



PtDTM

Prevention through Design

*Presenter: Steve Gauthier
General Electric – IUE/CWA
Lynn, Massachusetts*



Current Myths, adoption of PtD



- Myths
 - ✓ Cost/benefit ratio unfavorable
 - ✓ Limited benefits in production
 - ✓ Operational scheduling disruption
 - ✓ Tooling cost increases
- ✓ **OSHA recordables**
 - ✓ Loss time
 - ✓ Days Away from Work
 - ✓ Litigation legal

Indirect cost



1. Time lost from work by injured employee.
2. Loss of Efficiency due to break-up of crew.
3. Training cost for new/replacement workers
4. Damage to tools and equipment.
5. Time damaged equipment is out of
6. Loss of production for remainder of the day.
7. Damage from : fire, water, chemical, explosives, etc.
8. Failure to fill orders/meet deadlines.
9. Overhead cost while work was disrupted.
10. Other miscellaneous cost (100 other items of cost may appear one or more times with every accident)

Unknown cost: Human Tragedy, Morale and Reputation

Organizational Safety Culture



- Culture defines what's possible
 - Reality (what is perceived)
 - Important (what is of Value)
 - Possible (Freedom of choice)
- Creating an
- Achievement oriented
- Relation based
- Endeavour

Employee Involvement



- Worker non-participation is the “lost opportunity” for Occupational Health & Safety programs.
- Are on site all day, every day
- Know the process and problem of normal operations
- Ideas about solutions
- Can verify whether fixes actually work

Defining Rolls



Within PtD Training:

- Defining expectations and responsibility's
- Communicate to workers about PtD and how it relates to them.
- Create Worker Owned Structure
 - Most wise to have Management /Worker co-chairs within the working group.
 - Employee auditors
 - Verifying and evaluating hazard corrections
 - Perform safety audits
 - Conduct peer training with co-workers

Worker Participation Value



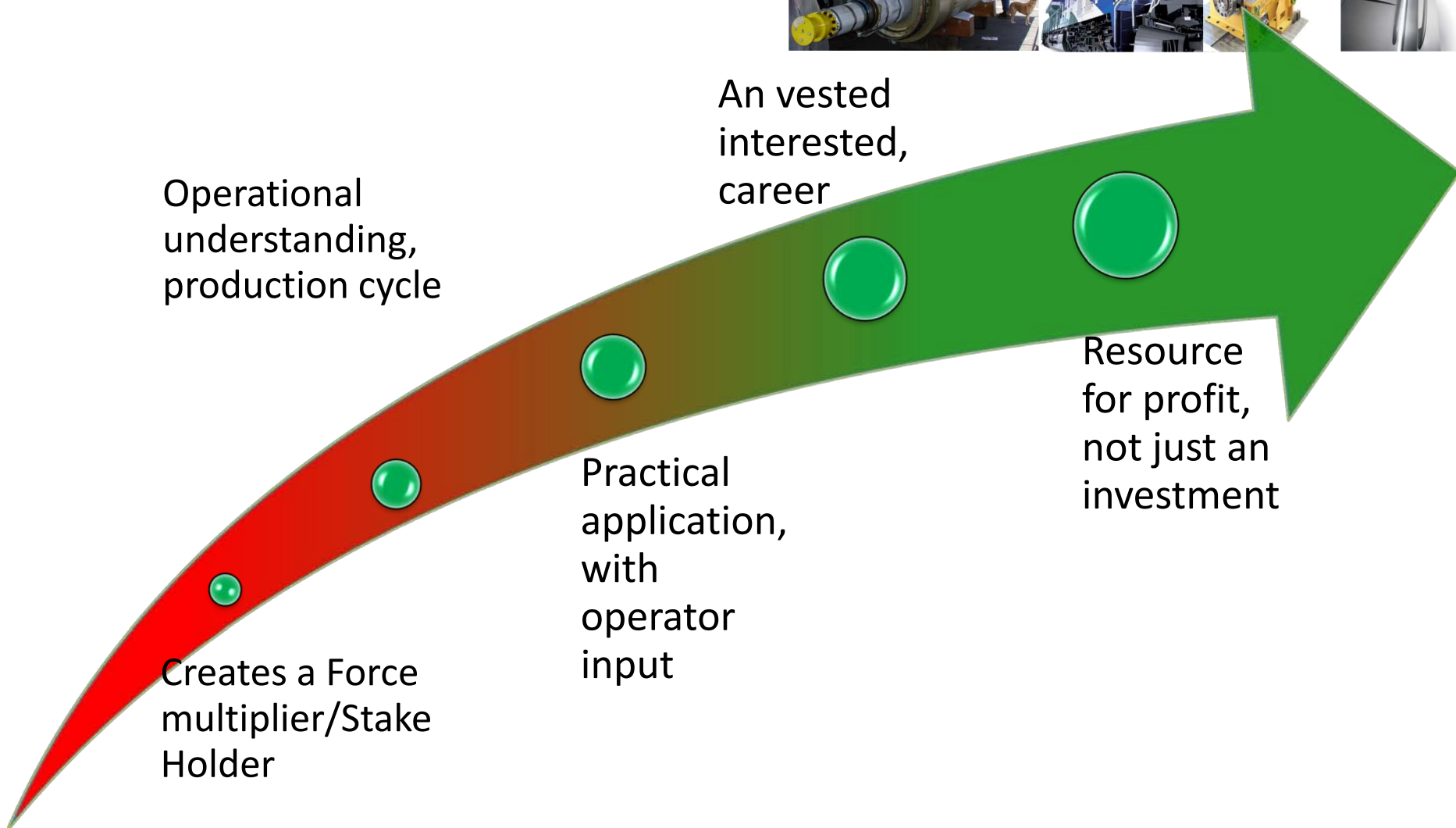
Operational understanding, production cycle

An vested interested, career

Resource for profit, not just an investment

Creates a Force multiplier/Stake Holder

Practical application, with operator input



Corporate Benefits



Community relations

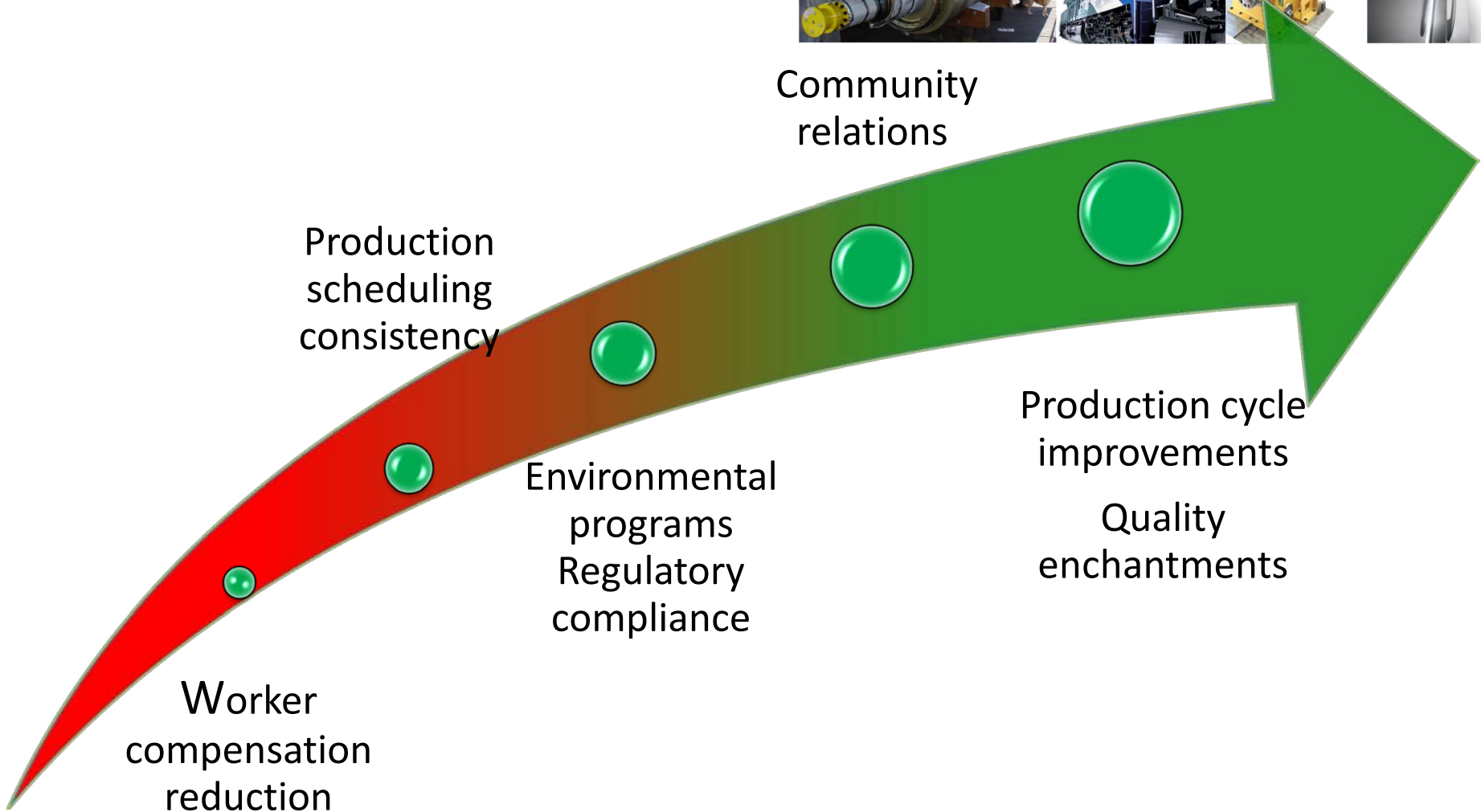
Production scheduling consistency

Production cycle improvements

Environmental programs
Regulatory compliance

Quality enchantments

Worker compensation reduction



Defining PtD Benefits

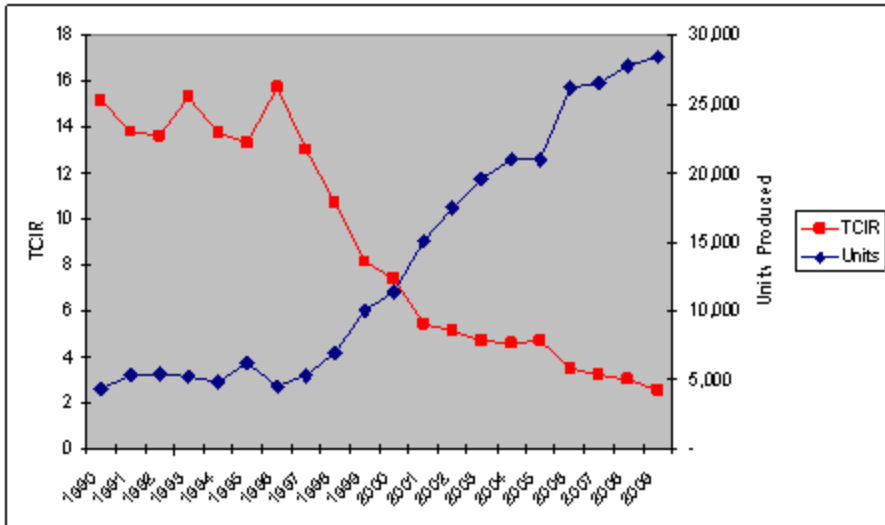


- Sustainability
 - Structured guidance
 - Over the entire life cycle
 - Continuous improvement
 - Adopt as part of lean.
- Company gains a competitive advantage over there competitors.
 - Production changes ($<$ cycle time)
 - New tooling ($>$ production)
 - Efficiency ($>$ total process improvement)

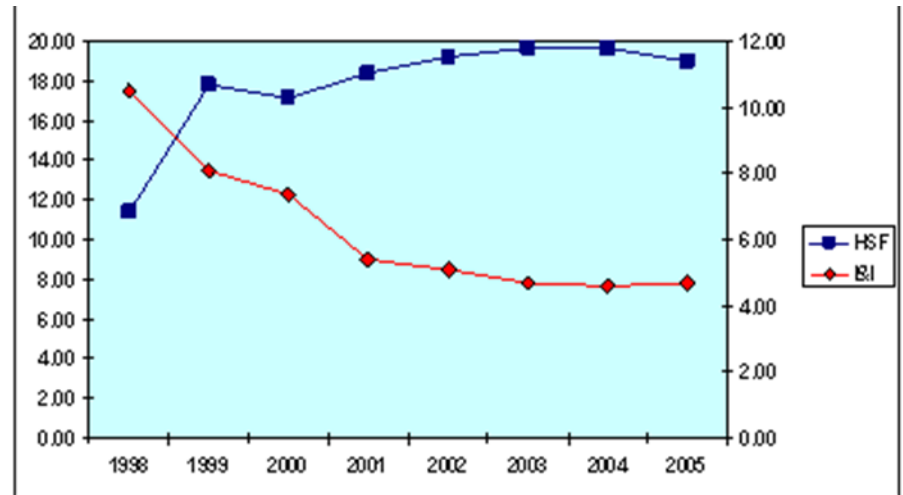
Correlation of Improvement



Production Vs. Recordable Injuries



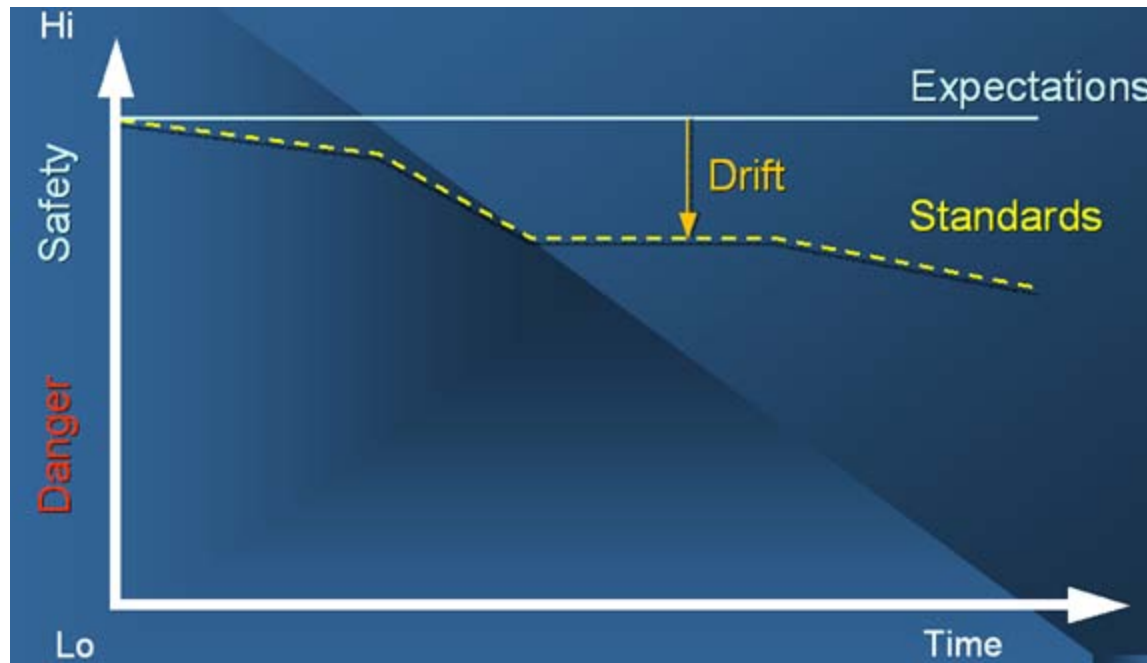
Program implementation Vs. Injury Reduction



Leading and Lagging Indicators

So why should we change our focus ?

The causes of tomorrow's events exist today !



Expectation is what you want,
Standard is what you accept to get the job done

A focus on Leading Indicators will directly impact the drift !

What's Next



- Barriers
 - Equipment Suppliers buy in
 - Include EH&S performance expectations In the procurement, purchase orders and contracts.

- Outreach

- Trade schools
- Unions

“If you always do what you’ve always done, You’ll always get what you’ve always got”

Anthony Robbins

- Universities / University of New Hampshire (UNH)
- Company new hire orientation training
- VPPPA Regional National conferences / Region 1 2011

- OSHA

- Adopting as a performance standard in 2014