The Value of Connecting Employee Engagement, Patient Experience & Malpractice Costs

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Conflict of Interest Disclosure

Diane Moritz, Patrick Kulesa and David Na do not have any real or apparent conflicts of interests or vested interests that may have a direct bearing on the subject matter of the continuing education activity.
Learning Objectives

This presentation will enable participants to:

• Coordinate study of employee engagement, patient satisfaction and malpractice data
• Apply analysis to mitigate malpractice risk
Presentation Overview

- Disparate groups inside hospitals track and report relevant operational data:
  - Employee engagement & physician burnout
  - Patient satisfaction
  - Safety incidents
  - Quality of care
  - Malpractice claims and costs
- Advantages from analyzing these data sources together are often missed because groups do not coordinate to study the data collectively
- Given the significant emphasis now placed on integrating systems, driving efficiencies, and unifying efforts in healthcare organizations, data integration and analysis provide a unique vehicle to uncover ROI and help drive growth
- In this presentation, we summarize examples from three hospital systems exploring linkages with malpractice metrics and their implications
What Story Does the Data Truly Tell You?
How might malpractice information link with other measures?

- Higher malpractice claim rates/costs should be associated with lower patient satisfaction – units with less satisfied patients have higher claim rates/costs.
- More patient satisfaction should be associated with higher employee engagement.
- Higher employee engagement, less physician burnout may directly link with lower claim rates/costs.

Specifying the Model: Predictions Tested

Engaging Employees & Physicians

Satisfying Patients

Lower Medical Malpractice (claims, cost)
Overview of case examples:

- Data obtained from three large healthcare systems:
  - Dozens of hospitals per system (114 in total included in research)
  - More than 100,000 employees per system
  - Including faith-based institutions, national & regional systems

- At the hospital level, each unit provides aggregate scores on:
  - Employee engagement
  - Physician engagement & physician burnout
  - Patient satisfaction (overall and specific dimensions of experience)
  - Medical malpractice claims (frequency & severity)
What Do We Mean by Employee Engagement?

Am I motivated, enabled and energized to deliver my best performance?

Am I happy here?

Do I intend to stay here?

Am I rationally and emotionally connected and motivated to invest discretionary effort?

Organizations that achieve high levels on all three realize:

- **41%** lower retention risk
- **6.5** fewer days lost
- **3X** higher operating margin
### Summary of Results: Claim Rates & Opinions

<table>
<thead>
<tr>
<th>Case Example</th>
<th>Medical Malpractice Frequency</th>
<th>Significant Correlations with Malpractice Frequency</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>1. Based on 26 hospitals</strong></td>
<td>Claims &gt; $0 per 100 exposures: 3-year rate</td>
<td>Courtesy from Nurses (-.54)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Pain Management (-.53)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Overall Rating of Hospital (-.52)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Cleanliness &amp; Quietness (-.51)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Nurse Communication (-.51)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Recommend Hospital (-.40)</td>
</tr>
<tr>
<td><strong>2. Based on 39 hospitals</strong></td>
<td>Claims &gt; $0 per 100 exposures: 3-year rate</td>
<td>Quietness (-.43)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Staff Explained Medicine (-.38)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Doctor Communication (-.35)</td>
</tr>
<tr>
<td><strong>3. Based on 49 hospitals</strong></td>
<td>Claims &gt; $15,000 per 100 exposures: 3-year rate</td>
<td>Employee Engagement (-.45)</td>
</tr>
<tr>
<td></td>
<td>Total Limit Occupied Bed Equivalent</td>
<td>Recommend Hospital (-.34)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Overall Rating of Hospital (-.29)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Emotional Exhaustion (-.41)</td>
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<tr>
<td></td>
<td></td>
<td>Total Physician Burnout (-.35)</td>
</tr>
</tbody>
</table>

In each case, opinion measures correlate negatively and significantly with malpractice claim frequency – when opinions are more favorable, claim rates are lower.
Example from Each Case Study – Gaps Show Lower Rates of Malpractice Claims in Units with Higher Patient Satisfaction or Employee Engagement

Claim Rates by Opinion Favorability

*Claims > $0 per 100 exposures 3-year mean rate for first two cases; Claims > $15K per 100 exposures 3-year mean rate for third case.
Summary of Results:
Patient & Employee Opinion

<table>
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<tr>
<th>Case Example</th>
<th>Employee Opinion</th>
<th>Significant Correlations with Employee Engagement</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Based on 26 hospitals</td>
<td>Employee Engagement</td>
<td>Overall Rating of Hospital (.69)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Nurse Communication (.68)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Cleanliness &amp; Quietness (.67)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Courtesy from Nurses (.54)</td>
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<td></td>
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<td>Pain Management (.53)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Recommend Hospital (.45)</td>
</tr>
<tr>
<td>2. Based on 39 hospitals</td>
<td>Supporting Employee Health</td>
<td>Doctor Communication (.52)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Staff Explained Medicine (.42)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Quietness (.40)</td>
</tr>
<tr>
<td>3. Based on 49 hospitals</td>
<td>Employee Engagement</td>
<td>Recommend Hospital (.48)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Overall Rating of Hospital (.48)</td>
</tr>
</tbody>
</table>

In each case, employee opinion correlates positively and significantly with all patient satisfaction measures – when employees are more engaged, patients are more satisfied.
Example from Each Case Study – Gaps Show Higher Rates of Patient Satisfaction in Units with More Favorable Employee Opinion

- More favorable employee opinion: Above median
- Less favorable employee opinion: Below median

Patients satisfaction:
- Cleanliness & Quietness: 56 (red), 50 (gray)
- Quietness: 57 (red), 55 (gray)
- Recommend Hospital: 75 (red), 60 (gray)
What Story Does the Data Truly Tell You About Your Health Care Organization?
Trinity Health’s 22-State Diversified System

$17.6B
In Revenue

1.3M
Attributed Lives

$1.1B
Community Benefit Ministry

131K
Colleagues

7.5K
Employed Physicians and Clinicians

25.6K
Affiliated Physicians

93
Hospitals*

22
Clinically Integrated Networks

13
PACE Center Programs

109
Continuing Care Locations

*Owned, managed or in JOAs or JVs.
Locations with Immediate Needs & Locations Exhibiting Leading Practices

Entities by Levels of Employee Engagement & Claim Frequency*

*Levels versus median score for employee engagement and claim frequency (rates of claims greater than $15K per 100 exposures)
Employee Survey: Pearls of Wisdom

• Issues that can derail a survey and the study of results:
  – Significant inconsistency in survey questions from one survey to the next
  – Changes in rating scales from one survey to the next

• Standardize your surveys in order to establish outcome metrics for strategic initiatives
Overview of Physician Burnout

• Some statistics:
  – 1 in 3 physicians are experiencing burnout at any given moment\(^1\)
  – 55 percent of physicians report symptoms of burnout in a recent survey\(^2\)
  – Burned out physicians are twice as likely to self report a medical error

• Some consequences:\(^1\)
  – Lower patient satisfaction and quality of care
  – Higher medical error rates
  – More turnover (physicians & staff)
  – Higher risks of drug abuse, addiction, suicide

• Our focus & contribution:
  – Directly explore statistical correlation between reported physician burnout and rates of medical malpractice claims
  – Quantify this link to show the reality of the risk

\(^1\) https://www.aafp.org/fpm/2015/0900/p42.html
Maslach Burnout Inventory (MBI)

• Assessment of occupational burnout based on:
  – Emotional Exhaustion
  – Depersonalization
  – Reduced Personal Accomplishment

• Standardized and consistent results across multiple industries
Physician Burnout Correlates With Malpractice Claims (Part 1)

- Less favorable scores on Recommend to Other Physicians are associated with higher rates of claims per exposure and total limit loss cost, as evidenced by significant correlations that are negative.
- Recommend to Other Physicians correlates significantly with two claims-related measures (3 year mean rates):
  - Claims greater than $15,000 per 100 exposures
  - Total limit loss cost

![Diagram showing correlations between Physician Burnout, Recommend to Other Physicians, Medical Malpractice, Claims greater than $15K per 100 exposures, and Total limit loss cost with correlation coefficients -0.33 and -0.41.]
Physician Burnout Correlates With Malpractice Claims (Part 2)

• More favorable scores on All Physician Burnout are associated with lower rates of Total Limit Occupied Bed Equivalent
• More favorable scores on Emotional Exhaustion are associated with lower rates of Total Limit Occupied Bed Equivalent

![Chart showing correlations between Physician Burnout, Medical Malpractice, All Physician Burnout, and Emotional Exhaustion]

- Physician Burnout ↔ Medical Malpractice
- All Physician Burnout ↔ Medical Malpractice, $r = -.35$
- Emotional Exhaustion ↔ Medical Malpractice, $r = -.41$
Physician Burnout: Based on Activity Level

Units with High Favorability are approximately 40% of the “size” of those with Low Favorability

Graph showing:
- Total Limit Occupied Bed Equivalent
- Comparison between High Favorability: Above the median and Low Favorability: Below the median for All Physician Burnout and Emotional Exhaustion

- For All Physician Burnout:
  - High Favorability: 687
  - Low Favorability: 1,544

- For Emotional Exhaustion:
  - High Favorability: 643
  - Low Favorability: 1,549
Emotional Exhaustion & Total Limit OBE*

- In general, lower (worse) emotional exhaustion scores trend with higher OBE’s, and higher (better) emotional exhaustion scores trend with lower OBE’s.
- Do physicians practicing at facilities with higher exposures (OBE’s) have less camaraderie or social connectedness?

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*Levels versus median score for Emotional Exhaustion and Total Limit Occupied Bed Equivalent
“No organization has unlimited resources, so we must deploy what we have in an intentional, purposeful way.”

– IHI President and CEO Derek Feeley shares his advice regarding the strategic use of the Quadruple Aim, November 2017.
Questions?
Thank you!

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