

# Diving and Hyperbaric Medicine

*The Journal of the South Pacific Underwater Medicine Society  
and the European Underwater and Baromedical Society*

**SPUMS**

*Volume 44 No. 2 June 2014*

**EUBS**



## **Cold-water diving induces airway narrowing**

**Decompression sickness – the tip of the scuba injury pyramid**

**A baby puzzle, low visibility and nitrogen narcosis**

**Divers need to be reasonably fit for scuba diving**

**Don't faint while escaping from a submarine**

**Immersion pulmonary oedema can be fatal**

**An update on investigating diving fatalities**

# CONTENTS

Diving and Hyperbaric Medicine Volume 44 No. 2 June 2014

## Editorials

- 61 **Aerobic demand and scuba diving: concerns about medical evaluation**  
Gerardo Bosco, Antonio Paoli and Enrico Camporesi
- 63 **Just say NO to decompression bubbles: is there a real link between nitrous oxide and bubble production or reduction in humans?**  
Costantino Balestra
- 64 **The Editor's offering**

## Original articles

- 65 **Complex tactile performance in low visibility: the effect of nitrogen narcosis**  
Charles H van Wijk and Willem AJ Meintjes
- 70 **Lung function after cold-water dives with a standard scuba regulator or full-face-mask during wintertime**  
Florian Uhlig, Claus-Martin Muth, Kay Tetzlaff, Andreas Koch, Richard Leberle, Michael Georgieff and Bernd E Winkler
- 74 **Exercise intensity inferred from air consumption during recreational scuba diving**  
Peter Buzzacott, Neal W Pollock and Michael Rosenberg
- 79 **Scuba diving injuries among Divers Alert Network members 2010–2011**  
Shabbar I Ranapurwala, Nicholas Bird, Pachabi Vaithianathan and Petar J Denoble
- 86 **Physiological effects of rapid reduction in carbon dioxide partial pressure in submarine tower escape**  
Geoffrey AM Loveman, Fiona M Seddon, Julian C Thacker, M Graham White and Karen M Jurd

## Review article

- 91 **Diving fatality investigations: recent changes**  
Carl Edmonds and James Caruso

## Case reports

- 97 **Two fatal cases of immersion pulmonary oedema – using dive accident investigation to assist the forensic pathologist**  
David R Smart, Martin Sage and F Michael Davis

## Letters to the Editor

- 101 **Treatment of decompression illness with heliox: the best of both worlds?**  
Robert A van Hulst
- 102 **Vinegar and *Chironex fleckeri* stings**  
Clinton R Gibbs, Michael Corkeron and Denise F Blake
- 102 **Reply:**  
Philippa Welfare, Mark Little, Peter Pereira and Jamie Seymour

## Critical appraisal

- 104 **Weak evidence for benefit of hyperbaric oxygen in patients more than six months after stroke**  
Alan Bourke

## Continuing professional development

- 105 **Diving hazards**  
Ian Millar

## Book review

- 107 **NOAA Diving Manual – Diving for Science and Technology, 5th Edition**  
Dinsmore DA, Bozanic JE, editors  
Martin Sayer

## EUBS notices and news

- 109 **EUBS news is on the website**
- 109 **European Editor for *Diving and Hyperbaric Medicine***
- 109 **The 5th Arthur Bornstein Workshop, Diving in Offshore Wind Farms**
- 110 **The 40th EUBS Annual Scientific Meeting, third announcement**

## SPUMS notices and news

- 111 **Education Officer's Report May 2014**
- 113 **SPUMS 44th ASM 2015, preliminary notice**
- 113 **SPUMS news is on the website**
- 114 **SPUMS Diploma in Diving and Hyperbaric Medicine (revised)**
- 115 **Courses and meetings**
- 117 **Instructions to authors**  
(updated April 2014)

Diving and Hyperbaric Medicine is indexed on MEDLINE, SciSearch® and Embase/Scopus

Printed by Snap Printing, 166 Burwood Road, Hawthorn, Victoria 3122, <hawthorn@snap.com.au>