

# LEARNING FROM PATIENT SAFETY INCIDENTS: BEYOND ROOT CAUSE ANALYSIS

Dr Ken Catchpole

*Director of Surgical Safety and Human Factors Research*  
Department of Surgery  
Cedars-Sinai Medical Center  
Los Angeles



RE-ENGINEERING  
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# ARE we failing to learn?



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## The NHS shouldn't accept failure to learn from preventable errors

24 October, 2014 | By James Titcombe, Murray Anderson-Wallace

There is evidence that the NHS is not learning from preventable errors. While there are some patient safety initiatives actively supporting a cultural change, unless we listen to the experiences of families in a timely way, we won't learn, writes James Titcombe and Murray Anderson-Wallace

When avoidable mistakes or failures lead to the most tragic consequences - the preventable death of a child or loved one - most would agree that learning lessons to prevent future recurrence must be the primary focus of any response.

'There's strong evidence that learning from preventable errors is often limited or non-existent'

However, there is very strong evidence to suggest that in the NHS, preventable errors are sometimes repeated, suggesting that learning is often limited or non-existent.

There are multiple sources of evidence that support this view.



2001

# The Report of the Public Inquiry

2013

THE MID STAFFORDSHIRE  
NHS FOUNDATION TRUST  
PUBLIC INQUIRY

Chaired by Robert Francis QC

News Society

## 'There's no incentive to admit error, only to cover up'

In an exclusive newspaper interview, Clare Dyer talks to Ian Kennedy, the law professor who headed the inquiry into the surgery baby scandal at Bristol Royal Infirmary

Clare Dyer

guardian.co.uk, Tuesday 24 July 2001 06.59 EDT

The photographer poses Ian Kennedy in front of graffiti - a metaphor, perhaps, for the bomb damage against which the events at Bristol Royal Infirmary were fought

Between 30 and 35 babies died needlessly in a review carried out for Kennedy's inquiry last week. Others were left brain-damaged. The league table for specialist units doing operations on its death rate twice as high as elsewhere. The and vulnerable children was shot through with

The disaster was not just down to surgeons unwilling or unable to recognise their shortcomings. The chief executive refused to intervene in teamwork was lacking between the various children's care. From referral to diagnosis to parents were delivering their sick children in inherently unsafe. Even the very set-up of

## Hospital scandal: missed warnings

The shocking extent of the failures at an NHS hospital where hundreds of lives necessarily can be disclosed today.

## Mid Staffs scandal: it suits all of the parties to do almost nothing about it

By Iain Martin Politics Last updated: March 6th, 2013

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It is still shocking that there was so little shock. As many as 1200 patients lost their lives as the result of appalling care in Mid Staffs, yet the publication of the Francis report did not produce a national convulsion or

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# Teenage girl awarded record £24million payout after doctors injected her brain with glue

Monday 27 Jan 2014 6:47 pm

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Maisha Najeeb will need round-the-clock care for the rest of her life (Picture: Supplied)

“In breach of duty of care to [Maisha] there was an inadvertent injection of polymerised glue into the right internal carotid during the embolisation procedure on 2 June 2010.”

“The accident happened when two syringes got mixed up in the operating theatre because they were not labelled. One contained glue, which was to be used to treat her blood vessels, and the other contained a dye which would highlight the blood flow in her head during the procedure.”

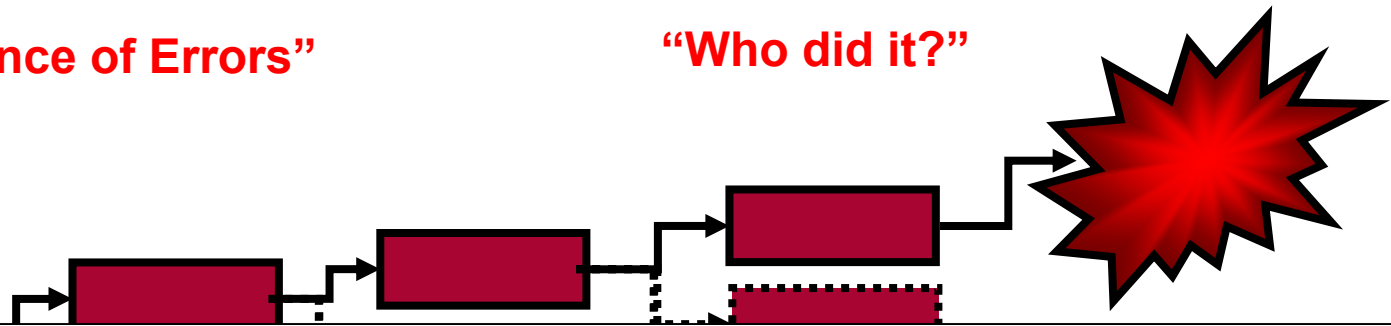
A teenage girl has been awarded a record £24million payout after medics at Great Ormond Street hospital accidentally injected her brain with glue.

# Root Cause Analysis (“WHY?”)

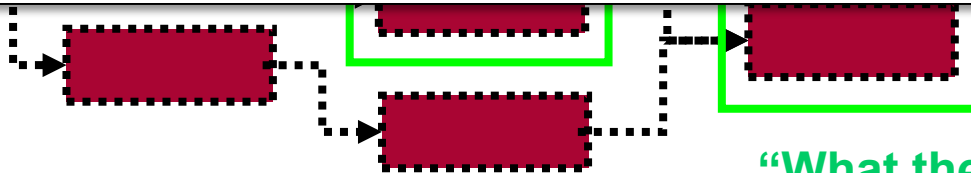
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“A Sequence of Errors”

“Who did it?”



*“If the syringes had been marked-up so the hospital could see which contained glue and which contained dye, then Maisha would not have suffered what is an utterly devastating brain injury. Such easily avoidable mistakes should not happen”*



“What they should have done”

“How could this have happened?”

In the same unit 18 months before.....

A V-P shunt was being given to a paediatric patient. The scrub nurse was new to the operation, but was being supported by an experienced nurse, and the consultant surgeon was joined by a semi-retired colleague and mentor.

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### Just a labeling problem?

- Single point defence
- Non-linear causation
- Previous near miss (precursor event)
- Debriefing / learning
- Equipment availability & reliability
- Distractors
- Leadership
- Team & experience interactions
- Checklists, time-outs, briefings & teamwork training
- Perceptions of management

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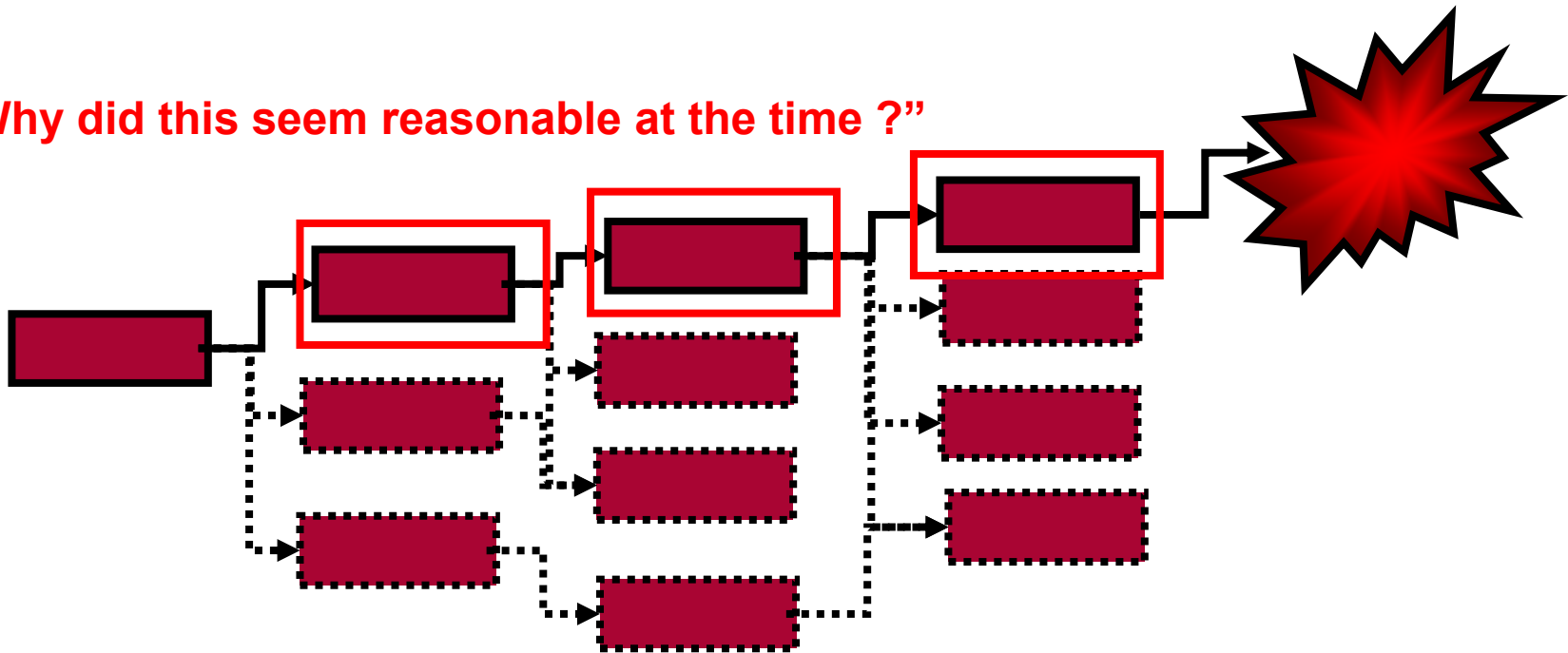
- Catchpole, K, Dale, T, Hirst, G, Smith, P, Giddings, A. (2009). The Safer Theatre Teams Project. Final Project Report to the Health Foundation.



## Beyond Root Cause Analysis (“HOW?”)

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“Why did this seem reasonable at the time ?”



***“Reconstruction of the Mindset”***

# A Different Way to Think About Safety

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## Old View



## New View

Human error is seen as cause of failure



Human error is seen as the effect of systemic vulnerabilities deeper inside the organization

Saying what people should have done is a satisfying way to describe failure



Saying what people should have done doesn't explain why it made sense for them to do what they did

Telling people to be more careful will make the problem go away



Only by constantly seeking out its vulnerabilities can organizations enhance safety

-Woods, Dekker, Cook, Johannsen, Sarter - Behind Human Error (2010)



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Asking HOW reveals more about accidents

This gives us many new ways to improve safety,  
reduce workload, and save money

# 10 False Beliefs About Accident Causation and Recovery

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- Fallacy #1: Process and outcome are directly related
- Fallacy #2: Our systems are safe
- Fallacy #3: People are the weak part of the system
- Fallacy #4: Accident causation is linear
- Fallacy #5: There is a root cause
- Fallacy #6: Root cause leads to a single solution
- Fallacy #7: Not following the rules ('violations') is negligent
- Fallacy #8: Problems can be fixed permanently
- Fallacy #9: Someone should be 'held accountable' for an accident
- Fallacy #10: Safety is the 'priority' that governs all decisions

# 10 Ways to Improve your Learning

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## **PEOPLE**

1. Involve the people doing the work.
2. Remember the local rationality principle.
3. Do not seek to apportion blame (“Just Culture”)

## **SYSTEM CONDITIONS**

4. What were/are the demands on system & pressures on people?
5. Consider the adequacy of resources and appropriateness of constraints.

## **SYSTEM BEHAVIOUR**

6. Understand the interactions and work flows?
7. Understand trade-offs.
8. Understand necessary adjustments and variability.

## **SYSTEMIC CONTRIBUTION TO OUTCOMES**

- 9. Consider cascades and surprises.
- 10. Understand everyday work.



# Thank you for Listening

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THANKS TO STEVE SHORROCK, EUROCONTROL

Woods, Dekker, Cook, Johannsen, Sarter -  
Behind Human Error (2010)

Dekker - The Field Guide to Human Error  
Investigations (2003)

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