Investigating job satisfaction and professional commitment of pharmacists across the United States: Findings from the 2014 National Pharmacist Workforce Survey

Robert A. Bechtol, PhD Student, University of Minnesota
Caroline A. Gaither, PhD, University of Minnesota
Jon C. Schommer, PhD, University of Minnesota
William R. Doucette, PhD, University of Iowa
David H. Kreling, PhD, University of Wisconsin
David A. Mott, PhD, University of Wisconsin

Disclosures
• The authors “declare(s) no conflicts of interest, real or apparent, and no financial interests in any company, product, or service mentioned in this program, including grants, employment, gifts, stock holdings, and honoraria.”

Learning Objectives
• To describe the levels of professional commitment and job satisfaction among actively practicing pharmacists.
• To examine the relationship between professional commitment and job satisfaction among actively practicing pharmacists when controlling for other relevant factors such as socio-demographic practice characteristics.

Q1. Which practice/work setting has the most significant relationship with professional commitment and job satisfaction?
A. independent pharmacy setting
B. hospital/health system setting
C. other patient care setting
D. other non-patient care setting

Background
• Professional commitment and job satisfaction are topics of interest for their contributing factor towards motivation and productivity in the workplace.¹
• Research has shown that employees who had higher levels of professional commitment demonstrated better job performance, higher job satisfaction and productivity, and less absenteeism and tardiness.²,³

Background (cont’d)
• While there has been some research done on these topics with health care employees and professionals, there is a paucity of knowledge within pharmacy and its workforce.
• It’s important for the profession to understand its constituents and how they feel at their practice or work environments because professional commitment and job satisfaction can have an impact on patient satisfaction and health care quality.
### Objectives

- To describe the levels of professional commitment and job satisfaction among actively practicing pharmacists.
- To examine the relationship between professional commitment and job satisfaction among actively practicing pharmacists when controlling for other relevant factors such as socio-demographic practice characteristics.

### Methods

- **Cross-sectional, descriptive survey research design**
- **Questionnaire mailed to the home addresses of licensed pharmacists**
- **A random sample of 5,200 pharmacists surveyed using a multiple contact approach**
- **Professional commitment and job satisfaction total scores were calculated and categorized**
  - See following slides
- **Other factors included: gender, ethnicity, age, practice/work setting, actual hours worked, and education level**
- **Chi-square test and multiple regression were used to analyze the data**

### Methods (cont’d)

#### D. Professional Commitment

<table>
<thead>
<tr>
<th>Strongly disagree</th>
<th>Disagree</th>
<th>Neither disagree nor agree</th>
<th>Agree</th>
<th>Strongly agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>

- It would be all over again, I would still choose to work in the pharmacy profession.
- I am disappointed that I ever entered the pharmacy profession.
- I like the profession overall or give it a try.
- I could go into a different profession rather than pharmacy, which paid for some I would probably do so.

#### C. Job Satisfaction in Your Work Environment

<table>
<thead>
<tr>
<th>Very dissatisfied</th>
<th>Dissatisfied</th>
<th>Neither satisfied nor dissatisfied</th>
<th>Satisfied</th>
<th>Very satisfied</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>

- In general, how satisfied are you with:
  - Your present job when compared to jobs in other organizations?
  - The opportunities you are making versus what you could be making?
  - The chance your job gives you do what you are best at doing?
  - Your present job in light of your career expectations?
  - Your present job when you consider the expectations you have versus the work you do?

### Methods (cont’d)

#### Professional Commitment:

- Some questions were reverse-scored using a 5-point agreement scale.
- Total commitment scores ranged from 5 to 25.
- Scores were categorized into 4 groups/levels:
  - Level 1 (5-10) = lowest professional commitment.
  - Level 2 (11-15) = minimal professional commitment (between lowest professional commitment and neutral commitment).
  - Level 3 (16-20) = moderate professional commitment (between neutral and highest professional commitment).
  - Level 4 (21-25) = highest professional commitment.

#### Job Satisfaction:

- Scored on a 5-point satisfaction scale.
- Total satisfaction scores ranged from 5 to 25.
- Scores were categorized into 4 groups/levels:
  - Level 1 (5-10) = least satisfied with the job.
  - Level 2 (11-15) = minimal satisfaction (between least satisfied and neutral satisfaction).
  - Level 3 (16-20) = moderate satisfaction (between neutral and most satisfied).
  - Level 4 (21-25) = most satisfied with the job.
Results

Professional Commitment Scores (N=1443)

Level 1 (5 to 10) Level 2 (11 to 15) Level 3 (16 to 20) Level 4 (21 to 25)

Percentage

0.00% 10.00% 20.00% 30.00% 40.00% 50.00% 60.00%

Results (cont’d)

JOB SATISFACTION SCORES (N=1439)

Percentage

0.00% 10.00% 20.00% 30.00% 40.00% 50.00% 60.00% 70.00% 80.00%

Professional Commitment by Gender

males females

P = 0.004

Professional Commitment by Job Position

management staff

P = 0.004

Job Satisfaction by Job Position

management staff

Professional Commitment by Age

< 30 years 31 to 40 years 41 to 50 years 51 to 60 years > 70 years

Level 1 (5 to 10) Level 2 (11 to 15) Level 3 (16 to 20) Level 4 (21 to 25)
Results (cont’d)

Job Satisfaction by Age

Level of job satisfaction
0.00% 10.00% 20.00% 30.00% 40.00% 50.00% 60.00%
Level 1 (5 to 10) Level 2 (11 to 15) Level 3 (16 to 20) Level 4 (21 to 25)

Results (cont’d)

Job Satisfaction by Practice/Work Setting

Level of professional commitment
0.00% 10.00% 20.00% 30.00% 40.00% 50.00% 60.00%
Level 1 (5 to 10) Level 2 (11 to 15) Level 3 (16 to 20) Level 4 (21 to 25)

Results (cont’d)

Multiple Regression Analyses

Table 1. Relationship between Professional Commitment and Demographic Practice Characteristics

<table>
<thead>
<tr>
<th>Variable</th>
<th>B</th>
<th>95% CI</th>
</tr>
</thead>
<tbody>
<tr>
<td>Constant</td>
<td>17.68**</td>
<td>15.65, 19.70</td>
</tr>
<tr>
<td>Age (ref.=&lt;30 yrs)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>31-40 yrs</td>
<td>-1.6**</td>
<td>-2.81, -0.40</td>
</tr>
<tr>
<td>41-50 yrs</td>
<td>-1.39*</td>
<td>-2.70, -0.09</td>
</tr>
<tr>
<td>&gt;70 yrs</td>
<td>2.38*</td>
<td>0.22, 4.54</td>
</tr>
<tr>
<td>Gender (ref.=male)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>1.55**</td>
<td>0.94, 2.17</td>
</tr>
<tr>
<td>Practice setting (ref.=independent)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Other non-patient care</td>
<td>2.03**</td>
<td>0.70, 3.37</td>
</tr>
<tr>
<td>Job position (ref.=management)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Staff</td>
<td>-1.19**</td>
<td>-1.85, -0.53</td>
</tr>
<tr>
<td>Education (ref.=no BS Pharm.)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BS Pharmacy</td>
<td>0.83*</td>
<td>0.04, 1.62</td>
</tr>
</tbody>
</table>

Note: *p-value<0.05; **p-value<0.01; R² = 6.2%; F-statistic = 5.08**

Results (cont’d)

Table 2. Relationship between Job Satisfaction and Demographic Practice Characteristics

<table>
<thead>
<tr>
<th>Variable</th>
<th>B</th>
<th>95% CI</th>
</tr>
</thead>
<tbody>
<tr>
<td>Constant</td>
<td>20.80**</td>
<td>18.96, 22.64</td>
</tr>
<tr>
<td>Practice setting (ref.=independent)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Chain</td>
<td>-3.28**</td>
<td>-4.35, -2.22</td>
</tr>
<tr>
<td>Mass merchant</td>
<td>-3.44**</td>
<td>-4.74, -2.15</td>
</tr>
<tr>
<td>Supermarket</td>
<td>-1.25**</td>
<td>-2.38, -0.18</td>
</tr>
<tr>
<td>Other non-patient care</td>
<td>1.03*</td>
<td>0.16, 2.24</td>
</tr>
<tr>
<td>Actual hours worked</td>
<td>-0.03**</td>
<td>-0.05, -0.01</td>
</tr>
<tr>
<td>Job position (ref.=management)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Staff</td>
<td>-1.28**</td>
<td>-1.83, -0.73</td>
</tr>
</tbody>
</table>

Note: *p-value<0.05; **p-value<0.01; R² = 11.7%; F-statistic = 9.10**

Results (cont’d)

Table 3. Relationship between Professional Commitment and Job Satisfaction Controlling for Demographic Practice Characteristics

<table>
<thead>
<tr>
<th>Variable</th>
<th>B</th>
<th>95% CI</th>
</tr>
</thead>
<tbody>
<tr>
<td>Constant</td>
<td>6.38**</td>
<td>4.27, 8.48</td>
</tr>
<tr>
<td>Job Satisfaction</td>
<td>0.54**</td>
<td>0.37, 0.71</td>
</tr>
<tr>
<td>Age (ref.=&lt;30 yrs)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>31-40 yrs</td>
<td>-1.26*</td>
<td>-2.31, -0.20</td>
</tr>
<tr>
<td>41-50 yrs</td>
<td>-1.28*</td>
<td>-2.41, -0.14</td>
</tr>
<tr>
<td>Gender (ref.=male)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>1.73**</td>
<td>1.19, 2.26</td>
</tr>
<tr>
<td>Practice setting (ref.=independent)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Chain</td>
<td>1.20**</td>
<td>0.65, 2.76</td>
</tr>
<tr>
<td>Hospital/health system</td>
<td>1.15*</td>
<td>0.37, 1.93</td>
</tr>
<tr>
<td>Other non-patient care</td>
<td>1.21*</td>
<td>0.64, 1.77</td>
</tr>
<tr>
<td>Education (ref.=no BS Pharm.)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BS Pharmacy</td>
<td>0.76*</td>
<td>0.26, 1.26</td>
</tr>
</tbody>
</table>

Note: *p-value<0.05; **p-value<0.01; R² = 28.6%; F-statistic = 24.20**
Discussion

• Based on frequency patterns, females and staff pharmacists seemed to score themselves at a higher level of professional commitment compared to males and those in management positions.

• Based on frequencies of total scores, those less than 30 years and greater than 60 years of age scored themselves at higher levels of professional commitment compared to those in the 31-60 age range.

• Those working in chain and mass merchandiser settings had the largest percentages of respondents at the lowest level of professional commitment. Independent and non-patient care settings had the largest percentages at the highest level of commitment.

Discussion (cont’d)

• Distribution of job satisfaction significantly differed by job position, age, and practice/work setting.

• Pharmacists working in “other non-patient care” setting had the highest levels of job satisfaction compared to other practice settings. Non-patient care setting included industry, academia, and pharmacy benefit administration. The chain pharmacy setting had the lowest levels of job satisfaction.

  — Similar to previous research that found that community pharmacists had low levels of satisfaction with their jobs.4

Discussion (cont’d)

• On average, a 1 unit increase in professional commitment scores was associated with a 1.2 unit decrease for staff pharmacists compared to those in management positions after controlling for other factors.

• With regards to job position, a similar phenomenon was seen with staff pharmacists having lower job satisfaction scores, on average, compared to those in management positions after controlling for other factors.

Key Points

• Overall, pharmacists were very professionally committed while moderately satisfied with their jobs (satisfied but not at the highest level).

• Distribution of professional commitment and job satisfaction significantly differed by job position, age, and practice/work setting. Gender only applied to commitment.

• When assessing job satisfaction, practice setting, actual hours worked, and job position were significant factors of the model.

• In the professional commitment model, job satisfaction, age, gender, practice setting, and education were all significant factors.

• Further research is needed to investigate other factors that may explain pharmacists’ professional commitment.

Q1. Which practice/work setting has the most significant relationship with professional commitment and job satisfaction?

A. independent pharmacy setting
B. hospital/health system setting
C. other patient care setting
D. other non-patient care setting

References