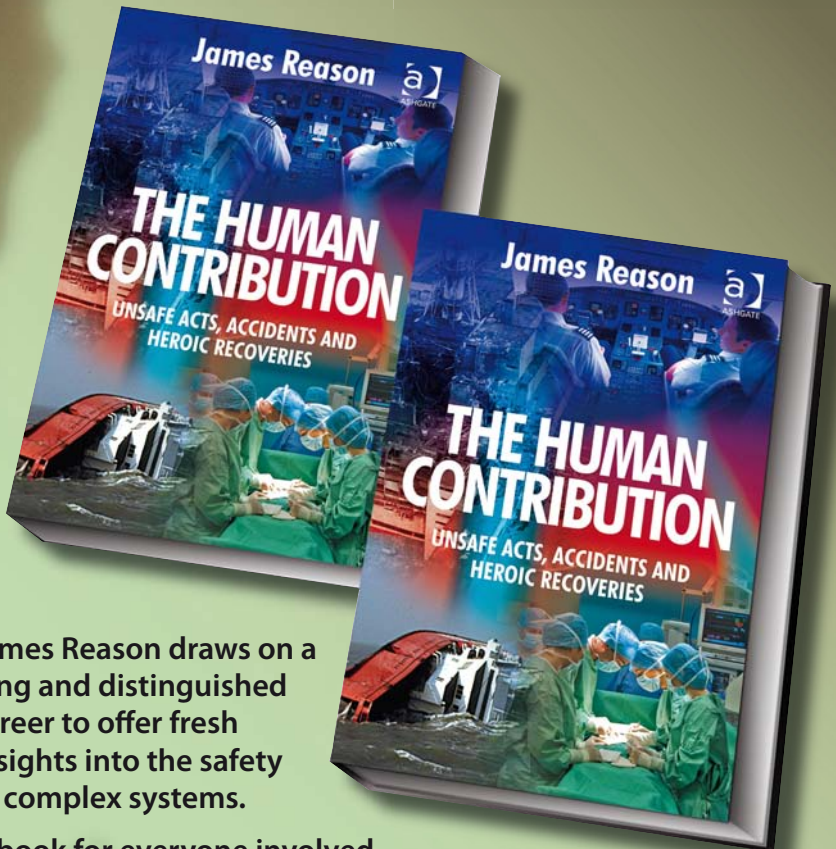


The Human Contribution



Unsafe Acts, Accidents and Heroic Recoveries

James Reason, Professor Emeritus,
The University of Manchester, UK



James Reason draws on a long and distinguished career to offer fresh insights into the safety of complex systems.

A book for everyone involved or interested in system safety.

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The Human Contribution

Unsafe Acts, Accidents and Heroic Recoveries

James Reason, Professor Emeritus,
The University of Manchester, UK

This book explores the human contribution to the reliability and resilience of complex, well-defended systems. Usually the human is considered a hazard – a system component whose unsafe acts are implicated in the majority of catastrophic breakdowns. However there is another perspective that has been relatively little studied in its own right – the human as hero, whose adaptations and compensations bring troubled systems back from the brink of disaster time and again. What, if anything, did these situations have in common? Can these human abilities be ‘bottled’ and passed on to others?

Prof. Reason takes a selection of heroic recoveries from history and hazardous domains and uncovers what is special about them. The outcome is more than merely a celebration of the heroic: it is a genuine attempt to understand heroic acts and to see whether lessons can be learnt, skills acquired and safer systems developed as a result. The concluding chapters distill these observations into insights that you can apply to any complex system where safety is at a premium.

Professionals in high-consequence environments, including those at ‘the sharp end’ will draw something from this book. Academics, researchers and students of human factors will also find *The Human Contribution* an invaluable and thought-provoking read. Order your copy/ies today.

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* **Heroic Recoveries**

The book draws its illustrative material from a wide variety of hazardous domains, with the emphasis on healthcare reflecting the author's focus on patient safety over the last decade.

Chapter 8 Training, Discipline and Leadership

The Light Division's retreat at Fuentes de Onoro (1811)

The withdrawal of the 1st Marine Division from Choisin Reservoir (1950)

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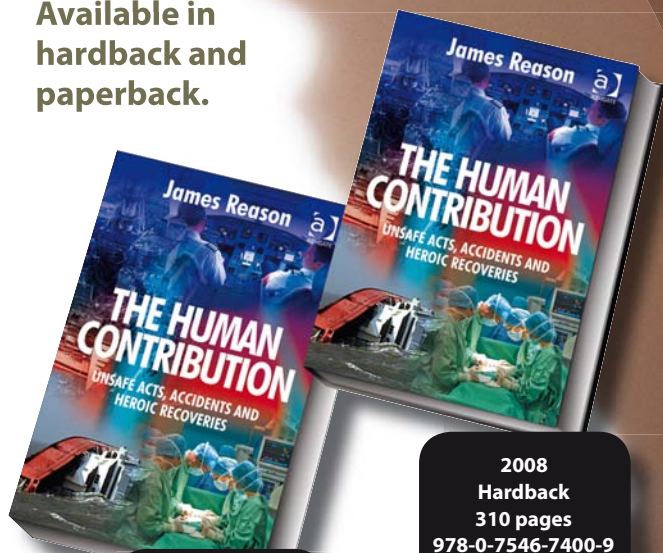
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The Author

James Reason was Professor of Psychology at the University of Manchester from 1977-2001, from where he graduated in 1962. He obtained his PhD in 1967. From 1964-76, he was Lecturer then Reader in Psychology at the University of Leicester. He has also worked at the RAF Institute of Aviation Medicine, Farnborough and the US Naval Aerospace Medical Institute, Pensacola.

His primary research interest has been the human and organizational contributions to the breakdown of complex, well-defended systems. He has written books on absent-mindedness, human error, aviation human factors, on managing the risks of organizational accidents and, most recently, on error management in maintenance operations. He has researched and consulted in the fields of aviation, railways, nuclear power generation, maritime safety, oil exploration and production, mining, chemical process industry, road safety, banking and health care.

He received the Distinguished Foreign Colleague Award from the US Human Factors and Ergonomics Society (1995), the Flight Safety Foundation/Airbus Industrie Award for achievements in human factors and flight safety (2001), and the Roger Green Medal from the Royal Aeronautical Society for contributions to human factors as applied to aerospace (2001), and the Flight Safety Foundation/Boeing Aviation Safety Lifetime Achievement Award (2002). He is a Fellow of the British Academy, the Royal Aeronautical Society and the British Psychological Society. He received an honorary DSc from the University of Aberdeen in 2002, and was awarded a CBE in 2003 for contributions to patient safety. In 2006, he was made an honorary fellow of the Royal College of General Practitioners.



Instead of seeing humans as a source of risk, they should be seen as an indispensable resource for safety. James Reason lucidly argues for this more balanced view using many examples from the past and the present, switching effortlessly from domain to domain. Elegantly and entertainingly written, it is an invaluable supply of information and inspiration, as well as a pointer to how the thinking about safety should develop.

Erik Hollnagel,
MINES ParisTech, France

This book will certainly be as important to the development of new thinking in safety as James Reason's previous books, Human Error and Managing the Risks of Organizational Accidents, have proved to be. Everyone working in this area, from those researchers advancing new models and methods to those 'at the sharp end' responsible for implementing safety policies and practices, will find this book both useful and easy to read and understand.

John Wreathall,
John Wreathall & Co.

The serious reader will find the book intensely moving at times. The wealth of real case studies, tragedies, splendid successes and discoveries, make it well balanced and difficult to put down. Certainly it merits repeated reading for continuous satisfaction and inspiration.

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