P20 PILOT PROJECT:

Disparities of Health Literacy in the Context of Kidney Cancer and Smoking

Project team

SIU School of Medicine

Shaheen Alanee, MD, MPH,MBA
- Urologic oncology
- Cancer genomics

Danuta Dynda, MD
- Research assistant professor

Kevin McVary, MD, FACS
- Co-investigator/mentor

WU School of Medicine

Erin Linnenbringer, MS, PhD
- Social-behavioral scientist
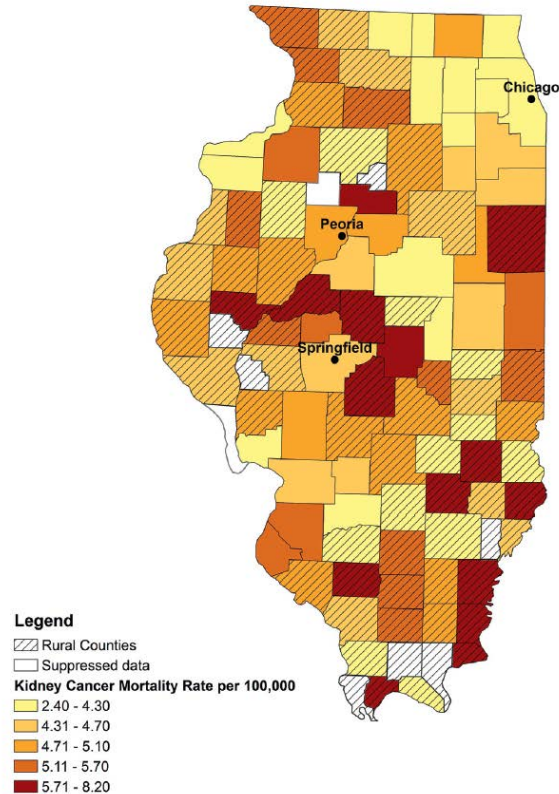- Population health disparities

Katina Richardson, MD
- Research coordinator

Nirek Sharma
- Undergraduate research assistant

Kidney Cancer: Regional perspective

Legend
- ▨ Rural Counties
- ☐ Suppressed data

Kidney Cancer Mortality Rate per 100,000
- 2.40 - 4.30
- 4.31 - 4.70
- 4.71 - 5.10
- 5.11 - 5.70
- 5.71 - 8.20

Illinois county map shows age adjusted kidney cancer mortality rate per 100,000 individuals by quintile from 1990 to 2010.

Age-adjusted kidney cancer mortality rates across Illinois counties, 1990-2010.

Published in:
Frye TP, Sadowski DJ, Zahnd WE, Jenkins WD, Dynda DI, Mueller GS, Alanee SR, McVary KT. Impact of county rurality and urologist density on urological cancer mortality in Illinois.
Journal of Urology. 2015; 193(5)1608-13

Kidney Cancer: Sociobehavioral perspective

Relationships among social & behavioral risk factors have not been adequately examined

- With regards to kidney cancer

- With regards to urban/rural disparities
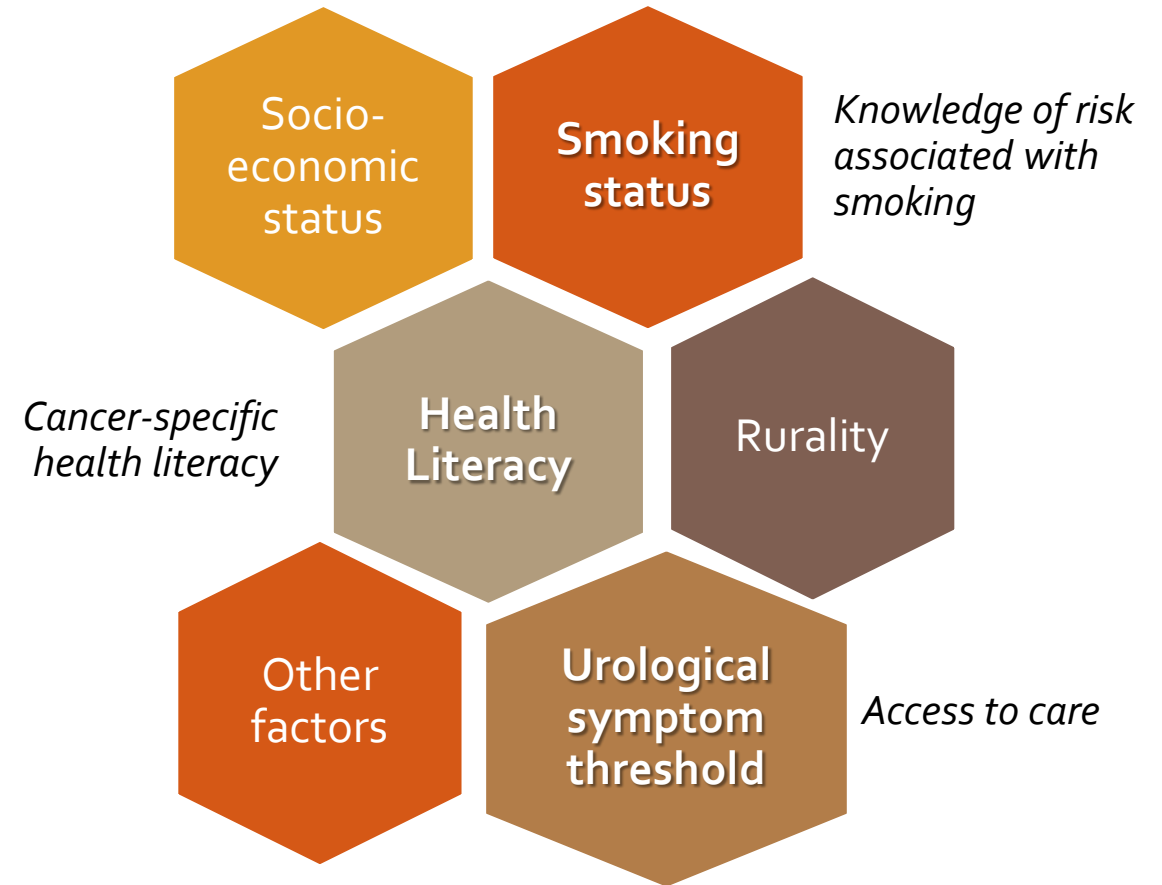
Specific aims & research approach

Survey a total of 300 patients (ages 40+) from 5 urology and primary care clinics

By geographic region (urban vs. rural):

1) Examine health literacy and cancer literacy

2) Investigate knowledge of the relationship between smoking and kidney cancer

3) Compare threshold for bother caused by general urologic symptoms

Study start-up: challenges & solutions

- Coordinating IRB applications and protocols across sites

- Streamlining data collection and entry processes
    - Planned use of scantron software no longer available / feasible
    - Switch to REDCap via Android tablets

REDCap™

🏠 Home | 📁 My Projects | ⊕ Create New Project | 🎞 Training Resources | ❓ Help & FAQ

Welcome to REDCap!

REDCap is a mature, secure web application for building and managing online surveys and databases. Using REDCap's stream-lined process for rapidly developing projects, you may create and design projects using 1) the online method from your web browser using the Online Designer; and/or 2) the offline method by constructing a 'data dictionary' template file in Microsoft Excel, which can be later uploaded into REDCap. Both surveys and databases (or a mixture of the two) can be built using these methods.

REDCap provides automated export procedures for seamless data downloads to Excel and common statistical packages (SPSS, SAS, Stata, R), as well as a built-in project calendar, a scheduling module, ad hoc reporting tools, and advanced features, such as branching logic, file uploading, and calculated fields.

Learn more about REDCap by watching a 🎞 brief summary video (4 min). If you would like to view other quick video tutorials of REDCap in action and an overview of its features, please see the Training Resources page.

Please note that any publication that results from a project utilizing REDCap should cite grant support (Supported by Clinical and Translational Science Award (CTSA) Grant [UL1 TR000448] and Siteman Comprehensive Cancer Center and NCI Cancer Center Support Grant P30 CA091842).

NOTICE: If you are collecting data for the purposes of human subjects research, review and approval of the project is required by your Institutional Review Board.

If you require assistance or have any questions about REDCap, please contact REDCap Help Desk [redcap@rt.biostat.wustl.edu].

REDCap Features

Build online surveys and databases quickly and securely - Create and design your project rapidly using secure web authentication from your browser. No extra software is required.

Fast and flexible - Conception to production-level survey/database in less than one day.

Export data to common data analysis packages - Export your data to Microsoft Excel, PDF, SAS, Stata, R, or SPSS for analysis.

Ad Hoc Reporting - Create custom queries for generating reports to view or download.

Scheduling - Utilize a built-in project calendar and scheduling module for organizing your events and appointments.

Easily manage a contact list of survey respondents or create a simple survey link - Build a list of email contacts, create custom email invitations, and track who responds, or you may also create a single survey link to email out or post on a website.

REDCap Mobile App - Collect data offline using an app on a mobile device when there is no WiFi or cellular connection, and then later sync data back to the server.

Save your data collection instruments as a PDF to print - Generate a PDF version of your forms and surveys for printing to collect data offline.

Advanced features - Auto-validation, calculated fields, file uploading, branching/skip logic, and survey stop actions.

REDCap API - Have external applications connect to REDCap remotely in a programmatic or automated fashion.

Data Queries - Document the process of resolving data issues using the Data Resolution Workflow module.

Piping - Inject previously collected data values into question labels, survey invitation emails, etc. to provide a more customized experience.

REDCap™

🏠 Home | 📁 My Projects | ⊕ Create New Project | 🎞 Training Resources | ❓ Help & FAQ

Listed below are the REDCap projects to which you currently have access. Click the project title to open the project. Newly created projects begin in **Development status** 📝 as you begin to build and design them. When you are ready to begin entering real data in the project, you may move it to **Production status** ✅ to designate the project as officially collecting data. When you are finished collecting data or if you wish to stop collection, the project may be set to **Inactive status** ⛔, although it may be brought back to Production status at any time when you are ready to begin collecting data again. Also listed is the project type, which designates if the project is in **classic** or **longitudinal** data collection format.

💬 You last accessed the User Access Dashboard earlier today.

Use this Dashboard to monitor user access to your projects (those to which you have User Rights access.) You can set access-expiration dates and delete user access here.

Go to [User Access Dashboard]

My Projects | 📁 Organize | Filter projects by title

Project Title	Records	Fields	Instruments	Type	Status
Health Literacy in the Context of Diseases and Smoking	72	162	9 surveys	📋	✅
Health Literacy in the Context of Diseases and Smoking - SIU	1	162	9 surveys	📋	✅

The projects listed below are public and are accessible by anyone. No authentication (i.e. username/password) is required to access them directly.

Public Projects

Example Survey

Study start-up: challenges & solutions

- Coordinating IRB applications and protocols across sites

- Streamlining data collection and entry processes
  - Planned use of scantron software no longer available / feasible
  - Switch to REDCap via Android tablets
  - Learning curve associated with new technology
  - Required changes in the informed consent process

Study progress

Enrolled first St. Louis-based participants in early June

- Of the 94 urology clinic patients approached, 73 (78%) have enrolled in the study

- Of the 73 participants, 60 (82%) completed all required survey components

- Consent process takes approximately 1.5 minutes to complete

- Survey takes approximately 18-21 minutes to complete

WUSTL urology clinic participant characteristics		
Gender:	**N**	**%**
Male	59	98.3%
Female	1	1.7%
Age: (mean, SD)	66	8.7
Race:		
Black	17	28.3%
White	43	71.7%
Education level:		
Less than high school	3	5.1%
High school degree	18	30.5%
Associate degree or technical school	15	25.4%
Bachelor degree	9	15.3%
Graduate degree	14	23.7%
Residential zip code:		
Metro area	46	76.7%
Micropolitan / small town / rural	14	23.3%

Ongoing work

- Complete recruitment and enrollment
  - Establishing a new primary care clinic recruitment site in St. Louis
  - Enrollment started in the Springfield urology clinic site
  - Carbondale primary care clinic recruitment to launch soon

- Analysis, publication, and additional research proposals

Questions & Comments