North Dakota Nursing Needs Study: Year Four Results and Comparisons

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July 21, 2006

Overview of the North Dakota Nursing Needs Study
Year Four Data Collection Projects
Year Four Products
Workplace Characteristics
Salary
Nursing Supply Pipeline
Year Four Conclusions
Year Five and Six Data Collection Projects
North Dakota Nursing Needs Study

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Year Four Data Collection Projects

- **Healthcare Facility Survey**
  200 facilities responded
  96% of counties represented

- **Licensed Nurse Survey**
  1,457 surveys completed on-line
  30% of Nurses who renewed on-line

- **High School Student Survey**
  568 students completed the survey online
  19 counties were included
Year Four Products

- Nursing Supply Fact Sheet
- Nursing Demand Fact Sheet
- Online reports for the three data collection projects
- Legislative Testimony
- Presentations and Posters at the National (3), State (4) and Community (3) level.
- Data has been incorporated into National Nurse Shortage Designation effort.
- Conclusions from the study are being considered by the North Dakota Nursing Leadership Council.

Workplace Characteristics
Statewide Vacancy Trend

Note: Vacancy rates include all responding health care facilities within each county (hospital, long-term care, clinic, home health and public health). Also, there is a difference in the numbers of incomplete responses across years. For example, there were 18 counties in 2005 and 23 in 2006 with incomplete data.
Note. Vacancy rates include all responding health care facilities within each county (hospital, long-term care, clinic, home health and public health). There were similar numbers of counties with incomplete data in 2005 and 2006.
LPN Turnover Map

Note. Turnover rates include all responding health care facilities within each county (hospital, long-term care, clinic, home health and public health). Also, there is a difference in the numbers of incomplete responses across years. For example, there were 18 counties in 2005 and 28 in 2006 with incomplete data.

RN Turnover Rate Map

Note. Turnover rates include all responding health care facilities within each county (hospital, long-term care, clinic, home health and public health). Also, there is a difference in the numbers of incomplete responses across years. For example, there were 11 counties in 2005 and 23 in 2006 with incomplete data.
### Workplace Changes Observed by LPNs in the Last Three Years

- **Mandatory Overtime:**
  - 2003: 12%
  - 2004: 12%
  - 2005: 12%
  - 2006: 11%

- **Larger Patient Care Load:**
  - 2003: 15%
  - 2004: 14%
  - 2005: 19%
  - 2006: 20%

- **Decreased Quality Care:**
  - 2003: 23%
  - 2004: 24%
  - 2005: 22%
  - 2006: 28%

- **Increased Use of LPNs:**
  - 2003: 53%
  - 2004: 50%
  - 2005: 49%
  - 2006: 47%

- **Organizational Decision-making:**
  - 2003: 23%
  - 2004: 21%
  - 2005: 23%
  - 2006: 24%

- **Non-patient Care Duties:**
  - 2003: 26%
  - 2004: 26%
  - 2005: 26%
  - 2006: 26%

- **Increased Floating:**
  - 2003: 31%
  - 2004: 27%
  - 2005: 21%
  - 2006: 18%

- **Mandatory Overtime:**
  - 2003: 38%
  - 2004: 43%
  - 2005: 42%
  - 2006: 35%

### Workplace Changes Observed by RNs in the Last Three Years

- **Mandatory Overtime:**
  - 2003: 19%
  - 2004: 19%
  - 2005: 19%
  - 2006: 19%

- **Larger Patient Care Load:**
  - 2003: 32%
  - 2004: 36%
  - 2005: 37%
  - 2006: 37%

- **Decreased Quality Care:**
  - 2003: 19%
  - 2004: 15%
  - 2005: 17%
  - 2006: 17%

- **Increased Use of LPNs:**
  - 2003: 52%
  - 2004: 47%
  - 2005: 42%
  - 2006: 31%

- **Organizational Decision-making:**
  - 2003: 22%
  - 2004: 22%
  - 2005: 22%
  - 2006: 22%

- **Non-patient Care Duties:**
  - 2003: 26%
  - 2004: 26%
  - 2005: 26%
  - 2006: 26%

- **Increased Floating:**
  - 2003: 21%
  - 2004: 23%
  - 2005: 24%
  - 2006: 24%

- **Mandatory Overtime:**
  - 2003: 38%
  - 2004: 43%
  - 2005: 42%
  - 2006: 35%
Nurses with a Secondary Nursing Job

Nurses Working Part-Time
Salary Issues

- Starting Salary from the Facility Survey
Starting Hourly Wage by State Quadrant

Comparison of Starting Wage by Year

Starting Wage

2006 2005 2004
• Average Salary from Facility Survey

Average Hourly Wage by Nursing Level

- APN: $34.27
- Bachelor RN: $19.10
- Associate RN: $19.19
- Associate LPN: $15.77
- Diploma LPN: $13.72

Average Wage

0 $5 $10 $15 $20 $25 $30 $35 $40
Average Hourly Wage by Rurality

Average Hourly Wage by State Quadrant
Comparison of Average Wage by Year

- Self-reported Salary from Licensed Nurse Survey
### Average Income by Urban-Rural Status

<table>
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<tr>
<th>Nurse Level &amp; Rurality</th>
<th>Urban</th>
<th>Semi-Rural</th>
<th>Rural</th>
<th>Overall Mean</th>
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<td>$24,742</td>
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<td>RN</td>
<td>$42,057</td>
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<tr>
<td>Overall Mean</td>
<td>$40,941</td>
<td>$35,290</td>
<td>$36,620</td>
<td>$38,409</td>
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</table>

### LPN Reported Salary and Rurality

![Graph showing LPN reported salary and rurality differences over years](chart.png)
RN Reported Salary and Rurality

Nursing Supply Pipeline
High School Student Field of Future Career

Area of Healthcare
Reasons for Not Planning on Nursing

- Dislike nursing settings: 18%
- Dislike people: 11%
- Dislike blood: 9%
- Unpleasant work: 8%
- Hours: 6%
- Salary: 0%

Highest Degree Planned

- CNA: 12%
- LPN: 8%
- RN: 33%
- APN: 21%
- Ph.D.: 25%
Location of Future Employment

Scenarios that would Encourage Healthcare Careers
Overall Conclusions

• Year 5 data collection efforts will help to determine if the decrease in severity of the RN shortage is just a one-year blip or a real phenomenon.
• There is a large pool of currently licensed nurses (23%) that are not currently fully utilized in the workforce.
• There is a pool of high school students interested in healthcare (38%) and potentially the nursing profession. Almost half of students plan to work in North Dakota and ¼ are unsure. Efforts should be increased to recruit and retain these future nurses in North Dakota.
• Efforts to coordinate facilities with education programs would increase the potential for increased clinical education opportunities in rural areas.

Year 5 and 6 Data Collection Projects

Year 5
• Facility Survey
• Licensed Nurse Survey

Year 6
• Faculty Survey
• Supply and Demand Projections
For more information contact:

Center for Rural Health
University of North Dakota
School of Medicine and Health Sciences
Grand Forks, ND 58202-9037

Tel: (701) 777-3848
Fax: (701) 777-6779

http://medicine.nodak.edu/crh

Connecting resources and knowledge to strengthen the health of people in rural communities.