"What and "Why" We Have Failed to Learn in Queensland Mining

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InterSafe



The "What"

People do not know:-

- •The size and nature of the personal damage problem in Qld Mining
- •The likelihood of the different Classes of personal damage
- •The patterns of damage for the different Classes.



Classification of Damage

CLASS I - Multiple Fatalities (MF)

- Single Fatalities (SF)
- Non-Fatal Permanent (N.F.P.D)
- CLASS II Temporary (Temp)
- CLASS III Minor



Class I & II Damage – Percentage of Costs

	1992-93	2000-01	2005-06	2008-09
Class I Fatal	1.5	3.5	3.3	5.3
Class I Non-fatal	80.5	88.5	88.0	85.2
Class II	18.0	8.0	8.7	9.5
Cost \$ billion *	\$20	\$34.3	\$57.5	\$60.6

2000-01 Goods and Services Exports \$132.8 billion 2008-09 Goods and Services Exports \$198 billion

* Without pain, suffering and early death costed



Class I Damage – No. of People Involved

Year	No. of Traumatic Fatalities per annum	No. of Cases of Non-Fatal Permanent Damage per annum	Cost of Class I Non-Fatal Damage as a Percentage of Total Costs.	Size of Australian Workforce (millions)
1992-93	693	50,018 per year (137 per day)	80.5%	6.56
2000-01	410	48,900 per year (134 per day)	88.5%	9.09
2005-06	393	64,000 per year (175 per day)	88.0%	11.2
2008-09	400	85,800 per year (235 per day)	85.1%	11.93
		235 per day (365 days per year)		



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Likelihood of Class I Damage – All Industries

	Likelihood of a	Likelihood of	
	Fatality	Non-Fatal	
	(1:X people	Permanent	
	employed)	Damage	
1992-93	1:9,466	1:131	
2000-01	1:22,170	1 185	
2005-06	1:28,498	1:175	
2008-09	1:29,825	1:139	



The Queensland Mining Story

No. of People Experiencing Non-Permanent Damage (>60 Days Lost) and Permanent Damage (>60 Days Lost) - 2009-2013

	No. of
	People
No. of Permanently Damaged >60 days lost	559
No. of >60 days (Not Permanently	
Damaged)	703
Total No.	1,262



Likelihood of Permanent Damage in W.A. and Qld – 2009-2013

State	No. of Permanently Damaged People	Average No. of Employees Per Year	Likelihood	
Western Australia Mining - 2009-2013	2,471	90,000	1:144	
Qld Mining - 2009-2013	1,262	55,000	1:219	



Which Industries Do 1,262 Cases Come From?

Industry	No. of
	Cases
Coal Mining	526
Other Mining Support Services	247
Mineral Exploration	118
Copper Ore Mining	101
Other Non-Metallic Mineral Mining and Quarrying	52
Other Construction Material Mining	42
Petroleum Exploration	42
Other	176
Grand Total	1,262

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Number of Permanent Damage Cases, 2008-13 – Queensland Mines & Quarries Safety Reports

	2008-09	2009-10	2010-11	2011-12	2012-13	
All Operations	39	47	57	28	32	Total: 203

Compared with Q-Comp Data (2009-13) – 1,262



Why Have We Failed to Learn?



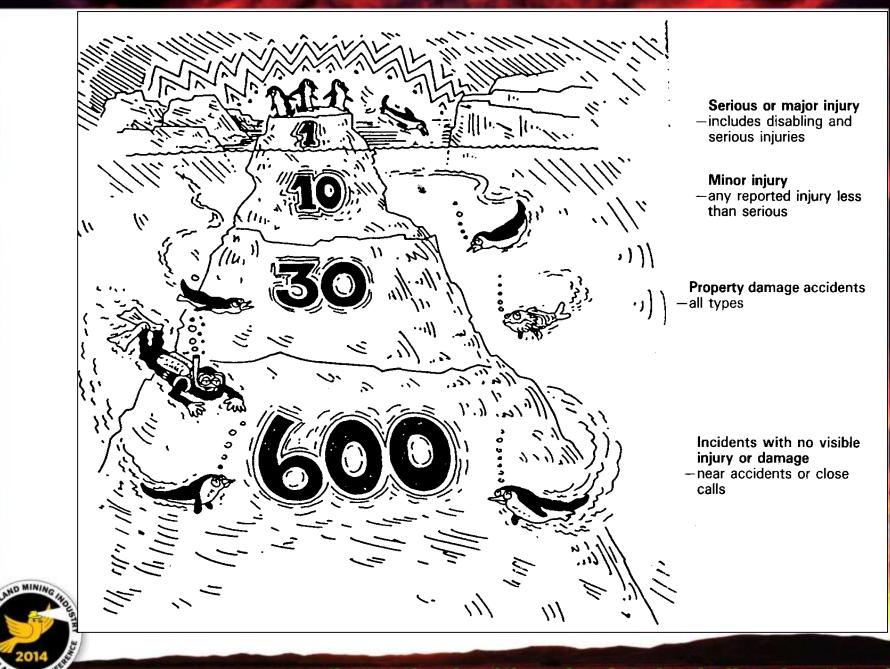
The "Why"

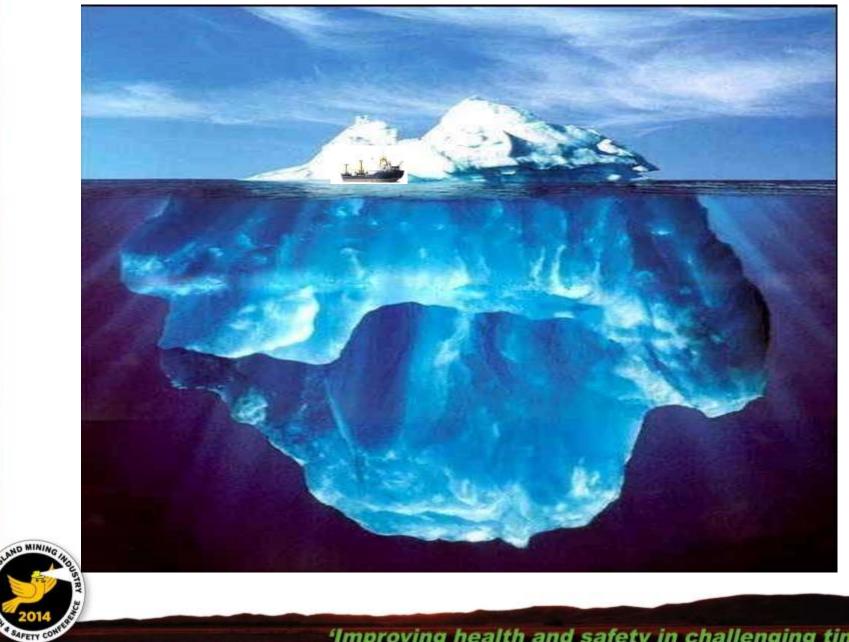
- 1. The mythologies of the Heinrich triangle interacts with:
- 2. A firm belief in human error accident causation which interacts with
- 3. The belief that All Injury Frequency Rate and Lost Time Injury measures are indicators of Health & Safety success.

The "How"

This paper does not present the "How" do we go forward?







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Focussing Question to test a Core Belief

The majority (80+%) of incidents (work, home, leisure) are caused by some variation of people's silliness, stupidity, carelessness, rule breaking behavior, incompetency, unsafe acts.

1.Strongly Agree

2.Agree

3.Disagree

4.Strongly Disagree



Summary

The "What"

•People do not know:-

- The size and nature of the personal damage problem in Qld Mining
- The likelihood of the different Classes of personal damage
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The "Why"

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 The mythologies of the Heinrich triangle interacts with:
A firm belief in human error accident causation which interacts with

3. The belief that All Injury Frequency Rate and Lost Time Injury measures are indicators of Health & Safety success.



The End

Thankyou

