

Joint Health and Safety Committees in Hospitals: a journey to improve effectiveness

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Centre for
Research Expertise
in Occupational Disease

Research that makes a Difference

Overview

- Background
- Program of Research in Healthcare
- Phase 1 – Form and Function
- Phase 2 – Gold Standard JHSC
- Phase 3 – Develop and Pilot Test a JHSC Assessment Tool
- What's Next?

Background

Joint health and safety committees

- Legal requirement and a key component of the *internal responsibility system*

Literature Review

- Objective measures of effectiveness (1980 – 2000)
- More critical assessment of efficacy and the factors that are needed for success (2000 – current)
- Focus on manufacturing and industrial sector workplaces

Background

Healthcare sector

- Minimal JHSC research
- SARS Commission Report – “Hospital JHSCs sidelined”
- Yassi (AJIM 2013)
 - review
 - the key to a successful JHSC is having clear guidelines on what is required for the committee to be effective.

Program of research - healthcare

Phase 1

2006-7

Role, resources,
structure, function

Phase 2

2009-10

Effectiveness and
impact

Phase 3

2013-14

Development and
testing of a tool to
measure JHSC
effectiveness

Researchers

- Core team – participated in all phases
 - Kathryn Nichol, Irena Kudla, Linn Holness
- Phase 2
 - Laureen Hayes, Vera Nincic
- Phase 3
 - Lynda Robson, Chun-Yip Hon, Richard Bilan, Stephanie Spielmann, Helen Kelly, Jonas Eriksson, Sonca Lengoc

JHSC Study – Phase 1 – 2006/07

- To understand the role, resources, structure and function of JHSCs in acute care hospitals in Ontario.
- Cross-sectional survey of worker and management JHSC co-chairs from all acute care hospitals in Ontario

- Healthcare Quarterly, 2009;12:86–93



Methods

- 378 surveys were mailed out
- 220 were returned
- 58% response rate
- 105 from management co-chairs
- 115 from worker co-chairs
- Completed pairs received from 73/189 organizations (39%)

Results

- Strengths
 - Compliance
 - Despite concerns raised by the Campbell Report, study found compliance with legislation to be quite high
 - Resources/experts
 - A wide variety of resources/experts were available to the JHSC to assist them to carry out their responsibilities

Results

- Gaps

- Training and education

- Although survey results indicated 93% of hospital JHSCs had completed hazard-specific certification training, only 22% indicated that committee members received training at least once every two years

- JHSC status and visibility

- Only 18% of respondents reported that their JHSC had high status and visibility within the organization

JHSC Study – Phase 2 – 2009/10

- To describe understanding of
 - Role and impact of JHSC
 - How effectiveness of JHSC should be measured
 - By internal hospital & external stakeholders
- Qualitative descriptive study in 2 parts
 - Individual interviews and focus groups with staff at 3 hospitals
 - Individual interviews with external stakeholders

Methods

- 3 hospitals of varying size
- Individual interviews (15) with
 - Board member, CEO, CNO, physician leader
- Focus groups (20) with
 - Program directors, managers, occupational health and infection control, JHSC, front line nurses, environmental workers, dietary workers, allied health (120 participants)

Methods

- Interviews with 8 external stakeholders
 - MoHLTC Nursing Secretariat
 - Healthcare representative from the Ministry of Labour
 - Health and safety representatives from healthcare unions (ONA, OPSEU and SEIU)
 - Health and safety representatives professional organizations (RNAO, OHA, OMA)

Results

- JHSC Awareness
 - Gaps in awareness and understanding
 - Lack of clarity about who is responsible for OHS
- Impact and effectiveness
 - Vital role but low profile and visibility

Results

- Facilitators for effectiveness
 - Leadership commitment
 - Educated and trained committee members
 - Committed members
 - Communication and transparency
 - No fear of reprisal to report issues/concerns

Gold Standard JHSC

Approachable

Representative

Communicates

Committed

Supported

Makes
recommendations

Educated and
Trained

Clear mandate and
objectives

Legislative
compliance

Voice for workers
concerns

Visibility and
leadership

Next steps

- Awareness and training – MOL priority
- Management involvement
- Evaluation tool (also a recommendation of Yassi's Systematic Review)

JHSC Study - Phase 3 – 2013/14

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Linn Holness

Irena Kudla

Lynda Robson

Chun-Yip Hon

Richard Bilan

Stephanie Spielmann

Helen Kelly

Jonas Eriksson

Sonca Lengoc



- Advisory Committee – OPSEU, MOL, PSHSA, OHA
- Funding – Ontario Ministry of Labour

Tools to Assess IRS and JHSCs

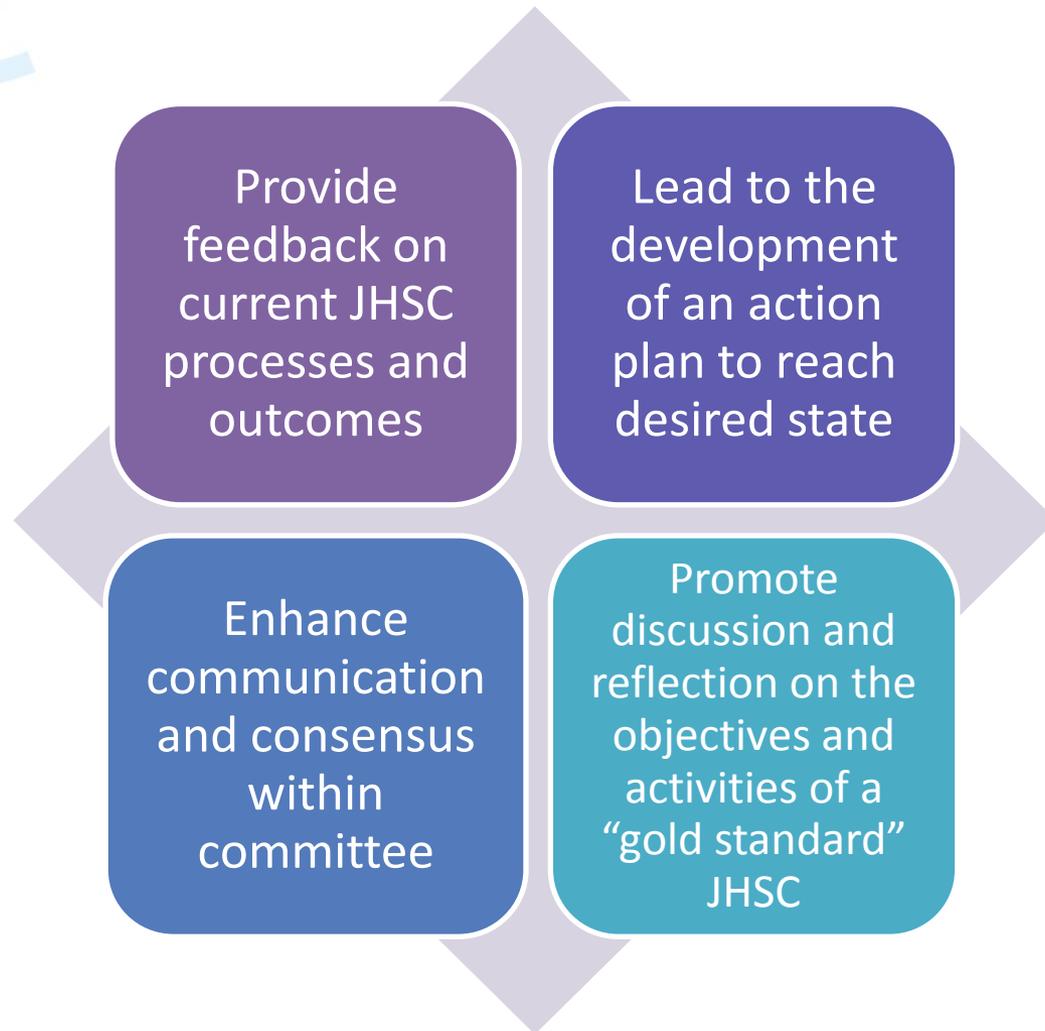
- MOL sponsored project to develop an IRS audit tool for the mining sector
- HSA audit tools – IHSA, PSHSA
- IWH Benchmarking Leading Organizational Indicators Study

Objective

To create and pilot test an assessment tool to evaluate the effectiveness of a hospital JHSC.

- Designed to be a self-assessment and referral mechanism for JHSC members
- Structured similar to an “audit-and-feedback” type tool

Purpose of Assessment Tool



Safety Element Method (Alteren, 1999)

1.0 APPROACHABILITY

JHSC Feature	1	2	3	4	5
JHSC member identification Score: _____	There is no list of committee members readily available.	A list of committee members is readily available, but is <u>not</u> posted publicly.	The list of names of committee members are posted in only one place (e.g. a department notice board or online).	The list of names of committee members are posted in more than one location (e.g. a department notice board or online). Changes to membership are <u>not</u> updated promptly.	The list of names of committee members are posted in more than one location (e.g. a department notice board or online). Changes to membership are updated promptly.
JHSC member approachability Score: _____	The JHSC is never contacted/ approached for advice on occupational health and safety (OHS) issues.	The JHSC is rarely contacted/ approached for advice on occupational health and safety (OHS) issues.	The JHSC is sometimes contacted/ approached for advice on occupational health and safety (OHS) issues.	The JHSC is usually contacted/ approached for advice on occupational health and safety (OHS) issues.	The JHSC is always contacted/ approached for advice on occupational health and safety (OHS) issues.

Methods

Usability and feasibility testing appropriate for the formative phase of product development

Part 1 – “Think-aloud” cognitive interviews

- content validity, readability, comprehension

Methods

Part 2 – Usability surveys and observation of meetings with 4-6 hospital JHSCs

Before JHSC meeting

- JHSC members work through the assessment tool on their own and evaluate the effectiveness of their JHSC
- Complete a short pre-meeting usability questionnaire

At JHSC meeting

- JHSC worked through the assessment tool as a group and evaluate their effectiveness
- Researchers will observe and record meeting

After JHSC meeting

- JHSC members work through the assessment tool on their own and evaluate the effectiveness of their JHSC again
- Complete a short post-meeting usability questionnaire

Analysis

Observations

- How long did it take to complete the assessment?
- How long did it take to reach consensus for each item? Which items took the longest time to come to consensus on?
- Were committees able to identify their top three priorities? What were the most common priorities?
- How did individual ratings change after working through the tool as a committee?

Usability surveys

- Description of the usability experience (ease of understanding, length, value, relevance)
- How did the usability experience of the committee members change after undergoing the group interaction?
- Did committee members think that the tool helped the group develop a shared understanding of the effectiveness of the JHSC?

Results

Version 1 JHSC Assessment Tool (20 items)

1. Approachability
2. Representation
3. Commitment
4. Communication with Workforce
5. Support & Resources
6. Formal Written Recommendations
7. Education & Training
8. Mandate & Objectives
9. JHSC Activities
10. Visibility & Leadership

Results – Part 1

- 7 JHSC members participated in Part 1 - cognitive interviews
 - 45-60 minutes
- Most comments related to formatting and use of language
 - Acronyms were removed
 - Words simplified
 - Two-element questions were revised
- Version 2 of the tool was created

Results – Part 2

Overall response

- 42 JHSC members from 5 hospital JHSCs participated in Part 2 (47% response rate)

Usability testing response

- Pre meeting survey: 85.3% (29/34)
- Post meeting survey: 80.0% (28/35)

Paired analysis

- Usability testing - 21 matched pairs
- Assessment tool – 23 matched pairs

Results – Feasibility Testing

- Time to complete tool was less than one hour (M=40m; R=32-45m)
- Able to come to consensus on 95% of items
- Time to reach consensus ranged from 5-365s
- Items most challenging – availability of experts, critical injury/fatality investigations, work refusals
- Able to agree on top 3 priorities – education, communication and developing a strategy

Results – Highest and Lowest Scored Items by JHSCs

Highest

- Availability of OHS experts to JHSC
- Employer addresses committee recommendations
- JHSC member identification/Terms of reference/Meeting agendas (tied)

Lowest

- Annual JHSC member training in addition to certification training
- Annual strategies
- Workers knowledge of the JHSC and perceptions of JHSC members as effective leaders for OHS

Results – Effects of Using Assessment Tool

Assessment Tool Item	Pre		Post		N	p
	M	SD	M	SD		
1a) JHSC member identification	4.00	.953	3.91	.793	23	.724
1b) JHSC member approachability	3.57	1.080	3.13	1.058	23	.135
2a) JHSC member participation during meetings	3.77	1.232	3.68	1.129	22	.715
3a) JHSC member engagement and enthusiasm	3.82	.733	3.86	.560	22	.789
4a) JHSC communicates OHS information to employees	3.73	1.032	3.00	1.155	22	.026
4b) Posting and distribution of the meeting agenda and minutes	3.40	1.465	3.45	1.317	20	.904
5a) Time to prepare for and attend JHSC meetings and carry out committee activities	4.23	.922	2.86	1.167	22	<.001
5b) Availability of OHS experts to JHSC	4.05	.950	4.36	.848	22	.090
6a) Employer addresses committee recommendations	4.20	.894	3.70	1.380	20	.106
7a) JHSC member training: Part I Basic Certification Training	3.33	1.017	3.38	.740	21	.841
7b) JHSC member training: Part II Workplace-Specific Hazard Training	2.86	1.389	2.76	1.338	21	.785
7c) Annual JHSC member training in addition to certification training	3.05	1.393	2.84	1.119	19	.508
8a) Terms of reference	4.17	.778	4.13	.694	23	.814
8b) Meeting agendas	4.13	1.140	4.22	.795	23	.753
9a) Workplace inspections	3.87	1.014	3.65	1.229	23	.447
9b) Participating in accident/injury investigations where a worker is killed or critically injured	4.00	1.265	3.00	1.414	6	.275
9c) Work refusals	4.00	1.549	2.50	1.517	6	.178
9d) Sharing reports with and consulting JHSC on OHS issues	4.11	1.329	3.63	1.461	19	.120
10a) Annual strategies to raise JHSC profile	3.63	1.212	2.42	1.261	19	.007
10b) Workers knowledge of the JHSC and perceptions of JHSC members as effective leaders for OHS	3.26	1.284	2.74	.933	19	.066

Results – Usability Testing

Paired analysis of pre- and post-usability scores (Range 1-5) (N=21)

Item	Pre		Post		P-value
	M	SD	M	SD	
The assessment tool was easy to understand.	4.43	.926	4.24	.768	0.446
The assessment tool was an appropriate length.	4.52	1.078	4.24	.768	0.329
It would be of value for my JHSC to work through this tool.	4.76	.436	4.71	.463	0.715
The assessment tool highlighted responsibilities of JHSCs that I had previously not considered.	4.33	.793	4.52	.814	0.358
The assessment tool addressed all of the relevant issues for a gold standard JHSC.	4.33	.658	4.29	.956	0.853
I think this assessment tool could improve the way my JHSC currently operates.	4.48	.602	4.71	.561	0.096
I think this assessment tool could bring my JHSC closer to a gold standard.	4.48	.680	4.67	.483	0.162
I think this assessment tool could bring other JHSCs closer to a gold standard.	4.43	.676	4.57	.676	0.419
I would be interested in using this assessment tool with my JHSC.	4.57	.598	4.62	.590	0.771
I think my JHSC would have little to no difficulty coming to a consensus on many of these items.	3.90	1.044	4.29	.956	0.225
If this tool highlighted limitations of my JHSC, I would be willing to work on addressing them.	4.81	.402	4.67	.577	0.329
My JHSC would benefit from a revised version of this tool that provided information and advice on how to address gaps we have identified.	4.29	1.146	4.57	.746	0.267

Conclusions

- The final **JHSC Assessment Tool** was an 8-page (double-sided), 21-item tool.
- Study findings revealed the tool was feasible to use during a regular JHSC meeting.
- Participants reported the tool was of value to assessing and improving JHSC functioning.

Knowledge Translation - PIP



THE DEVELOPMENT AND TESTING OF A TOOL TO ASSESS JOINT HEALTH AND SAFETY COMMITTEE FUNCTIONING & EFFECTIVENESS

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BACKGROUND

Joint Health and Safety Committees (JHSCs) are a legal requirement for most Ontario workplaces with more than 20 employees. Concern regarding the function and effectiveness of JHSCs in hospitals was raised following the SARS outbreak in 2003. A subsequent literature review revealed a lack of evidence grounded in the healthcare sector. Recent Ontario-based studies have assisted to fill this gap regarding form and functioning of JHSCs in hospitals and identified key factors that facilitate JHSC effectiveness and participant perceptions of the attributes of a "gold standard" JHSC.



OBJECTIVE

This study aimed to create and pilot test an evidence-driven assessment tool that JHSC members, employers and policy makers can use to evaluate JHSCs for the purpose of enhancing their effectiveness and better protecting workers.

METHODS

Following the *Safety Element Method*, the tool was designed as a self-assessment and feedback mechanism for JHSC members where it "diagnosed" various JHSC functions and characteristics. The tool was reviewed by experts and pilot tested in two stages by hospital JHSCs in one urban, multi-site, academic hospital.

- Stage 1**
- To refine the language and ordering of the items in the tool.
 - JHSC members were recruited to read through the tool and participate in an interview. They were asked to "think aloud" while working through the items to identify areas and language requiring revision.
 - This process was repeated with each participant until all items of the tool functioned well.
- Stage 2**
- To assess feasibility and usability of the tool.
 - JHSC members were recruited to use the tool to assess their JHSC at three different time points – first they completed it individually (pre-test), then a week later they worked through the tool as a committee during their regular meeting, and finally a week after the meeting they filled out the tool individually again (post-test).
 - The JHSC meeting was audio-recorded and observed by at least two study team members.
 - Usability surveys were conducted through web-based survey software during pre- and post-testing.

ASSESSMENT TOOL

- A 20-item, 6-page (double-sided) tool.
- Each item had a 5-point scale; each point represented a scaled state of functioning.
- JHSC members were directed to identify the state that "best represented" the current state of their committee.
- At the end of the tool, JHSC members identified their top 3 priorities for improving JHSC effectiveness.

Sample Item

JHSC Feature	10 APPROACHABILITY				
	1	2	3	4	5
<i>To JHSC member identification</i>	There is no list of committee members readily available.	A list of committee members is readily available, but is not posted publicly (e.g. either on a notice board or online).	The list of names of committee members is posted in more than one place (e.g. either on a notice board or online).	The list of names of committee members is posted in more than one location (e.g. either on a notice board or online).	The list of names of committee members is posted in more than one location (e.g. either on a notice board or online) and updated promptly.
<i>Circle the description that best reflects your JHSC.</i>					
Comments					

RESULTS

Refining the Tool

- Seven JHSC members participated in interviews.
- Revisions were made until items functioned well.

Feasibility Testing

- Forty-two members from five JHSCs were recruited.
- JHSCs completed their assessment in less than one hour ($M=40$ minutes, $Range=32-45$ minutes) and were able to come to consensus on 95% of items.
- Items most challenging to reach consensus were:
 - Availability of experts
 - Participating in critical injury/fatality investigations
 - Work refusals
- Time to reach consensus for each item varied greatly ($range = 5$ seconds to 365 seconds).
- All committees were able to agree on their top three priorities for improvement most commonly focused on education, communication and developing a strategy.

Usability Testing

- Across the twelve items included in our usability scale, the average score was >4 on a 5-point scale.
- Paired analysis of pre- and post-scores for each item revealed no significant changes (Table 1).

Table 1: Paired analysis of pre- and post-usability scores (N=21)

Item	Pre		Post	
	M	SD	M	SD
The assessment tool was easy to understand.	4.43	.928	4.24	.788
The assessment tool was an appropriate length.	4.52	1.078	4.24	.788
It would be of value for my JHSC to work through this tool.	4.78	.438	4.71	.483
The assessment tool highlighted responsibilities of JHSCs that I had previously not considered.	4.33	.793	4.52	.814
The assessment tool addressed all of the relevant issues for a gold standard JHSC.	4.33	.658	4.29	.956
I think this assessment tool could improve the way my JHSC currently operates.	4.48	.802	4.71	.561
I think this assessment tool could bring my JHSC closer to a gold standard.	4.48	.680	4.67	.483
I think this assessment tool could bring other JHSCs closer to a gold standard.	4.43	.576	4.57	.876
I think my JHSC would have little to no difficulty coming to a consensus on many of these items.	4.57	.568	4.62	.590
I think my JHSC would have little to no difficulty coming to a consensus on many of these items.	3.90	1.044	4.29	.956
If this tool highlighted limitations of my JHSC, I would be willing to work on addressing them.	4.81	.402	4.67	.577
My JHSC would benefit from a revised version of this tool that provided information and advice on how to address gaps we have identified.	4.29	1.146	4.57	.746

Effects of Using the Assessment Tool

- Table 2 shows the individual paired t-tests on items in the assessment tool that revealed significant changes from pre- to post-testing.
- These findings indicate engaging in discussion and working through the assessment as a group influenced how members viewed their JHSC in these areas.

Table 2: Descriptive statistics and significant t-test results

Item	Pre		Post		p
	M	SD	M	SD	
JHSC communicates OHS information to employees (N = 22)	3.73	1.032	3.00	1.155	.028
Time to prepare for and attend JHSC meetings and carry out committee activities (N = 22)	4.23	.922	2.88	1.167	<.001
Annual strategies (N = 19)	3.83	1.212	2.42	1.281	.007

CONCLUSIONS

- The final JHSC Assessment Tool was an 8-page (double-sided), 21-item tool.
- Study findings revealed the tool was feasible to use during a regular JHSC meeting.
- Participants reported the tool was of value to assessing and improving JHSC functioning.
- Although this study was focused on the healthcare sector, it is expected that the tool will have broad application across all workplace sectors.



JHSC Study Team

This study was generously funded by the Ontario Ministry of Labour.

Next Steps

- Publicly available on the CREOD website www.creod.on.ca
- Electronic version with resources linked & generation of JHSC-specific action plan
- Further testing
 - Healthcare
 - Education sector