

Center for Rural Health

## The Importance of Population Health: The UNDSMHS Biennial Report as a Tool for Better Health

L. Gary Hart, Ph.D. Director  
Brad Gibbens, MPA, Deputy Director  
Mandi-Leigh Peterson, MA, Research Analyst

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Center for Rural Health  
The University of North Dakota  
School of Medicine & Health Sciences

Center for Rural Health

- Established in 1980, at The University of North Dakota (UND) School of Medicine and Health Sciences in Grand Forks, ND
- One of the country's most experienced state rural health offices
- UND Center of Excellence in Research, Scholarship, and Creative Activity
- Home to seven national programs
- Recipient of the UND Award for Departmental Excellence in Research

**Focus on**

- Educating and Informing
- Policy
- Research and Evaluation
- Working with Communities
- American Indians
- Health Workforce
- Hospitals and Facilities

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### Session Objectives

Understand the intent and use of the UNDSMHS Biennial Report and the data gathering process

Identify key population health measures

Engage in critical discussion regarding the impact of health care reform on the status of health and healthcare in North Dakota

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### The Intent, Use, and Process of the UNDSMHS Biennial Report

- ND Century Code (NDCC 15-52-04) – Advisory Council – biennially to submit a report with recommendations on health care needs of the people of the state, information on healthcare workforce needs, role and function of UNDSMHS, access to care, quality of health care and the efficiency of its delivery, and financial challenges facing the delivery system.
- Strategic visioning for health and healthcare for ND.
- Serve as a frame for understanding population health needs.
- Six to seven month process
- Secondary and primary data – US Census, other federal and state agencies, trade associations, provider surveys, key informant interviews, and other techniques.
- Key focus as a tool for population health: data covers population trends, health status, health system, workforce, and quality and value (health reform- ACA).

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### Population Health as a National Goal

- Population health – Primary focus in health reform – determinants of health.
- Institute for Healthcare Improvement – Triple Aim for Populations –
  - Improving the patient experience of care (quality and satisfaction)
  - Improving the health of the population
  - Reducing the per capita cost of health care.
- IOM – six aims to improve health: safety, effectiveness, patient centeredness, timeliness, efficiency, and equity.
- Addressing “systemic dysfunction” associated with cost, performance/efficacy, access/equity, quality, and patient centeredness.
- U.S. spends more on health care than any other country; yet, health outcomes are not the world's best.
- Rural has special issues – poorer, older, less insurance, limited access.
- Health conditions worse in rural – cancer, heart disease, COPD, diabetes, behavioral health (alcohol and drugs, obesity), and other conditions.
- Viability and sustainability of rural health systems.

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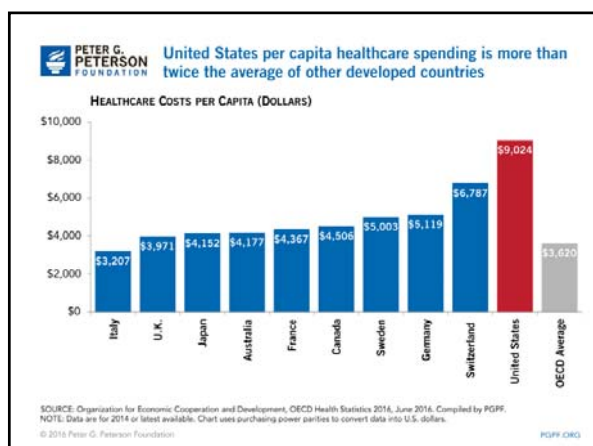
### EXHIBIT ES-1. OVERALL RANKING

COUNTRY RANKINGS

Top 2\*  
Middle  
Bottom 2\*

	AUS	CAN	FRA	GER	NETH	NZ	NOR	SWE	SWZ	UK	US
<b>OVERALL RANKING (2013)</b>	4	10	9	5	5	7	7	3	2	1	11
<b>Quality Care</b>	2	9	8	7	5	4	11	10	3	1	5
Effective Care	4	7	9	6	5	2	11	10	8	1	3
Safe Care	3	10	2	6	7	9	11	5	4	1	7
Coordinated Care	4	8	9	10	5	2	7	11	3	1	6
Patient Centered Care	5	8	10	7	3	6	11	9	2	1	4
<b>Access</b>	8	9	11	2	4	7	6	4	2	1	9
Cost-Related Problem	9	5	10	4	8	6	3	1	7	1	11
Timeliness of Care	6	11	10	4	2	7	8	9	1	3	5
<b>Efficiency</b>	4	10	8	9	7	3	4	2	6	1	11
<b>Equity</b>	5	9	7	4	8	10	6	1	2	2	11
<b>Healthy Lives</b>	4	8	1	7	5	9	6	2	3	10	11
<b>Health Expenditures/Capita, 2011**</b>	\$3,800	\$4,522	\$4,118	\$4,495	\$5,099	\$3,182	\$5,669	\$3,925	\$5,643	\$3,405	\$8,508

Notes: \* Includes Sen. \*\* Expenditures shown in \$US PPP (purchasing power parity). Australian \$ data are from 2010.  
Source: Calculated by The Commonwealth Fund based on 2011 International Health Policy Survey of Sicker Adults; 2012 International Health Policy Survey of Primary Care Physicians; 2013 International Health Policy Survey; Commonwealth Fund National Scorecard 2011; World Health Organization; and Organisation for Economic Cooperation and Development. OECD Health Data, 2013 (Paris: OECD, Nov. 2013).



**U.S Life Expectancy (1975-2010)  
Compared to Nine Other Countries**

	1975*	1980	1985	1990	1995	2000	2005	2010	Gain 1975-2010	% Growth 1975-2010
Australia	73	74	76	77	78	79	81	82	9	12.33%
Canada	74	75	76	77	78	79	80	81	7	9.46%
Chile	65	69	72	74	75	77	78	79	14	21.54%
China	66	67	68	69	70	72	74	75	9	13.64%
Cuba	72	74	75	75	75	77	78	79	7	9.72%
England	73	74	75	76	77	78	79	80	7	9.59%
France	73	74	75	77	78	79	80	82	9	12.33%
Germany	71	73	74	75	76	78	79	80	9	12.68%
New Zealand	72	73	74	75	77	79	80	81	9	12.50%
<b>AVERAGE</b>	<b>71.0</b>	<b>72.6</b>	<b>73.9</b>	<b>75.0</b>	<b>76.0</b>	<b>77.6</b>	<b>78.8</b>	<b>79.9</b>	<b>8.9</b>	<b>12.64%</b>
<b>US</b>	<b>73</b>	<b>74</b>	<b>75</b>	<b>75</b>	<b>76</b>	<b>77</b>	<b>77</b>	<b>79</b>	<b>6</b>	<b>8.22%</b>

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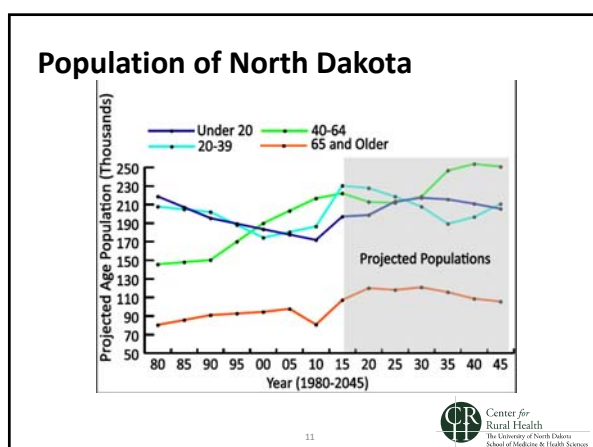
**Population Issues**

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**Population Projections**

- Based on a combination of factors:
  - Historical Trends
  - Births
  - Deaths
  - Migration

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**Selecting the Best Data**

**Considerations include:**

- Data source
- Vintage
- Geography
- Relevance
- Context
- Audience**

There is no such thing as bad data! There is however, poorly fitting data.

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### Collecting and Synthesizing Data

- Obtain data from the original source where possible
- Summarize data at relevant levels (state, county, etc.)
- Compare and contrast data sets that are equivalent
- Basic descriptive statistics can be used, no need for advanced statistics

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### Disseminating Information

- Use a combination of text and visuals to tell the story
- Write to your audience
- Consider type of deliverable(s) to be used to reach the largest audience possible to include primary audience and any secondary audience
- Operationalize all definitions to keep the message clear

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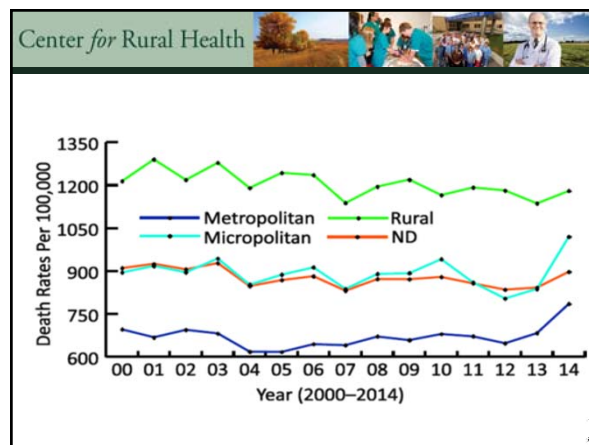


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## The Health of North Dakota

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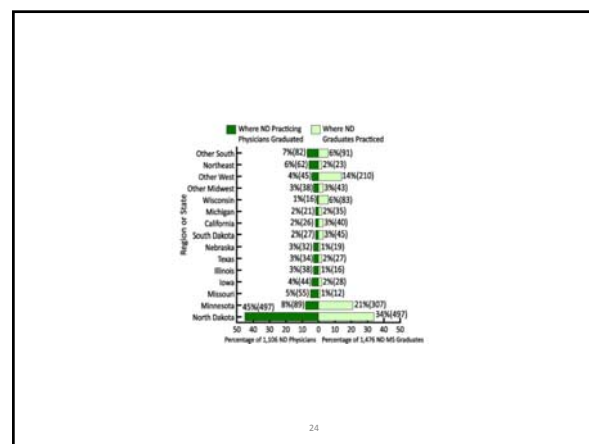


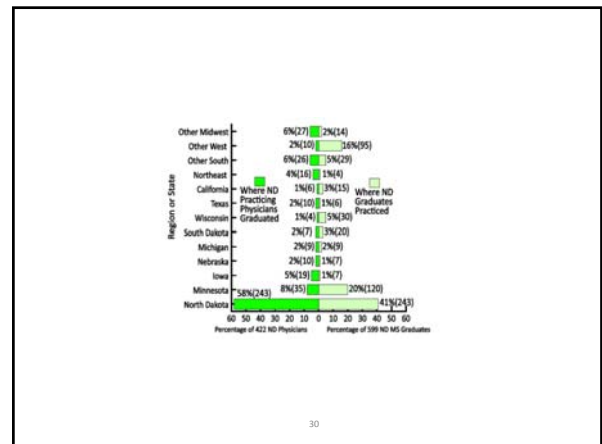
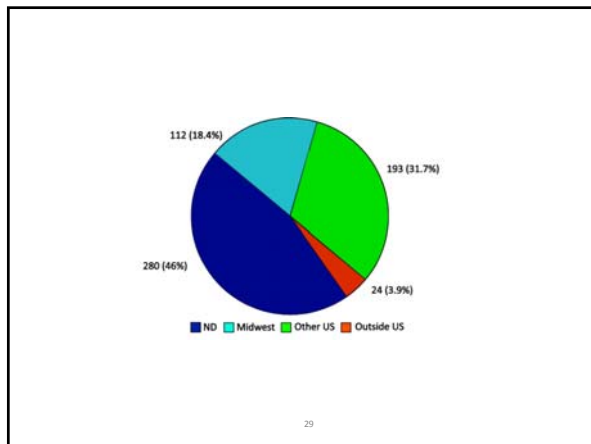
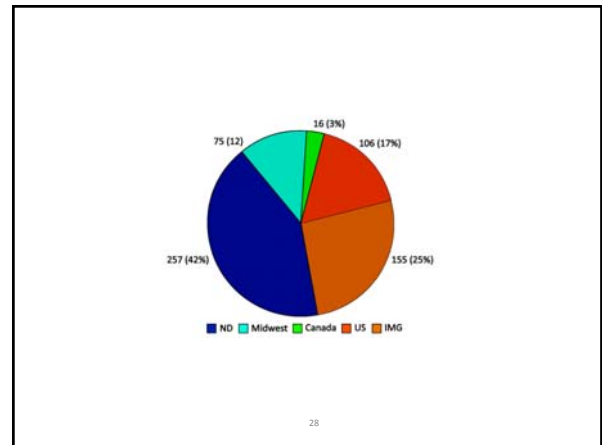
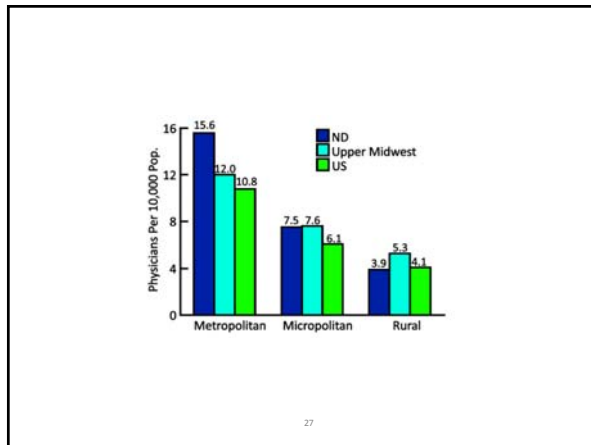
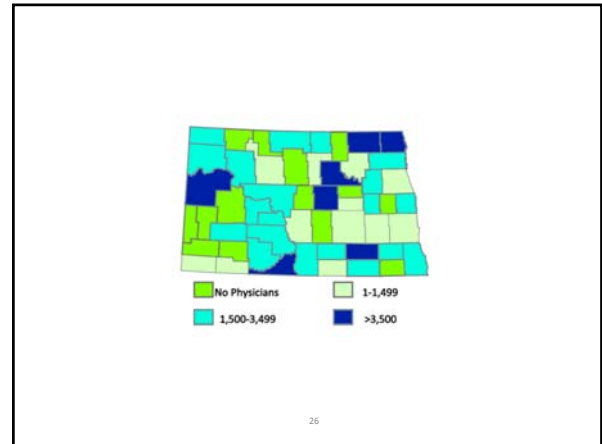
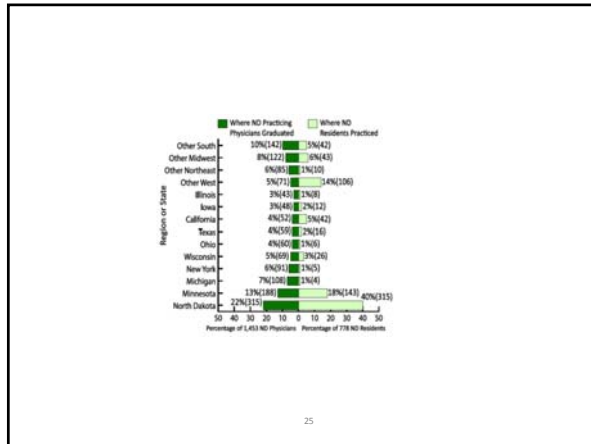
N=()	Total (583,766)	Female (287,302)	Male (296,464)	18-39 (227,828)	40-64 (225,917)	65-80 (80,585)	80+ (32,817)
<b>Smokes</b>	18.8	15.3	22.3	23.2	19.5	11.3	3.4
Metro	18.1	13.0	23.4	23.1	16.8	11.2	1.9
Micro	20.5	17.9	23.0	24.6	22.4	10.9	2.9
Rural	18.6	16.8	20.5	22.5	21.0	11.7	5.2
<b>Drinks Alcohol</b>	37.2	31.4	42.9	45.1	38.2	47.5	32.7
Metro	61.4	56.4	66.7	68.6	62.5	51.0	38.5
Micro	58.9	51.6	66.2	66.9	60.1	49.7	33.0
Rural	50.8	44.3	56.4	58.8	51.9	42.4	26.8
<b>Binge Drinks</b>	22.3	16.5	27.9	34.5	19.3	6.1	1.5
Metro	24.8	18.7	31.0	39.5	19.1	4.7	1.6
Micro	19.8	15.5	24.1	28.9	20.0	3.2	0.8
Rural	20.5	13.9	26.4	30.7	19.3	9.3	1.9
<b>Drinks &amp; Drives</b>	3.2	1.2	5.2	4.3	3.7	1.0	0.0
Metro	3.1	0.9	5.3	3.6	3.8	0.9	0.0
Micro	2.7	1.0	4.4	4.9	1.8	1.1	0.1
Rural	3.8	1.6	5.6	4.9	4.6	0.9	0.0
<b>Doesn't Always Wear a Seatbelt</b>	28.4	20.7	35.9	30.3	28.7	26.2	18.3
Metro	23.8	17.1	30.7	27.2	23.6	18.2	8.9
Micro	29.3	20.6	38.0	32.2	28.7	27.8	21.2
Rural	33.7	25.6	40.7	33.8	34.8	34.1	26.1
<b>Doesn't Exercise Moderately (2013)</b>	59.7	57.7	61.8	58.0	60.7	57.9	61.9
Metro	57.3	55.6	59.0	56.5	57.6	56.8	57.1
Micro	63.2	59.3	66.9	64.3	63.6	56.1	58.2
Rural	60.8	59.5	62.0	55.7	62.9	60.3	68.2

R = %	Total (583,766)	Female (287,302)	Male (296,464)	18-39 (228,401)	40-64 (230,439)	65-80 (80,584)	80+ (32,817)
<b>Disabled</b>	15.4	16.3	14.6	7.2	18.7	25.2	26.2
Metro	15.5	17.1	13.9	8.5	18.4	25.1	29.3
Micro	18.0	16.9	19	6.7	22.3	27.5	32.4
Rural	13.8	14.8	12.8	5.8	16.9	23.9	20.5
<b>Overweight/Obese</b>	63.7	53.5	73.6	57.6	78.5	78.1	57.0
Metro	62.9	53.8	72.4	56.1	71.4	68.7	61.5
Micro	66.9	53.5	80.1	61.8	72.3	76.2	57.4
Rural	62.8	53.1	71.3	57.6	68.3	68.2	52.1
<b>General Health Fair/Poor</b>	14.0	13.5	14.5	7.4	15.8	21.9	28.4
Metro	13.1	14.3	11.9	7.7	14.9	19.6	30.1
Micro	13.8	11.1	16.6	7.5	14.4	24.5	29.0
Rural	15.3	13.9	16.4	8.3	17.8	22.8	26.3
<b>1+ Days Poor Health</b>	16.4	19.1	13.8	16.7	17.4	14.0	13.8
Metro	17.3	18.9	15.6	18.3	18.2	14.1	11.8
Micro	16.0	18.8	13.3	15.5	17.3	12.9	18.5
Rural	15.6	19.6	12.0	15.1	17.0	14.6	13.1
<b>1+ Days Poor Physical Health</b>	31.2	33.5	29.1	29.5	32.3	32.1	34.5
Metro	31.3	32.7	29.8	28.7	34.0	32.4	34.3
Micro	31.3	35.0	27.7	30.1	31.4	30.5	39.3
Rural	31.1	33.5	29.0	30.3	31.0	32.7	31.9
<b>1+ Days Poor Mental Health</b>	30.5	36.0	25.2	36.2	30.3	20.1	16.2
Metro	32.2	37.1	27.0	35.1	34.0	22.3	17.2
Micro	32.9	38.7	27.0	45.8	28.2	18.0	10.4
Rural	27.0	32.7	22.1	31.8	27.0	19.0	18.5

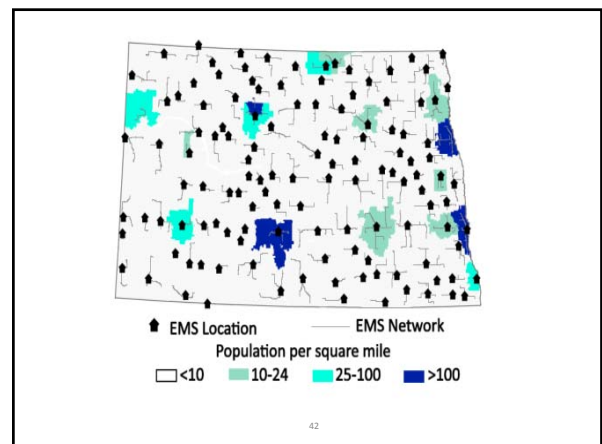
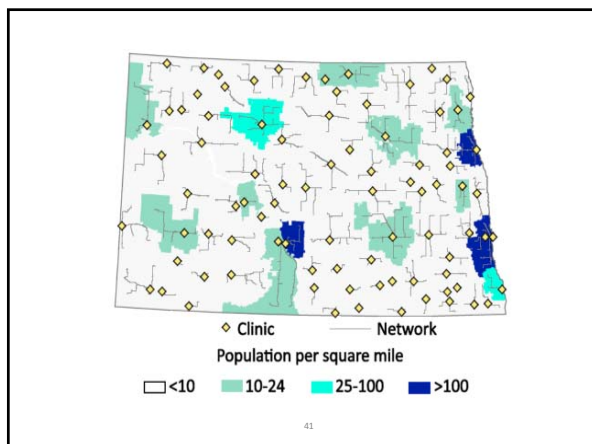
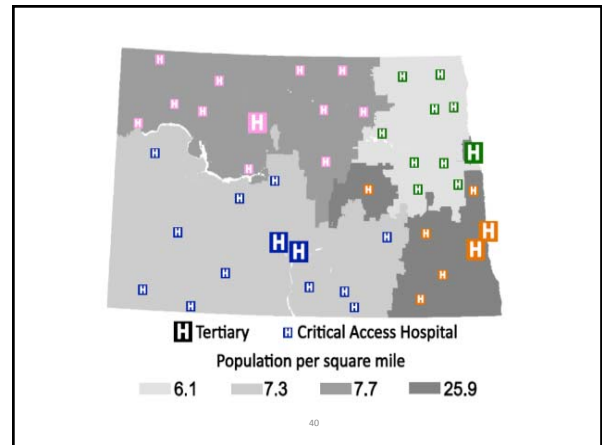
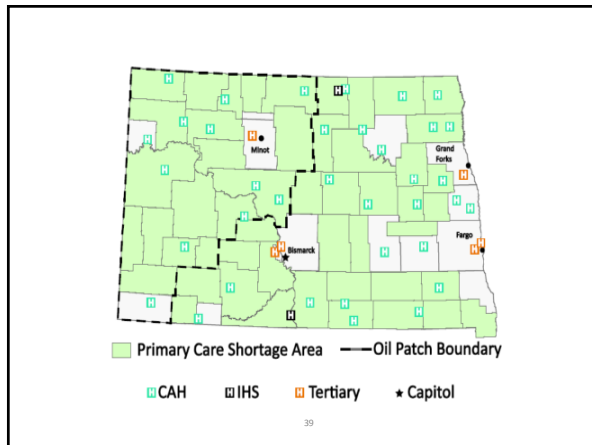
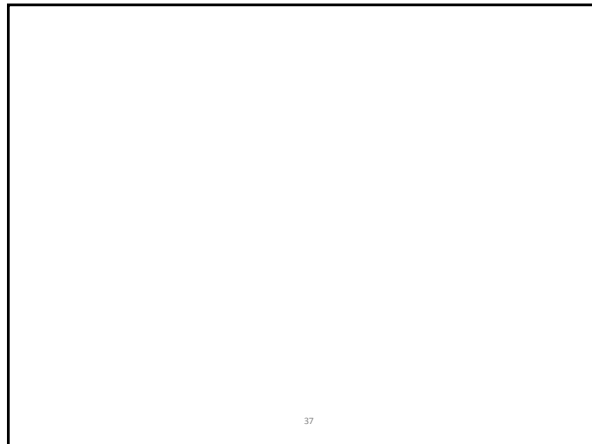
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No Physicians    1-1,499    1,500-3,499    >3,500

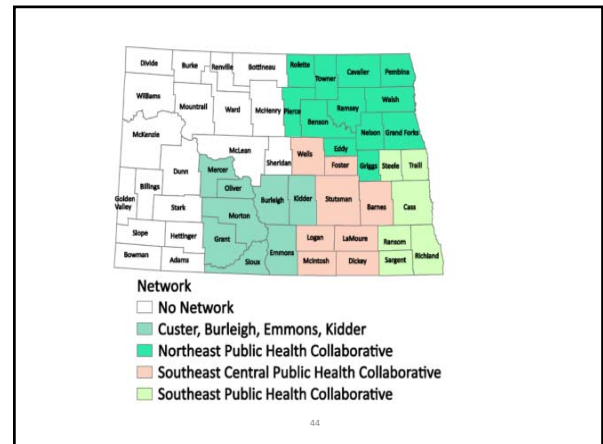
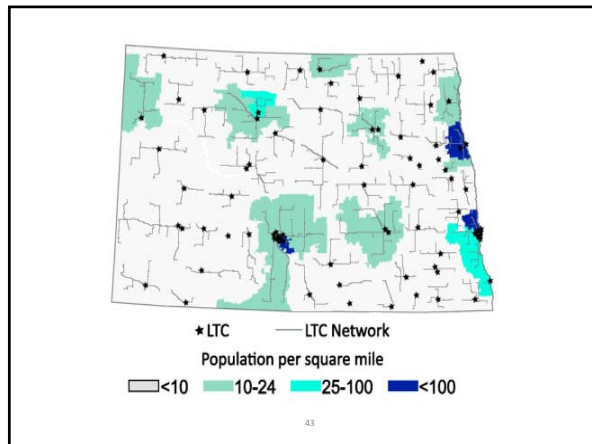








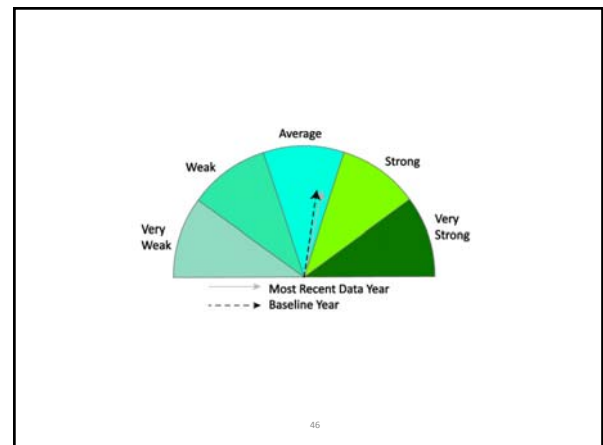




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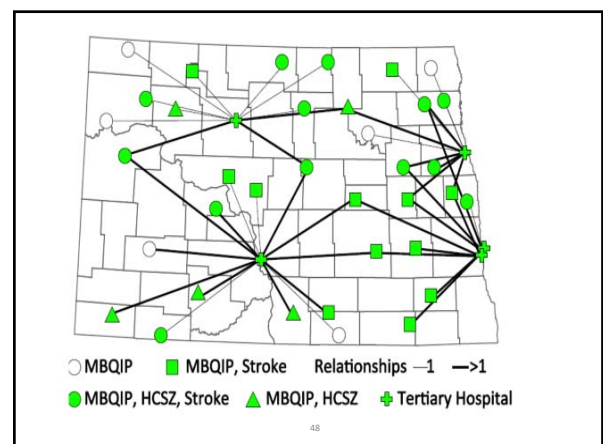
**Quality and the Value of Healthcare**

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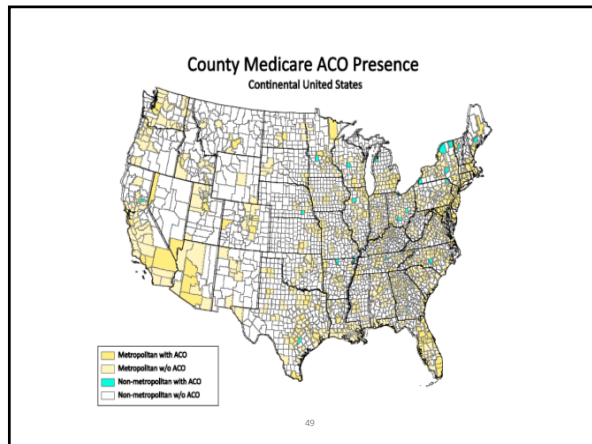


Category	2014	2015
Access	9th	25th
Prevention and treatment	17th	19th
Avoidable hospital use and costs	1st	22nd
Equity	18th	36th
Healthy lives	29th	27th

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**Shawnda Schroeder, PhD**  
Principal Investigator  
701-777-0787 • [shawnda.schroeder@med.und.edu](mailto:shawnda.schroeder@med.und.edu)

Center for Rural Health  
University of North Dakota  
501 N. Columbia Road Stop 9037  
Grand Forks, ND 58202

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Grand Forks, North Dakota 58202-9037

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