41st Annual Human Factors and Ergonomics Society of Australia Conference 2005

Technology Improving Performance

Canberra, Australia 21-23 November 2005

Editors:

Rebecca Mitchell

ISBN: 978-1-62276-958-2

Printed from e-media with permission by:

Curran Associates, Inc. 57 Morehouse Lane Red Hook, NY 12571



Some format issues inherent in the e-media version may also appear in this print version.

Copyright© (2005) by the Human Factors and Ergonomics Society of Australia Inc. (HFESA) All rights reserved.

Printed by Curran Associates, Inc. (2013)

For permission requests, please contact the Human Factors and Ergonomics Society of Australia Inc. (HFESA) at the address below.

Human Factors and Ergonomics Society of Australia Inc. (HFESA) Suite 18, Hills Corporate Centre 11 Brookhollow Avenue Baulkham Hills NSW 2153

Phone: (02) 9680-9026 Fax: (02) 9680-9027

secretariat@ergonomics.org.au

Additional copies of this publication are available from:

Curran Associates, Inc. 57 Morehouse Lane Red Hook, NY 12571 USA Phone: 845-758-0400

Fax: 845-758-2634

Email: curran@proceedings.com Web: www.proceedings.com

Contents

(In each group papers are listed in alphabetical order by first author).	Page
Keynote Papers	I uge
The Business Value of Ergonomics Jan Dul	2
What Do Ergonomics Do? Wendy MacDonald	8
Plenary Papers	
Safe Systems Development Nigel Cann	24
The Role of Design Issues in Work-Related Serious Injuries Tim Driscoll	36
Work-Related Stress: An Update on Developments in the UK Niki Ellis	42
Shapes of Human Control in Time: Models and Hydropower System Example Penny Sanderson	51
Submitted Papers	
Health and Safety in the Building and Construction Industry Wayne Artuso	65
Development of Safety Applications Products Using Novel Glow-in-the-Dark Crystals	
Nagendra Beladakere	71
Manual Handling – Risk Control Issues David Caple	77
International Developments in Ergonomics David Caple	83
The Efficacy of the Mind Switch Environmental Control System for the Severely Disabled	07
Ashley Craig	87

Pa	ge
Risk Factors For Physical Discomfort in the Office Environment Catherine Cook and Jennifer Long	94
"Fit" For the Future? OR Fitting the Task to Future Man: Implications for Ergonomics Tools Wendy Elford	f or 99
Socio-Technical Systems to Enhance Group Performance	09
The Jobfit System: A Tool for Fitting Workers to Jobs and Jobs to Workers Jenny Legge	17
Forum and site visit papers	
Working Well: Comcare's model for prevention of psychological injury Christine Bolger	20
CSIRO Plant Industry Workplace Charles Fletcher	23

CONTENTS

Abstracts are listed in order of presentation within the program.

The business value of organomies	Page
The business value of ergonomics Professor Jan Dul	147
Organisational stress: an update on developments in the UK Dr Niki Ellis	148
The Manual Handling Standard and Code – Between a Rock and a Hard Place The Trade off between Guidance for Action and Robust Methods Ms Valerie O'Keeffe	149
Manual Handling-Risk Control Issues Mr David Caple	14:
International Developments in Ergonomics Mr David Caple	14;
Office Ergonomics Dr Catherine Cook and Ms Jenny Long	152
Socio-Technical Systems to enhance Group Performance Dr Helen Hasan	352
The human costs and benefits of work: jobload, self-perceived performance, and employee wellbeing Dr Peta Miller	"353
Ron Cumming Memorial Lecture: What do "ergonomists" do? Dr Wendy Macdonald	"154
Shapes of human control in time: Models and a hydropower system example Professor Penny Sanderson	355
The efficacy of the Mind Switch Environmental control system for the severely ""disabled	'355

Dr Ashley Craig

	Page
FORUM: National Perspective National Perspective from the OASCC Ms Janice Batt	336
FORUM: National Perspective Working Well: Comcare's model for prevention of psychological injury in Australian Government. Ms Christina Bolger	'''''''336
Health and Safety in the Building and Construction Industry Mr Wayne Artuso	1************357
The role of design issues in work-related injuries in Australia Dr Tim Driscoll	1*********358
Safe Systems Development Mr Nigel Cann	359
Development of Safety Applications Products Using Novel Glow-in-the-Dark Crystals Dr. Nagendra N. Beladakere	*******359
The jobfit system: a tool for fitting workers to jobs and jobs to workers Ms Jenny Legge	199999999999999999999999999999999999999
Human performance and Mind Switch technology Dr Ashley Craig	1***********35:
Science Operations at CSIRO Plant Industry Mr Charles Fletcher	35;
Fit" for the Future? OR Fitting the task to future man: Implications for Ergonomics tools Ms Woody Elford	199999999999999999999999999999999999999