Injured Worker Survey Project: An Introduction to Using Surveys to Measure Outcomes and Impacts

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Why do a survey?

How can we measure workers’ compensation systems?

• For employers: Employer Premiums
• For insurers: Medical and Indemnity Benefits Paid Out
• Injured Workers?

Current data reporting requirements do not fully capture the injured worker experience.

• With a survey targeted at injured workers, we can systematically and quantitatively measure outcomes and impacts of a work related injury.
Questions we want to answer:

1. For a given outcome or a given predictor: what is the average response or the proportion of respondents that answered a particular way?
   - What is the level of precision and associated confidence interval?

2. For a given outcome: which predictors are associated with better or worse outcomes?
   - What are the statistically significant predictors that impact a given outcome?
   - Is there a relationship? Does [predictor] impact [outcome]?

3. What is the relationship between [outcome] and [predictor]?
   - Positive/Negative? Large/Small?
   - What is the level of precision and associated confidence interval?
   - How do outcomes differ between different groups?

4. What are the implications of our findings?
Example Questions

• What proportion of injured workers achieve substantial return to work?
• For those injured workers that achieve substantial return to work, what is their average disability duration?
• How satisfied are injured workers with their medical services?
• Is there a difference in satisfaction with medical provider for those that did and did not choose their treating provider? Satisfaction with medical services?
• How do outcomes differ between individuals that did and did not have health insurance pre-injury?
• What is the effect of pre-injury job satisfaction on return to work?
• How does vocational rehabilitation impact earnings recovery?
• How does a worker’s concern for being fired affect disability duration?
• How does firm size impact disability duration?
<table>
<thead>
<tr>
<th>Recovery of Physical Health and Return to Work Variables</th>
<th>Financial Impact and Earnings Recovery</th>
<th>Access to Care and Satisfaction with Care</th>
<th>Other</th>
</tr>
</thead>
<tbody>
<tr>
<td>Self-Reported Recovery of Physical Health</td>
<td>Change in ability to afford essentials</td>
<td>Issues with finding a provider</td>
<td>Satisfaction with claims adjustor</td>
</tr>
<tr>
<td>Substantial Return to Work</td>
<td>Change in ability to afford nonessentials</td>
<td>Issues with getting medical services</td>
<td>Satisfaction with DLI customer service</td>
</tr>
<tr>
<td>No Substantial RTW: Due to injury?</td>
<td>Yes Substantial RTW: Time to recover financially</td>
<td>Satisfaction with Medical Care</td>
<td>Satisfaction with workplace safety</td>
</tr>
<tr>
<td>Yes Substantial RTW: Duration Disability</td>
<td>Worker suffered earnings losses due to injury</td>
<td>Satisfaction with Provider</td>
<td></td>
</tr>
</tbody>
</table>

*Outcomes in red are variables included on WCRI Injured Worker Surveys (but may be measured differently). *Outcomes in blue are additional outcomes of interest.
# Predictors of Interest

<table>
<thead>
<tr>
<th>Worker Characteristics</th>
<th>Job Characteristics</th>
<th>Medical Care &amp; Injury Characteristics</th>
<th>Other Characteristics</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age</td>
<td>Disability status</td>
<td>Part-time/Full-time</td>
<td>Injury severity</td>
</tr>
<tr>
<td>Gender</td>
<td>Prior injury</td>
<td>Industry</td>
<td>Choice of treating physician</td>
</tr>
<tr>
<td>Marital status</td>
<td>Prior WC claims</td>
<td>Length of time with that employer</td>
<td>Nature of injury</td>
</tr>
<tr>
<td>Education level</td>
<td>Job history</td>
<td>Pre-injury job satisfaction</td>
<td>Involvement in decisions about medical care</td>
</tr>
<tr>
<td>Health insurance</td>
<td>Wage level</td>
<td>Concern with being fired post-injury</td>
<td>Work plan discussed with provider post-injury</td>
</tr>
<tr>
<td>Household size</td>
<td>Household earners</td>
<td>RTW with same employer</td>
<td>Work plan discussed with employer post-injury</td>
</tr>
<tr>
<td>Comorbidities</td>
<td>Firm size</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

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*Predictors in blue are additional variables of interest.*
Population Description

Who is our population of interest?

• All workers with injuries that occurred between January 1, 2012 and December 31, 2015 that received wage-loss benefits
  • Why this time period?
    • Long-term impacts, accurate responses, correct addresses
    • Why only claims that received wage-loss benefits?
      • Expect medical-only claims to be systematically different

• Current total population size: 14,430 workers
Current Status and Timeline

- Determine research questions and variables of interest
- Determine population
- Determine sample size and estimate cost
- Draft survey, review, make necessary corrections
- Randomly sample
- Distribute surveys (Target date: 3/30/2018)
- Compile data (Target date: 9/30/2018)
- Analyze data (Target date: 11/31/2018)
- Research paper/Presentation of findings (Target date: 12/31/2018)
Future: Injured Worker Survey – Part 2

- Annual injured worker surveys
- Track how injured worker outcomes change over time
- Measure before and after impacts of new laws and reforms
Questions?/Thank you!

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