29th Annual YPSW Section Conference

Critical EHS Measures—Relating to the Corner Office
Or
Speaking in the Language of the Customer

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YPSW/AIHA SECTION
21st ANNUAL CONFERENCE

Communicating with Senior Management:
Marketing, Advertising, and Sales

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SUSTAINABILITY

Jim Rock: Sustainability IN
Industrial Hygiene

Rick Fulwiler: Sustainability OF
Industrial Hygiene
OBJECTIVE TODAY

• Create dissatisfaction
• Start a paradigm shift
• Focus on a specific customer
• Describe 5 approaches to speak in their language
• Do you have a role?

Opportunity is nowhere

Opportunity is no where

Opportunity is now here
THE OPPORTUNITY

1992: $145 Billion Injuries
      $26 Billion Illnesses

TOTAL $171 Billion

at 7% profit margin additional sales required

$2.44 Trillion or
$2,440,000,000,000.00


FORTUNE MAGAZINE

"Managing safety is no easy task, but it makes bottom-line sense. There's a direct payoff in savings on a company's workers compensation insurance, whose premiums are based on the number of claims paid for job injuries. The indirect benefits are far larger, for safe plants tend to be well run in general and more productive."

The Battle for Industrial Safety by Mary Connors, 8/4/97
What's Driving H&S Today?

• OSHA and Regulations?
• Organized labor or the workers?
• Workers Compensation (WC) costs?
• Traditional values?
• ?
• ?

Looks like we are striving for mediocrity.
Who are the EHS Customers?

- The community
- The public
- The workers
- The CEO, BOD, SLM***

***SLM = Senior Line Management
or “The Corner Office”

So Our Customer Today is...

- ...the guys and gals in the “Corner Office”

Or

Senior Line Management

...and what are they focused on?
Time for Some Perspectives

- The Human Case
- The Business Case

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- Business = Enterprise
- Profit = Budget
- Metrics = Outputs
Five Approaches

1. Sales Equivalent Dollars (SE$) (Non profits hang in there)
2. Expressing H&S outputs as Business outputs
3. The cost of being average
4. H&S as a technology enabler
5. Aligning H&S with critical outputs of the enterprise

APPROACH NO. 1

Express H&S losses / savings as SALES EQUIVALENT $$ $$

Sales Equiv. $ =

\[ \frac{\text{lossed/saved}}{\text{profit margin as %}} \times 100\% \]
EXAMPLE – APPROACH NO. 1

- A $12,000 injury
- Assume 7% profit margin

\[ SE$ = \frac{$12,000 \times 100\%}{7\%} \]

\[ SE$ = \frac{$1,200,000}{7} = $171,428 \]
“Profits” – Not for Profit Institution

Cincinnati – Suspected a significant financial drain, commissioned an initiative

- Success/Measurement Criteria
  - Saving $ by reducing WC costs
  - Avoiding lost wages due to inj/ill
  - Tracking the human losses

- Results
  - $45,000,000 reduction in WC costs
  - $1,100,000 savings in lost wages
  - LWDC rate from 10 to 2, 8 less of every 100 employees injured

APPROACH NO. 2

Express H&S outputs as business outputs. Learn what the important business outputs are.

- Cost
- Production
- Quality
- Payroll costs
- Customer satisfaction
- Technology enabling
EXAMPLE – APPROACH NO. 2

Mattson Lumber Co., Rhonda Wilson

• Reduced Experience Mode Factor
• $300,000 savings
• At 7% profit margin = $4,285,700
• Express this in cents per board foot

A $500 INJURY COSTS...

• A soft drink bottler to sell over 61,000 cans
• A food packer to sell over 235,000 cans of corn
• A bakery to sell 235,000 donuts
• A paving contractor to lay 900 feet of two-lane asphalt
• A ready-mix Co. to deliver 20 truckloads of concrete

Source: OSHA
APPROACH NO. 3

The cost of being average.

- Total Incidence Rate - TIR
- Lost workday case rate - LWDCR
- Experience Mod. Factor - EMF
- Workers Comp Costs - $/$100 payroll

A Competitive Advantage or Disadvantage???

What average is (manufacturing):

- OSHA TRI R--------- 8.1
- OSHA LWDC R-------- 4.1
- WC EMF------------- 1.0

Being better than average provides a competitive advantage.
EXAMPLE – APPROACH NO. 3

- 1992, 11th floor Procter & Gamble
- $11 million
- 4 - 8X
- 6X
- $66 million
- 5.6%
- $1.1 BILLION in sales
DIRECT & INDIRECT COSTS

Direct: Medical and indemnity costs

Indirect:
  • Wages of injured & others
  • Property & product damages
  • Administrative costs


THE TOTAL COST

Direct cost--------- $1.1 B
Indirect cost @ 2X---- $2.2 B

Total cost-------- $3.3 B
**Workers Compensation (WC)**

- An increasing or decreasing cost?
- Increasing at 13.5% per year
- Health Care = 52% WC costs
- Increasing at 14.7% per year
- The Average WC cost:
  
  $12,055

  Source: National safety Council

**EXPERIENCE MODIFICATION FACTOR (EMF)**

- Purpose: Determine cost basis for WC
- TAL = total actual losses incl. reserves
- TEL = total expected losses “ “
- AF = adjustment factors
- EMF = small is good, big is bad
Formulae for: \[ \text{EMF} \] & \[ \text{SE$} \]  

\[ \text{EMF} = \frac{\text{Total Actual Losses} \times \text{AF}}{\text{Total Estimated Losses}} \]  

\[ \text{SE$} = \frac{\text{losses/savings in $} \times 100\%}{\text{profit margin in \%}} \]  

EXPERIENCE MODIFICATION FACTOR (EMF)  

<table>
<thead>
<tr>
<th>Co.</th>
<th>Manual Premium</th>
<th>EMF</th>
<th>Actual Premium</th>
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<tbody>
<tr>
<td>A</td>
<td>$500,000</td>
<td>.50</td>
<td>$250,000</td>
</tr>
<tr>
<td>B</td>
<td>$500,000</td>
<td>1.0</td>
<td>$500,000</td>
</tr>
<tr>
<td>C</td>
<td>$500,000</td>
<td>1.5</td>
<td>$750,000</td>
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</table>
### WORKERS COMPENSATION

$/$100 Payroll

<table>
<thead>
<tr>
<th>Industry</th>
<th>$/$100</th>
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<tbody>
<tr>
<td>Tree pruner</td>
<td>43.60</td>
</tr>
<tr>
<td>Oil/gas drilling</td>
<td>23.84</td>
</tr>
<tr>
<td>Auto manufacturing</td>
<td>5.40</td>
</tr>
<tr>
<td>Soap &amp; detergent man</td>
<td>3.78</td>
</tr>
<tr>
<td>P&amp;G</td>
<td>0.56</td>
</tr>
<tr>
<td>Traveling salespeople</td>
<td>0.62</td>
</tr>
</tbody>
</table>

Source: National Council of Comp. Insurance

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### APPROACH NO. 4

**H&S is a Technology Enabler**

Without H&S, hazardous business building technologies could not exist.

- Hazardous processes
- Hazardous chemicals
- Key ingredients
No. 4: Technology Enabling

- Pharmaceutical
- Foundry
- Construction
- Automobiles
- Farming
- Heavy equipment

EXAMPLE - APPROACH NO. 4

Caterpillar Tractor

- Artic and the Equator
- Sophisticated paint and welding systems
- Hazardous chemicals and processes
- H&S - a technology enabler

Needs to be marketed, advertised and sold
EXAMPLE - APPROACH NO. 4

- 1968, jolly ole England
- Detergents: Unilever = No. 1, P&G = No. 2
- New technology = enzymes
- Occupational asthma
- Labor unions: “No more enzymes”
- P&G: Enzyme hygiene capability system
- P&G = Yes, Unilever = No
- 1969: P&G = No. 1, Unilever = No. 2

APPROACH NO. 5

Align/link H&S with the critical outputs of the enterprise

- What are the strategic business objectives?
- What is really important?
- How does H&S add value?
- Consider approaches 1 - 4
No. 5: Aligning/linking H&S with critical outputs

REQUIRES:
1. Getting clear on critical outputs of your enterprise
2. Identifying the critical work for H&S
3. Creating linkages or alignment
4. Communicating those linkages
5. Executing against the linkages

SAFETY EXAMPLE – APPROACH NO. 5

Corp.: Reduce price gap between P&G and store brands (1991)
Manuf.: Keep case costs flat – 4 yrs.
Safety: Keep WC costs flat – 4 yrs.

<table>
<thead>
<tr>
<th>Yr.</th>
<th>WC$/100</th>
<th>Accum. $MM</th>
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<tbody>
<tr>
<td>91</td>
<td>.56</td>
<td>3.3</td>
</tr>
<tr>
<td>92</td>
<td>.54</td>
<td>8.2</td>
</tr>
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<td>93</td>
<td>.54</td>
<td>14.7</td>
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<tr>
<td>95</td>
<td>.44</td>
<td>31.6</td>
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IH EXAMPLE - APPROACH NO. 5

Corp.: Get product improvements to the market fast.
Soap & Det. Div.: Speedy deployment of improved enzyme technology
IH: Global enzyme hygiene capability

<table>
<thead>
<tr>
<th>Yr.</th>
<th>92</th>
<th>93</th>
<th>94</th>
</tr>
</thead>
<tbody>
<tr>
<td>% Cap.</td>
<td>62%</td>
<td>84%</td>
<td>97%</td>
</tr>
<tr>
<td>No. Cap.</td>
<td>20/32</td>
<td>27/32</td>
<td>31/32</td>
</tr>
</tbody>
</table>

**S**afety pays! If this is true, how can we afford to fix our current view on occupational health and safety in a cost-effective manner? How can we bring new thinking to this important but often neglected area? The answer is that health and safety professionals have done a better job of improving health and safety but not yet. As the ratio of deaths and injured to people-speedy deployment of improved enzyme technology — I have reviewed the current view on occupational health and safety and found that the IH (Institute of Hygiene) has done a good job of improving health and safety but not yet.

IH: Global enzyme hygiene capability

Yr. 92 93 94
% Cap. 62% 84% 97%
No. Cap. 20/32 27/32 31/32
LET'S RECAP

• Start a paradigm shift
• Focus on a specific customer
• Describe 5 approaches to speak in their language
• Put the Human Case and Business Case in perspective
• Do you have a role?

Businesscase4.pt.ptt