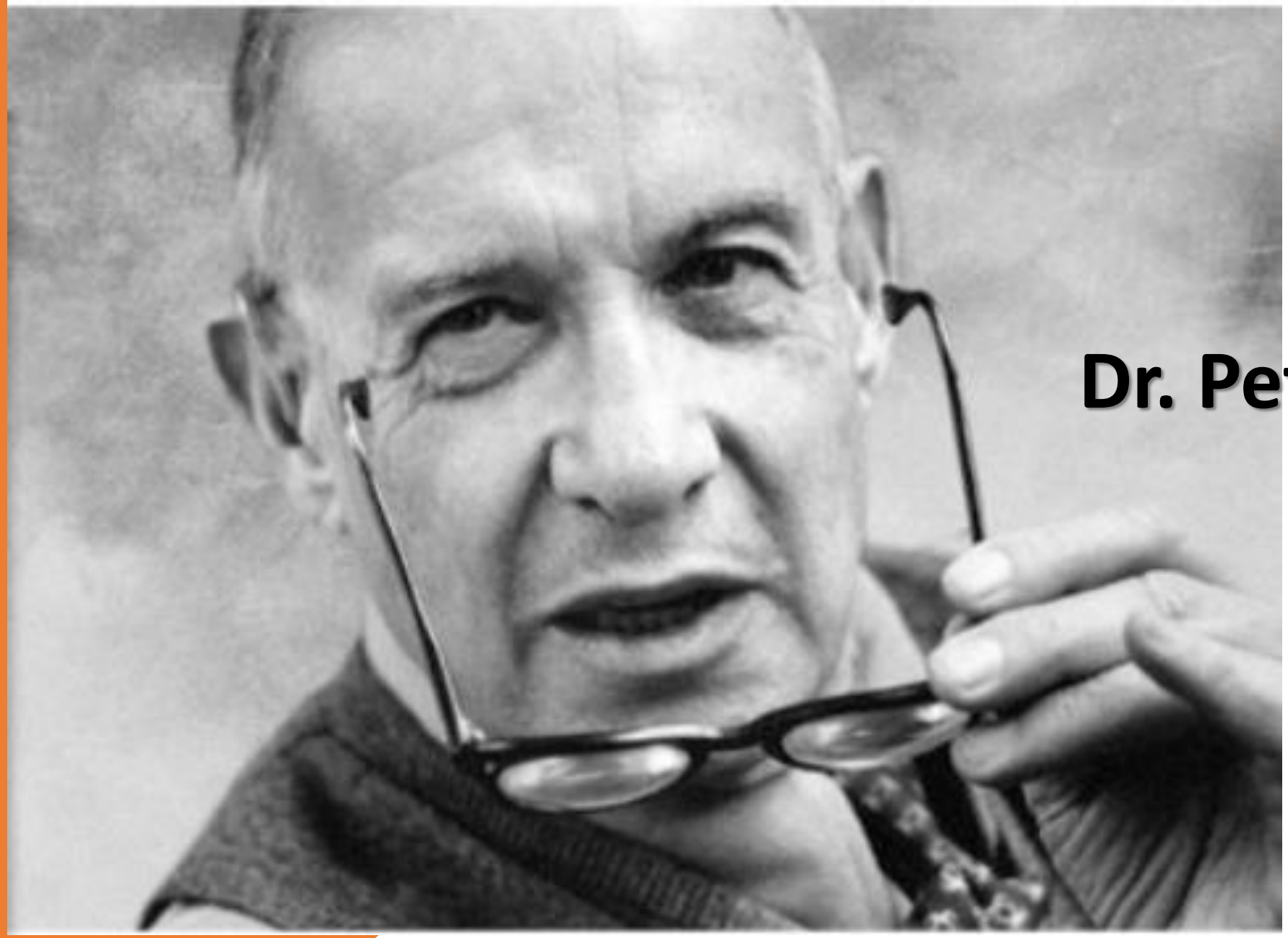
The Happiness Factor;
Happy Employees are Safer Employees



“Culture eats strategy for breakfast”

Dr. Peter F. Drucker

I would expand his words to include, **“Especially when it comes to Safety!”**

8:00 – 9:00

Patrick Terrance Ragan

The Happiness Factor; Happy Employees are Safer Employees

Cultures are foundations on which good and poor safety experiences are built. This presentation is a discussion of the impact of culture in general and on safety specifically. With a focus on how to benefit from positive (happy) culture and improve on all cultures. Based on September 2019 PSJ paper of the same title.

Speaker Patrick Terrance Ragan

Patrick T. Ragan, CSP, M.B.A., has more than 40 years' experience in quality, health, safety and environment positions. He is the current executive member at Ragan Safety Services, LLC. Previously, he served as Vice President of Quality, Health, Safety and Environment at Bayer. Ragan has coauthored and contributed to eight books and numerous published articles. He is a professional member of ASSP and currently President of the North Carolina Chapter.

2020 Region VI PDC schedule

My Virtual Presentation

- A PDF file of the ASSP September 2019 Professional Safety Journal article is included with the attachments to this presentation
- My good friend and coauthor of the PSJ article Brooks Carder has helped in this presentation with the addition of ideas from similar papers he has written. All attached
  - The Happiness Effect; New evidence suggests employees' emotions are directly correlated to their performance
  - A Positive Approach; Ditch the old methods of change management and give positive psychology a try
  - A Lesson From George Washington

THE HAPPINESS FACTOR

Happy Employees Are Safer Employees

By Patrick T. Ragan and Brooks Carder

Key Takeaways

- **The happiness factor is real, and it really works.**
- **Cognitive / Positive psychology has supplanted behaviorism as the dominant field in scientific psychology.**
- **Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.**

Key Takeaways

- **The happiness factor is real, and it really works.**
- **Cognitive / Positive psychology has supplanted behaviorism as the dominant field in scientific psychology.**
- **Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.**

The happiness factor is real, and it really works.

It is not a new idea

One inherits a right to enjoy their work. Good management helps to nurture and preserve these positive, innate, attributes of people.

- W. Edwards Deming

The happiness factor is real, and it really works.

It is not a new idea

A Captain cannot be too careful of the company the state has committed to his charge. He must pay the greatest attention to the health of his men, …….. His first object should be, to gain the love of his men, by treating them with every possible kindness and humanity……. The attachment that arises from this kind of attention ……..is almost inconceivable; it will moreover be the means of preserving the lives of many valuable men.

Baron Friedrich von Steuben

von Steuben recognized that officers had to command and not simply demand the respect and obedience of their troops.

endorsed by Congress on March 29, 1779

Written at the behest of George Washington

The happiness factor is real, and it really works.

In both Deming and von Steuben's cases their theories have strong anecdotal support.

Deming brought Japan's industry back from the devastation of war.

Von Streuben was arguably a key contributor to the creation of a new nation.

Deming also said, "In God we trust, all others bring data" More on that later.

The happiness factor is real, and it really works.

If people are happier at their work do they make better decisions?

Do these better decisions translate to fewer accidents?

The happiness factor is real, and it really works.

Happy employees who are satisfied with their jobs are;

- more engaged,
- more creative,
- more likely to do superior work,
- are less likely to leave the organization,
- are more likely to follow rules/procedures
- more likely to encourage others to follow rules/procedures
- are more willing to speak up when they feel something is not right or safe

The happiness factor is real, and it really works.

Example of Happiness (positive feelings) impact on decision making; possible mechanism by which happiness improves performance;

Remote Association Test: RAT

A fundamental test of creativity

The happiness factor is real, and it really works.

To take the test you are presented with three words and asked to come up with a fourth word that is associated with all three. For example;

Cottage, Swiss, Cake.

This is an easy one. You probably came up with **cheese** rather quickly.

The happiness factor is real, and it really works.

Try a harder one,

- Dive, Light, Rocket.
- Only about 20% of subjects came up with the correct answer in 15 seconds.
- The answer is **sky**.

The happiness factor is real, and it really works.

Here comes the interesting part:

- Subjects appear to know there is a match before they know what it is.
- When asked to respond within two seconds they were 12% better than chance at predicting whether there is a solution or not.
- This is intuition in action.

There is more

The happiness factor is real, and it really works.

In an altered test, before competing an intuition index subjects were made either happy or sad by being asked to think about happy events in their life or sad ones.

Happy subjects more than doubled their intuition index, while sad subjects totally lost the ability to intuit in this test.

POSITIVE, NEGATIVE & NEUTRAL SUBJECTS

	Correctly identified coherence	Incorrectly identified coherence	Probability
Positive mood	62%	31%	0.05
Neutral	61%	48%	Not significant
Negative mood	53%	50%	0.001

The happiness factor is real, and it really works.

Intuition is important to creativity and likely important to safety as well.

How many incidents have you investigated where a person involved conveyed, they felt something was wrong they just didn’t stop to figure out what.

The happiness factor is real, and it really works.

Teach people to listen to that little voice that tells them

- that motor sounds a little off, Ins
- the color of the effluent is a little darker, WV
- an unusual demeanor of a coworker, Chi
- their own mood is off Port

The happiness factor is real, and it really works.

U.S. Army 2008 Example:

Problems observed in many soldiers after deployment—suicide, drug abuse, post-traumatic stress disorder (PTSD), panic, depression and divorce

Applying positive psychology Seligman recomended that resilience training could insulate more soldiers from the negative effect. Basically, a form of optimism (Happiness) training that teaches cognitive coping mechanisms.

The happiness factor is real, and it really works.

U.S. Army Example:

The eventual effect on deployed troops has been profound.

- For soldiers who received the resilience training before deployment, the subsequent diagnosis rates of PTSD, anxiety and depression were reduced, and the rate of substance abuse was halved.

Master-level resilience training has been given to more than 40,000 trainers in the Army.

The happiness factor is real, and it really works.

Straight up safety example from Pat Ragan and Brooks Carder;

- Since 1993 over 100,000 employees surveyed in a variety of companies.
- The surveys are highly reliable, and all of the questions are valid, meaning they correlate with safety performance.
- Some of the questions on our survey have no explicit relationship to safety but an obvious relationship to employee morale.

The happiness factor is real, and it really works.

Straight up safety example;

- Following are 3 example questions from our initial validation study
- These and other similar questions are strong influencers on the culture of these sites and the company
- The questions speak to respect, trust and confidence in the company. All strong elements in employee satisfaction/happiness in the workplace

The happiness factor is real, and it really works.

Straight up safety example;

VALIDATION STUDY DATA: WEAK VS. STRONG SITES

Job satisfaction factor	Strong sites % yes	Weak sites % yes	*p* value Yates corrected chi-square
Supervisors treat subordinates with respect	93%	83%	0.030
Managers treat subordinates with respect	91%	76%	0.002
Employees trust the information that management provides about the company	95%	66%	0.000

The happiness factor is real, and it really works.

Not Convinced?

Ask yourself if you have ever been involved with a group that **"Clicked"** in a way that they just got things done?

- Sports
- Task team
- Volunteer effort
- Student Study group
- Professional group
- Church group

Going to playoffs. 1972

It works on an individual basis too.

- Fixed a faucet
- Read a story to your kids
- Finish a 20 mile bike ride

How did it feel.

That is it! Happiness Factor

Key Takeaways

- **The happiness factor is real, and it really works.**
- **Cognitive / Positive psychology has supplanted behaviorism as the dominant field in scientific psychology.**
- **Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.**

Cognitive / Positive psychology has supplanted **behaviorism** as the dominant field in scientific psychology.

Behaviorism

- Skinner Pegion Training

Dinner Conversation

People and our social systems | culture are more complex than Pigeons and Rats.

Cognitive/ Positive psychology has supplanted behaviorism as the dominant field in scientific psychology.

"While behaviorism has been largely abandoned in psychology, it continues to be the basis of much strategy in business.

Individuals and groups are still viewed as machines that can be adjusted simply by changing contingencies. Reward them for this and they will do that."

Brooks Carder, PhD

Principal Carder and Associates LLC

Cognitive/ Positive psychology has supplanted behaviorism as the dominant field in scientific psychology

Because it needs to be said;

- One of the failings of BBS was that some companies felt they could do behavior based safety and ease off on traditional safety efforts.
- If it works at all it only works for a short time
- much of the success BBS has had is more related to the Hawthorne effect than behavioral science.
- It has a real weakness in dealing with High Consequence Low Frequency events

Cognitive/ Positive psychology has become dominant field in scientific psychology.

positive psychology, very simply the study of psychological wellness, rather than illness.

Lawrence M. Miller

Cognitive / positive psychology has become dominant field in scientific psychology.

"positive psychology explores ways to help people flourish rather than simply function.

This view provides rich possibilities for executives who want to improve organization performance by encouraging, promoting, and expanding human potential.

Applying positive psychology can have a direct effect on employee and customer engagement and loyalty—and thus the bottom line."

and Safety

Donald O. Clifton, Ph.D. Martin Seligman, Ph.D., and Mihaly Csikszentmihalyi, Ph.D.,

Key Takeaways

- **The happiness factor is real, and it really works.**
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Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

Because it needs to be said;

The Happiness Factor can help all organizations, but Trust is a hard thing to build if employees see;

- maintenance slipping,
- relaxing skill needs safety training,
- hazards going uncorrected,
- overtime being piled on in excess,
- people are being reprimanded for reporting safety issues or
- other base line safety needs not being taken care of.

Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

- Paying attention to the happiness is not just reacting to noticing a negative.
- It is proactively an important step to take you to a higher level of safety performance.
- Improving happiness is important to achieve a culture in which people want to
  - use safeguards,
  - follow training,
  - understand and maintain process design.

Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

- A culture in which PPE is worn and rules followed because people believe it is the right thing to do, not just to satisfy their boss.
- A belief-based safety culture is much More reliable and better than a rule-based safety culture.
- A belief-based culture is one that promotes, caring about coworkers, respect roles and value up, down and across the organization.

Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

- People are Happier when they believe the culture, they are in, aligns with their values and they are valued members of that culture
- **Belief Based** cultures can not be turned of and on
  - Dupont neighbor
  - Dow friend
  - Grocery store ladder

Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

“In God we trust, all others bring d

Do you remember who said that?

Now it is time to talk about data.

- **You have to keep OSHA Records.**
- **Unless you have about 1,000,000 exposure hours per year, look at them but don’t believe they are an indication of your safety performance.**

Riding with the president to Jacksonville

Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

Now it is time to talk about good data.

- **Teach people to be their brother and sister's keepers don't count "I Got Ya"cards**
- **Do observations to help be sure you are doing things right not to win an umbrella.**
- **If a life critical rule is violated or serious near miss occurs, treat them as if the accident occurred and act to correct the system that allowed/caused it to happen.**

Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

Now it is time to talk about good data.

- **Hold everyone to the same standard. A supervisor going into a PPE required area needs to follow the same rules as others.**
- **Recognize people for doing things right. Thank them for wearing their safety belt if it is 20 feet up in a structure on the one in their car as they leave the site.**
- **Use practical devices.**
  - **Rob Fisher of FIT came up with a Simply Brilliant way to get JSAs done. In stead of filling files with JSAs that may not be used for months or years, start each day with a "Most Hazardous Task of the Day" meeting or tailgate. It builds the file, assures the information is fresh and reviews it in depth with the people that will be doing it that day. <u>A Happy culture cultivates innovation such as this simple effective tool</u>.**
- **You get the message**

Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

- **How do you know if things are getting better?**
- **Measure it!**
- **What is it you want to get better? Your Culture Happiness Factor.**
- **How do you measure that?**
- **Ask the people that make up the culture what they think. They are the ones that are happy, lethargic or angry in that culture.**

Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

Remember this table?

VALIDATION STUDY DATA: WEAK VS. STRONG SITES

Real Sites
Real Data
Real Proof

Job satisfaction factor	Strong sites % yes	Weak sites % yes	[illegible] co[illegible] squ[illegible]
Supervisors treat subordinates with respect	93%	83%	0.030
Managers treat subordinates with respect	91%	76%	0.002
Employees trust the information that management provides about the company	95%	66%	0.000

Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

Good Data + Good Science = Good Results

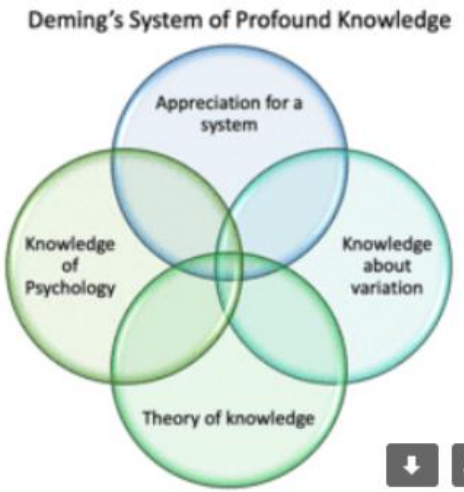
- The best Culture measurement tool is a well designed, developed and tested survey
- The design of the survey tool should incorporate
  - Cognitive Psychology
  - Quality Concepts
  - Statistics
  - Systems theory

Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

Good Data + Good Science = Good Results

Systems Theory is about *the system of profound knowledge is made up of four components through which the world is looked at simultaneously. These components function as lenses through which we see, and all four are related to each other:*

1. Appreciation for a system,
2. Knowledge about variation,
3. Theory of knowledge, and
4. Knowledge of psychology



Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

Good Data + Good Science = Good Results

- The development of the survey should rely heavily on
  - The Plan, Do, Study, Act Cycle. PDSA is central to good safety and quality continuous improvement processes.
  - Systems theory and application, recognizing the complexities of the systems being measured

Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

Good Data + Good Science = Good Results

Every question on the survey needs to be

- Tested for reliability, validity, intra-tool relationships and quality of differentiation
- Written by experienced survey question authors
- Receive frequent statistically validation

Good Data + Good Science = Good Results

Good Example

Large Site Maintenance Goup

Employee well-being happ mea use dire su co improve safety ef

Factor Scores by
Clustered Employee Grou

Question #	Factor / Category	Question
60	6	Is information that is nee
5	4	Are environmental
21	6	Does the com

Question #	Factor / Category	Question	Hourly	Salaried	Gap New	Gap Last	Gap change from New to Last
26	3	Employees trust the information that management provides about the company.	71%	93%	21%	7%	-14%
46	6	Do operators and engineers communicate effectively?	67%	86%	18%	13%	-6%
28	3	Managers treat subordinates with respect.	80%	97%	17%	9%	-8%
77	3	Supervisors treat subordinates with respect.	84%	98%	14%	5%	-9%
3	6b	I am not required to attend training sessions when I am fatigued at the end of a shift.	41%	52%	10%		

Question #	
41	
51	

	2016 Surveys
... concerns?	70%
...the company's safety	50%

Employee well-being and happiness can be measured and used to provide direction and support continuous improvement of safety efforts.

Good Data + Good Science = Good Results

High level description of the process

- Develop a good survey.
- Administer the survey. Preferably to all employees. 78 Q survey took less than 15 minutes to complete.
- Report the raw results to management and all employees that took the survey.
- Define a cross sectional Focus Group
- Analyze the data
- Propose actions back to management.
- ACT….
- Repeat …. 2 to 3 year cycles. We did the survey every year for 12 years.

In Session Culture Survey

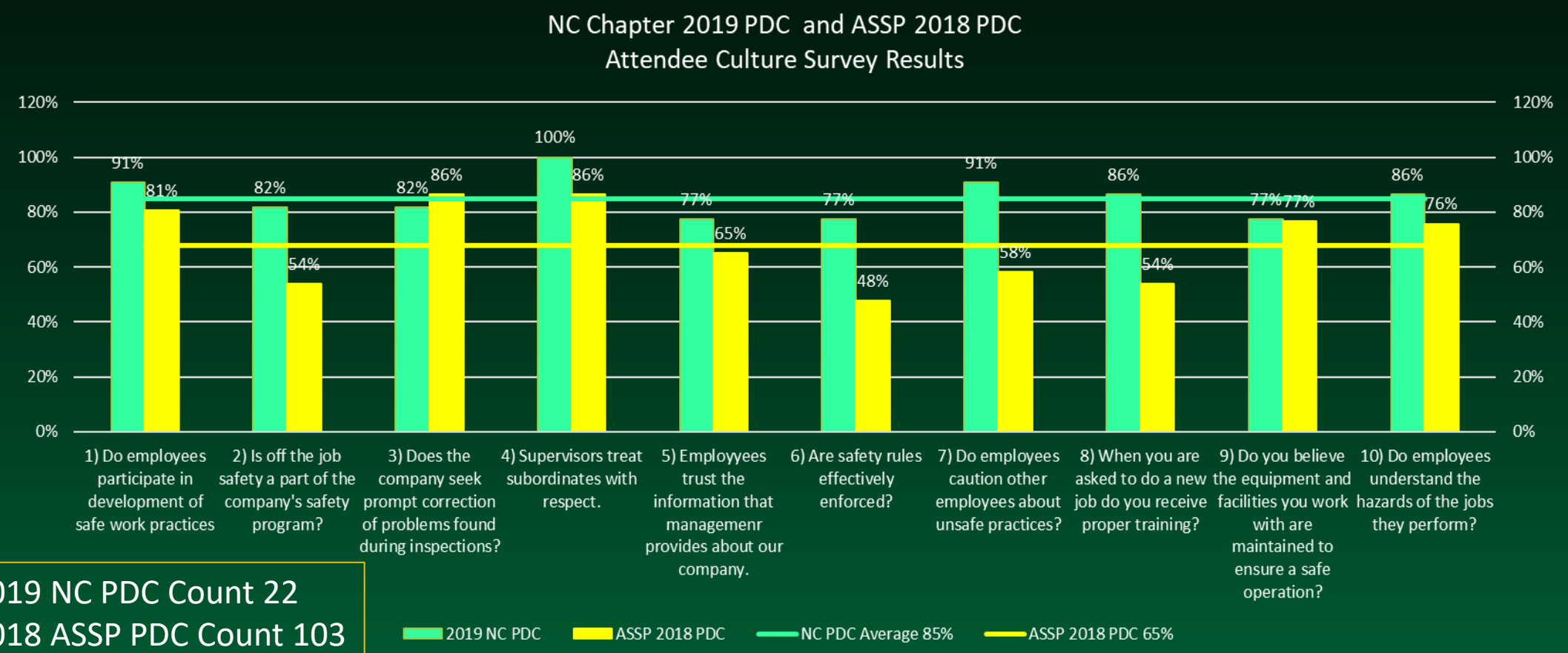
10 Question Survey

- The 10 Question Survey sample is made up of 10 of the most illustrative questions in the larger survey.
- It was designed as a gross measure to easily monitor macro system directions.
- While we believe it is illustrative of current culture it is very limited in ability to deep dive in the data.
- In this context it is for illustrative purposes only

Comparing 2019 NC Chapter PDC Survey to 2018 ASSP PDC

- The sample 10 Question Survey was completed at the 2018 ASSP PDC in San Antonio when Dr. Carder and I presented a very similar session.
- The survey respondent count at the 2018 survey was 103. For the NC 2019 session it was 22.
- To understand what these differences mean would require further evaluation.
- Assumptions should not be drawn from this example exercise.

2019 NC Chapter PDC and 2018 ASSP PDC Culture Survey Results



2019 NC PDC Count 22
2018 ASSP PDC Count 103

Comparing 2019 National and NC Chapter PDC
Culture Survey Results

Questions	2019 NC PDC	ASSP 2018 PDC	National - NC Chapter Gap
7) Do employees caution other employees about unsafe practices?	91%	58%	-33%
8) When you are asked to do a new job do you receive proper training?	86%	54%	-32%
6) Are safety rules effectively enforced?	77%	48%	-30%
2) Is off the job safety a part of the company's safety program?	82%	54%	-28%
4) Supervisors treat subordinates with respect.	100%	86%	-14%
5) Employees trust the information that management provides about our company.	77%	65%	-12%
10) Do employees understand the hazards of the jobs they perform?	86%	76%	-11%
1) Do employees participate in development of safe work practices	91%	81%	-10%
9) Do you believe the equipment and facilities you work with are maintained to ensure a safe operation?	77%	77%	-1%
3) Does the company seek prompt correction of problems found during inspections?	82%	86%	5%

It was obvious during the presentations that the NC group was more positive, happy, than the National group.

We don’t know why but the feel was obvious.

Question Results – Generally Speaking

Questions	2019 NC PDC
4) Supervisors treat subordinates with respect.	100%
7) Do employees caution other employees about unsafe practices?	91%
1) Do employees participate in development of safe work practices	91%
8) When you are asked to do a new job do you receive proper training?	86%
10) Do employees understand the hazards of the jobs they perform?	86%
2) Is off the job safety a part of the company's safety program?	82%
3) Does the company seek prompt correction of problems found during inspections?	82%
6) Are safety rules effectively enforced?	77%
5) Employyees trust the information that managemenr provides about our company.	77%
9) Do you believe the equipment and facilities you work with are maintained to ensure a safe operation?	77%

- Generally speaking
  - 90% or more is very good
  - 80% to 89% opportunity to improve
  - 70% to 79% should be considered for action

Culture Effect

- Individuals may stray from the culture of their group, but the culture or peer pressure will steer them back and influence most of their decisions.

- Culture is more about what to expect from a group than individuals. However, the expectations of the group have significant influence on the decisions and actions of individuals.

Important Points to Consider and Why A Good Survey Helps

***A Company's Culture Matters*:**

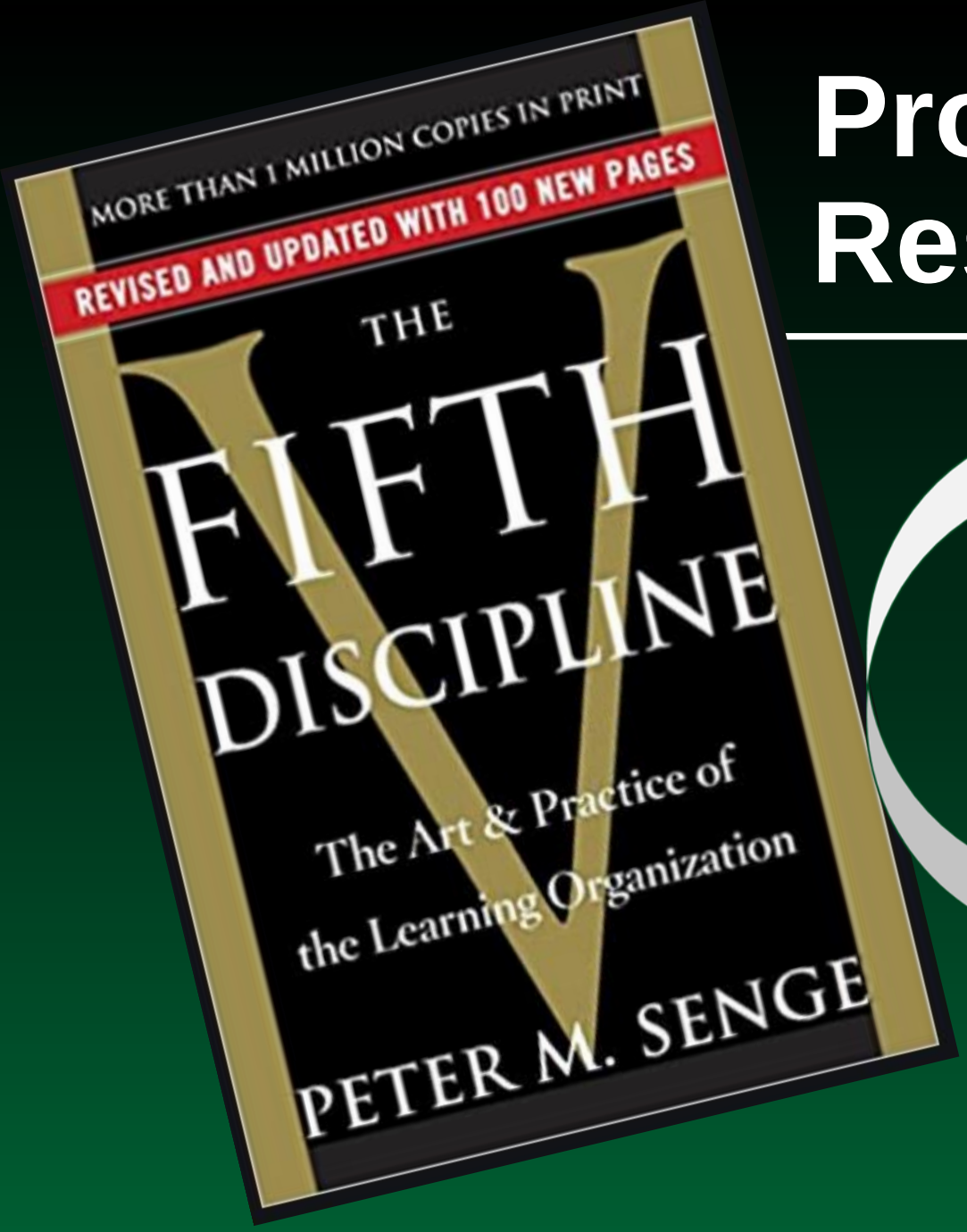
- Individuals act the way they believe their company wants them to act
- A good survey gives honest and open feedback on what employees believe they are being told
- This honest feedback and a good Focus Team effort is the most efficient and effective way impact the culture in a positive way, cultivating a Happier employee group

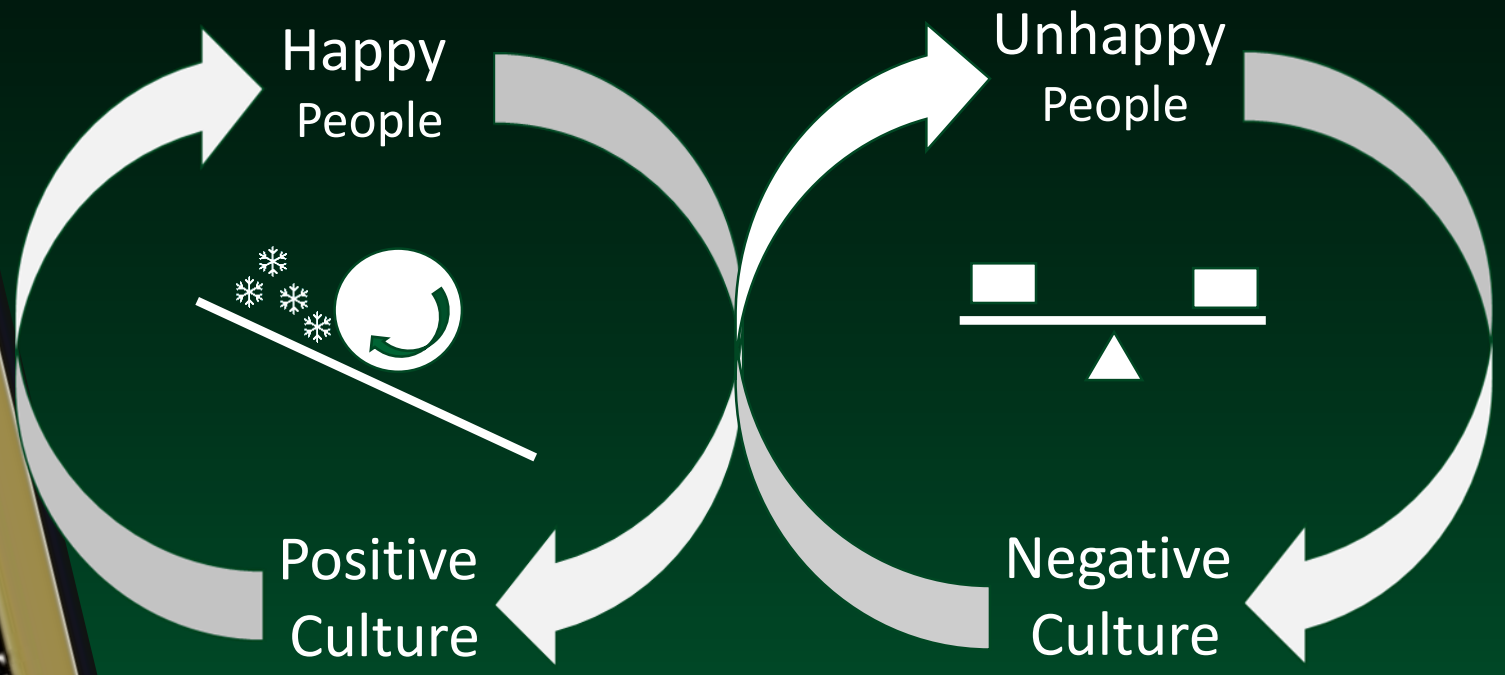
Important Points to Consider and Why this Survey Helps

***Company Culture Matters*:**

- A good survey allows action before the failure, it is not waiting for failure trends
- By improving the “Safety Culture” you are not only preventing injuries and incidents, but taking actions that will help prevent Low Frequency / High Consequence events and improve company culture overall
- A strong, safe, risk averse, willing to stop and take the time to evaluate changes, culture is the best leverage you have against these major incidents

Progression vs Resistance





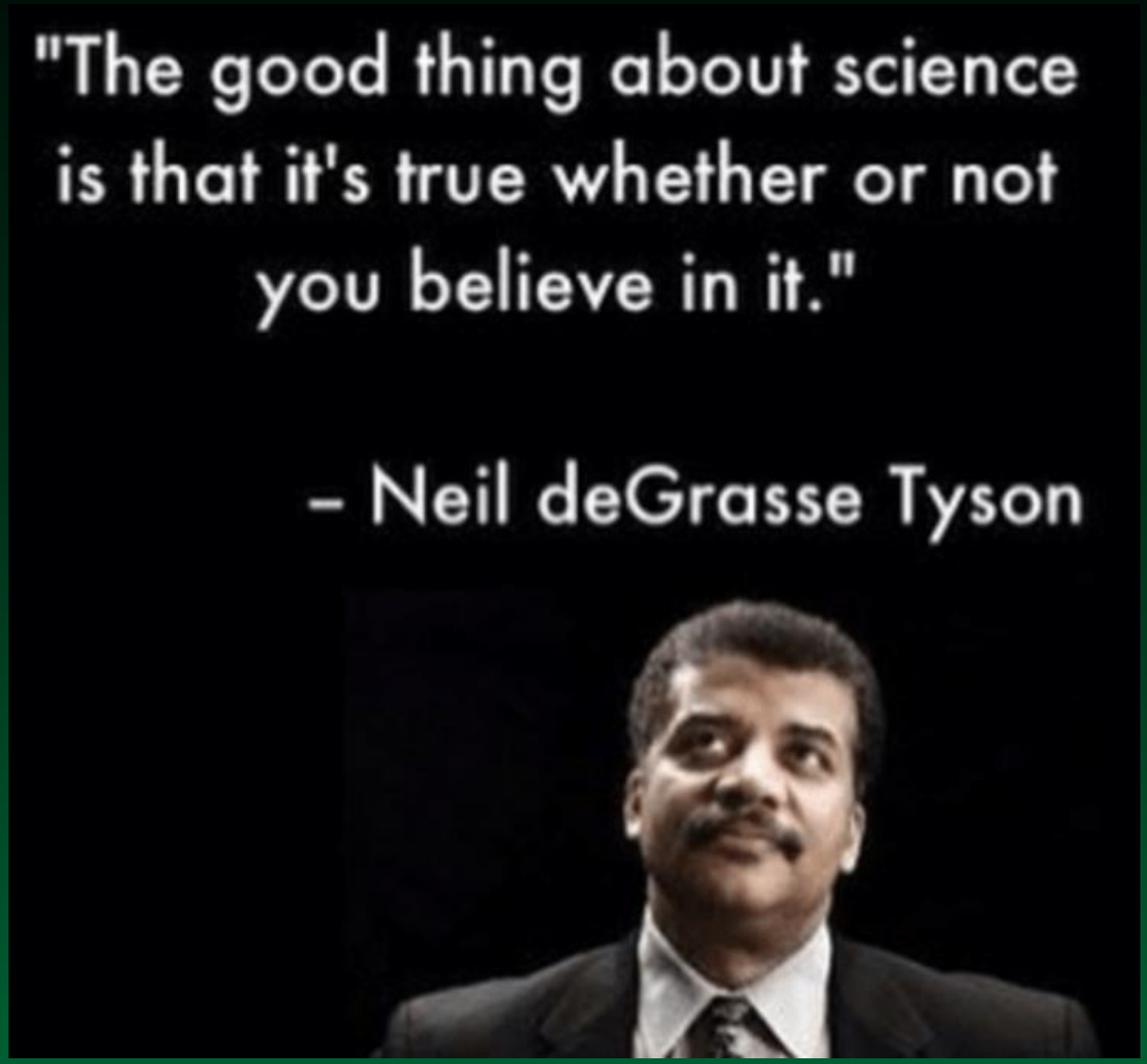
Q&A

NEW GENERATION SAFETY

Using best science to help others build systems and cultures that prevent injuries, illnesses, and low probability high consequence events.

http://newgenerationsafety.com/

Thought for the Day



Thank you for your participation and choosing to prevent accidents as a career

Please Complete Session Evaluation