
Association of Occupational and Environmental Clinics
Arkansas Rural Hospital Program
Area Health Education Center
 Arkansas State Program
 Lake Country - TX
 Coastal – TX
 Northeast Louisiana
American Heart Association
Lions Club
Texas Poison Center

Insurance/Funding Agency

Arkansas Farm Bureau
Texas Worker's Compensation Commission

Schools

Migrant Head Start Programs – Texas Region 16, Washington Parish, Louisiana ,
Arkansas Delta
Point Coupee High School Rodeo Association
High School Equivalency Program, Brownsville, TX
High School Equivalency Program, Harlingen, TX
SUPERNet schools in East Texas

Other

Migrant Clinicians Network
National Commission of Social Work
National Education Association for Health Education Credentialing
Progressive Farmer Foundation
National Safety Council