JUST CULTURE:

An Algorithm for Accountability

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Human Errors

• Slips - an unplanned action
• Lapses - not completing a planned action
• Mistakes - doing an action incorrectly
  - applying knowledge incorrectly
• Violations - not following procedures or rules
Human Errors Arise From ....

- Attention
- Memory
- Perception
- Habits
- Experience
- Knowledge
- Fatigue
- Stress

They also arise from - Risk Taking and Reckless Behaviour
Medical Preventable Death

Calgary, February 2004:

The substitution of potassium for sodium chloride resulted in the unexpected deaths of two ICU patients undergoing continuous renal replacement therapy.
Simply read the label ...?
Hand Hygiene

HQSC report 90% (2016) compliance with the guidelines for hand hygiene

What is it that is causing a 10% non-compliance with the desire to prevent patient harm through the simple act of practicing hand hygiene?

Surely evidence-based medical practice confirms that hand-hygiene is a quick and easy way to get a good Return-on-Investment for reducing potential patient harm?

Is this At Risk or Reckless Behaviour?
How do we find out what is happening?

Event Occurs

Self-Reporting

 Improvement Process

Learning

Analysis
Actus Rea and Mens Rea

- The concepts of the *Evil Hand* and the *Evil Mind* form the centrepiece of criminal law = the intent to cause harm
- 20\textsuperscript{th} Century trend to holding individuals responsible for “harm” without intent or “evil-mind” = human error
- Evolution in the law arose from the Industrial Revolution = powerful and complex machines (including cars) can cause tremendous harm
- Criminal negligence became the norm = blurring the lines between *intentional* risky choices and *inadvertent* and predictable human fallibility
- Human error and at-risk behaviours preclude evil intent

Marx: *Whack-a-Mole*
Responses to Bad Things Happening

**Blame & Shame**

Blaming individuals is a common response to accidental harm in all sectors of society and its pervasiveness impedes the management of iatrogenic harm.

Runciman, Merry, & Walton: *Safety and Ethics in Healthcare*

The single greatest impediment to error prevention in the medical industry is “that we punish people for making mistakes.”

Marx: *Patient safety and the Just Culture*
“No harm no foul” thinking
The Systemic Model of Error

• Errors are a fact of life and sometimes cause adverse events
• People at the sharp-end are more likely to inherit an error than be the instigator
• Adverse events have multiple causal factors

Reason: *Errore Umano*
“Swiss Cheese”

Or:
Latent Factors and Active Errors
A Spectrum For Reasons For Failure

Preventable Failures in Predictable Operations
- Deviance
- Inattention
- Lack of Ability

Unavoidable Failures in Complex Systems
- Inadequate Process
- Task Challenge
- Process Complexity

Intelligent Failures at the Frontier
- Uncertainty
- Hypothesis Testing
- Exploratory Testing

Edmondson: *Strategies For Learning From Failure*
Human behaviours we can expect

- Human Error: Slips, Lapses, Mistakes
  - At-Risk Behaviour: Increasing risk
  - Reckless Behaviour: Conscious disregard
Takeoff Decision
Takeoff Decision

- Error? *Slip, Lapse, Mistake*
- At-Risk Behaviour?
- Reckless Behaviour?

*We need the person involved to explain their actions, thoughts and intentions*
Interlocking elements

Learning Culture

Reporting Culture

Just Culture

Reason: Errore Umano
What do we mean by Just Culture?

A Just Culture:

• Recognises that individuals should not be held accountable for system failings over which they have no control

• Recognises that many errors represent predictable interactions between human operators and the systems in which they work, and that competent professionals make mistakes

• Acknowledges that even competent professionals will develop unhealthy norms (shortcuts, routine rule violations)
Just Culture Definition:

“A system of Natural justice that reflects what we now know of socio-technical system design, free will, and our inescapable human fallibility.”
It’s about a **Proactive** Learning Culture

Seeing events as opportunities to improve our understanding of risk

*(System risk and behavioural risk)*
Core Beliefs

• To err is human
• To drift is human
• Risk is everywhere
• We must manage in support of our values
• We are all accountable

DRIFT….?
Drift

Developing unhealthy ‘norms’

- Creates a bigger risk than errors themselves
- Often tacit approval of certain at-risk behaviours by other staff and managers
- Dopamine reinforcer for successful “short cuts”

….. and nothing Bad happened!
Designing for Drift

- **Barriers** – to prevent specific failure *(forcing functions)*

- **Recovery** – to catch failures before they cause harm *(checklists; emergency procedures)*

- **Redundancy** – to provide multiple options to achieve an outcome through another path if the first doesn’t work *(two pilots; alternative diagnosis)*
Just Culture Algorithm

- Tests for Intentions and Behaviours
- Tests for adherence to Duties
- Provides guidance on consequential actions

Outcome Engenuity, www.outcome-eng.com
Behaviours

Human Error
• Inadvertently doing other than what should have been done; a slip, lapse, mistake

At-Risk Behaviour
• Increasing risk that is either not recognised, or mistakenly believed to be justified

Reckless Behaviour
• Consciously disregarding a substantial and unjustifiable risk

Repetitive Behaviour
• Individuals with a history of Human Error and/or At-Risk Behaviour

Malicious Intent
• Behaving with a conscious aim or purpose to cause harm
The Three Duties

1. **Duty to Produce an Outcome**
   Employees have a responsibility to follow rules which specify the outcome to be achieved where they themselves control that system.

2. **Duty to Follow a Procedural Rule**
   Employees have a *responsibility to follow procedures* put in place by their employer. Although the employer largely controls those procedures, employees have a *responsibility to be reliable components* within the system.

3. **Duty to Avoid Causing Unjustifiable Risk or Harm**
   Employees have a responsibility not to cause *unjustifiable risk or harm* to themselves, other employees or their employer.
Actions (Outcomes)

Substitution Test
• “Given the same circumstances, can you be sure that another employee would not have made the same decision”?

Console
• Accept that error has occurred and identify any means in which the system might be improved to either trap future errors or mitigate negative consequences

Coach
• Supportive discussion (an/or education and training) with employee on the need to make safe behavioural choices

Disciplinary Action
• A formal process undertaken in line with the Managing Poor Performance Policy and/or Disciplinary Policy
Just Culture Flow Chart

1. **Were the employee’s actions as planned?**
   - **NO**
   - **YES**

2. **Was it the employee’s intent to cause harm?**
   - **NO**
   - **YES**

3. **Malicious Intent**
   - Refer Company Disciplinary Policy/Procedures

4. **Reckless Behaviour**
   - Refer Company Disciplinary Policy/Procedures

5. **At Risk Behaviour**
   - Line management
   - Review system
   - COACH Review system

6. **Human Error**
   - Line management
   - CONSOLE Review system
   - System deficiency?
   - Inexperienced?
   - System deficiency?

7. **History of Repetitive Human Errors or At-Risk Behaviours?**
   - Not Acceptable
   - Acceptable

8. **Outcome**
   - Refer Company Disciplinary Policy/Procedures
   - Line management
   - HR performance manage
Bad Things Happening

How to spend > $1.0M without really trying ....
Investigation & Outcome

• Expectation  
  \( \textit{Cognitive - mind set; confirmation bias} \)

• Stress  
  \( \textit{Person - task demands} \)

• Task demands  
  \( \textit{System - performance targets} \)

• Training  
  \( \textit{System – incomplete, inadequate} \)

• Selection  
  \( \textit{System - inadequacies} \)
Just Culture Flow Chart

1. **Were the employee’s actions as planned?**
   - **YES**
   - **NO**

2. **Was it the employee’s intent to cause harm?**
   - **YES**
   - **NO**

3. **Did the employee knowingly violate one of the three duties?**
   - **YES**
   - **NO**

4. **Did the employee act in good faith but have a mistaken belief that the violation was justified?**
   - **YES**
   - **NO**

5. **Did the employee choose the behaviour?**
   - **YES**
   - **NO**

6. **At Risk Behaviour**
   - **Malicious Intent**
   - **Reckless Behaviour**
   - **Human Error**

7. **History of Repetitive Human Errors or At-Risk Behaviours?**
   - **Not Acceptable**
   - **Acceptable**

8. **Outcome**
   - **Refer Company Disciplinary Policy/Procedures**
   - **Refer Company Disciplinary Policy/Procedures**
   - **Line management COACH Review system**
   - **Line management CONSOLE Review system**
   - **Management to review system / modify**

9. **Line management / HR performance manage**

Refer Group Airline Safety Policy
Investigation & Outcome

- Expectation  
  (Cognitive - mind set; confirmation bias)
- Stress  
  (Person - task demands)
- Task demands  
  (System - performance targets)
- Training  
  (System – incomplete, inadequate)
- Selection  
  (System - inadequacies)

- The individual was *coached* and *re-trained*
- Managers were *held to account* for the failures in selection and training processes
- The system performance targets were *reviewed and adjusted*
Benefits of a Just Culture

• Changes and *improves* the way we manage our people

• *Balanced accountability* leading to improved communication, system design and behavioural choices

• *Reduced risk* due to the ability to predict and prevent events due to accurate reporting

• Focusing on the *conduct* not the outcome
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